UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, D.C. 20549

FORM 20-F

(Mark One)

☐ **REGISTRATION STATEMENT PURSUANT TO SECTION 12(b) OR (g) OF THE SECURITIES EXCHANGE ACT OF 1934**

OR

☒ **ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the fiscal year ended December 31, 2019

OR

☐ **TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the transition period from _____ to _____

OR

☐ **SHELL COMPANY REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

Date of event requiring this shell company report
Commission File Number 001-38281

Innate Pharma S.A.

(Exact name of registrant as specified in its charter and translation of registrant's name into English)

France
(Jurisdiction of incorporation or organization)
117, Avenue de Luminy
13009 Marseille France
(Address of principal executive offices)
Mondher Mahjoubi, M.D.
Chairman and Chief Executive Officer
Innate Pharma S.A.
117 Avenue de Luminy
13009 Marseille France
Tel: +33 4 30 30 30 30
(Name, Telephone, E-mail and/or Facsimile number and Address of Company Contact Person)

Securities registered or to be registered pursuant to Section 12(b) of the Act.

Title of each class	Trading Symbol	**Name of each exchange on which registered**
American Depositary Shares, each representing one ordinary share, nominal value €0.05 per share	IPHA*	**The Nasdaq Global Select Market**
Ordinary shares, nominal value €0.05 per share		**The Nasdaq Global Select Market***

* Not for trading, but only in connection with the registration of the American Depositary Shares.

Securities registered or to be registered pursuant to Section 12(g) of the Act. None
Securities for which there is a reporting obligation pursuant to Section 15(d) of the Act. None

Indicate the number of outstanding shares of each of the issuer's classes of capital or common stock as of the close of the period covered by the annual report.

Ordinary shares, nominal value €0.05 per share: 78,580,464 as of December 31, 2019

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. ☐ Yes ☒ No

If this report is an annual or transition report, indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934. ☐ Yes ☒ No

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. ☒ Yes ☐ No

Indicate by check mark whether the registrant has submitted electronically every Interactive Data File required to be submitted pursuant to Rule 405 of Regulation S-T (§232.405 of this chapter) during the preceding 12 months (or for such shorter period that the registrant was required to submit such files). B Yes ☒ No ☐

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, or an emerging growth company. See definition of "large accelerated filer," "accelerated filer," and "emerging growth company" in Rule 12b-2 of the Exchange Act.

Large accelerated filer ☐ Accelerated filer ☐
Non-accelerated filer ☐ Emerging growth company ☒

If an emerging growth company that prepares its financial statements in accordance with U.S. GAAP, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 13(a) of the Exchange Act. ☐

Indicate by check mark which basis of accounting the registrant has used to prepare the financial statements included in this filing:

U.S. GAAP ☐ International Financial Reporting Standards as issued by the International Accounting Standards Board ☒ Other ☐

If "Other" has been checked in response to the previous question, indicate by check mark which financial statement item the registrant has elected to follow.
☐ Item 17 ☐ Item 18

If this is an annual report, indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act). ☐ Yes ☒ No

TABLE OF CONTENTS

INTRODUCTION 6

PART I 9

Item 1. Identity of Directors, Senior Management and Advisers. 9

Item 2. Offer Statistics and Expected Timetable. 9

Item 3. Key Information. 9

A. Selected Financial Data 9
B. Capitalization and Indebtedness 10
C. Reasons for the Offer and Use of Proceeds 10
D. Risk Factors 11

Item 4. Information on the Company. 87

A. History and Development of the Company 87
B. Business Overview 87
C. Organizational Structure. 153
D. Property, Plants and Equipment. 153

Item 4A. Unresolved Staff Comments. 154

Item 5. Operating and Financial Review and Prospects. 154

A. Operating Results 162
B. Liquidity and Capital Resources 181
C. Research and Development 187
D. Trend Information 187
E. Off-Balance Sheet Arrangements 188
F. Tabular Disclosure of Contractual Obligations 188
G. Safe Harbor. 190

Item 6. Directors, Senior Management and Employee 190

A. Directors and Senior Management. 190
B. Compensation. 196
C. Board Practices 209
D. Employees 215
E. Share Ownership. 215

Item 7. Major Shareholders and Related Party Transaction 216

A. Major Shareholders 216
B. Related Party Transactions. 218
C. Interests of Experts and Counsel. 221

Item 8. Financial Information 221

A. Consolidated Statements and Other Financial Information. 221
B. Significant Changes. 221
Item 9. The Offer and Listing. 222
A. Offer and Listing Details. 222
B. Plan of Distribution. 222
C. Markets. 222
D. Selling Shareholders. 222
E. Dilution. 222
F. Expenses of the Issue. 222
Item 10. Additional Information. 222
A. Share Capital. 222
B. Memorandum and Articles of Association. 222
C. Material Contracts. 222
D. Exchange Controls. 230
E. Taxation. 230
F. Dividends and Paying Agents. 242
G. Statement by Experts. 243
H. Documents on Display. 243
I. Subsidiary Information. 243
Item 11. Quantitative and Qualitative Disclosures About Market Risk. 243
Item 12. Description of Securities Other than Equity Securitie 244
A. Debt Securities. 244
B. Warrants and Rights. 244
C. Other Securities. 244
D. American Depositary Shares. 244
PART II 249
Item 13. Defaults, Dividend Arrearages and Delinquencies. 249
Item 14. Material Modifications to the Rights of Security Holders and Use of Proceeds. 249
Item 15. Controls and Procedures. 249
Item 16. Reserved. 251
Item 16A. Audit Committees Financial Expert. 251
Item 16B. Code of Business Conduct and Ethics. 252
Item 16C. Principal Accountant Fees and Services. 252
Item 16D. Exemptions from the Listing Standards for Audit Committees. 253
Item 16E. Purchases of Equity Securities by the Issuer and Affiliated Purchasers. 253

Item 16F. Change in Registrant's Certifying Accountant. 253

Item 16G. Corporate Governance. 253

Item 16H. Mine Safety Disclosure. 254

PART III 255

Item 17. Financial Statements. 255

Item 18. Financial Statements. 255

Item 19. Exhibits. 256

INTRODUCTION

Unless otherwise indicated in this annual report (this "Annual Report"), "Innate," "the company," "our company," "we," "us" and "our" refer to Innate Pharma S.A. and its consolidated subsidiaries.

"Innate Pharma," the Innate Pharma logo, Lumoxiti and other trademarks or service marks of Innate Pharma S.A. appearing in this Annual Report are the property of Innate Pharma S.A. or its subsidiaries. Solely for convenience, the trademarks, service marks and trade names referred to in this Annual Report are listed without the ® and ™ symbols, but such references should not be construed as any indicator that their respective owners will not assert, to the fullest extent under applicable law, their right thereto. All other trademarks, trade names and service marks appearing in this Annual Report are the property of their respective owners. We do not intend to use or display other companies' trademarks and trade names to imply any relationship with, or endorsement or sponsorship of us by, any other companies.

Our audited consolidated financial statements have been prepared in accordance with International Financial Reporting Standards, or IFRS, as issued by the International Accounting Standards Board, or IASB. Our consolidated financial statements are presented in euros, and unless otherwise specified, all monetary amounts are in euros. All references in this Annual Report to "$," "US$," "U.S.$," "U.S. dollars," "dollars" and "USD" mean U.S. dollars and all references to "€" and "euros" mean euros, unless otherwise noted. Throughout this Annual Report, references to ADSs mean American Depositary Shares or ordinary shares represented by such ADSs, as the case may be.

SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS

This Annual Report contains forward-looking statements within the meaning of Section 27A of the Securities Act of 1933, as amended, and Section 21E of the Securities Exchange Act of 1934, as amended, that are based on our management's beliefs and assumptions and on information currently available to our management. All statements other than present and historical facts and conditions contained in this Annual Report, including statements regarding our future results of operations and financial position, business strategy, plans and our objectives for future operations, are forward-looking statements. When used in this Annual Report, the words "anticipate," "believe," "can," "could," "estimate," "expect," "intend," "is designed to," "may," "might," "plan," "potential," "predict," "objective," "should," or the negative of these and similar expressions identify forward-looking statements. Forward-looking statements include, but are not limited to, statements about:

- the prospects of attaining, maintaining and expanding marketing authorization for monalizumab, lacutamab and our other product candidates;
- the initiation, timing, progress and results of our preclinical studies and clinical trials and those conducted by third parties, including our collaborator AstraZeneca;
- our ability to successfully develop and advance our pipeline of product candidates;
- the timing or likelihood of regulatory filings and approvals;
- our ability to contract with third-party suppliers and manufacturers and their ability to perform adequately;
- our commercialization of Lumoxiti, including the expected transitioning of commercialization activities in the United States from AstraZeneca to us commenced in mid-2019, and any of our product candidates, if approved, for which we retain commercialization rights;
- future agreements with third parties in connection with the commercialization of our product candidates and any other approved product;
- our ability to develop sales and marketing capabilities and transition into a commercial-stage company;
- the pricing and reimbursement of Lumoxiti and our product candidates, if approved;
- the effects of increased competition as well as innovations by new and existing competitors in our industry;
- our ability to obtain funding for our operations;
- our ability to obtain, maintain, protect and enforce our intellectual property rights and propriety technologies and to operate our business without infringing the intellectual property rights and proprietary technology of third parties;
- regulatory developments in the United States, Europe and other countries;
- costs of compliance and our failure to comply with new and existing governmental regulations including, but not limited to, tax regulations;

- statements regarding future revenue, hiring plans, expenses, capital expenditures, capital requirements and stock performance;
- our expected use of proceeds of the October 2019 global offering;
- the impact of COVID-19 on our business, financial condition and results of operations; and
- other risks and uncertainties, including those listed in the section of this Annual Report titled "Item 3.D - Risk Factors."

You should refer to the section of this Annual Report titled "Item 3.D – Risk Factors" for a discussion of important factors that may cause our actual results to differ materially from those expressed or implied by our forward-looking statements. As a result of these factors, we cannot assure you that the forward-looking statements in this Annual Report will prove to be accurate. Furthermore, if our forward-looking statements prove to be inaccurate, the inaccuracy may be material. In light of the significant uncertainties in these forward-looking statements, you should not regard these statements as a representation or warranty by us or any other person that we will achieve our objectives and plans in any specified time frame or at all. We undertake no obligation to publicly update any forward-looking statements, whether as a result of new information, future events or otherwise, except as required by law. The Private Securities Litigation Reform Act of 1995 and Section 27A of the Securities Act do not protect any forward-looking statements that we make in connection with this Annual Report.

In addition, statements that "we believe" and similar statements reflect our beliefs and opinions on the relevant subject. These statements are based upon information available to us as of the date of this Annual Report, and while we believe such information forms a reasonable basis for such statements, such information may be limited or incomplete, and our statements should not be read to indicate that we have conducted an exhaustive inquiry into, or review of, all potentially available relevant information. These statements are inherently uncertain and investors are cautioned not to unduly rely upon these statements.

You should read this Annual Report and the documents that we reference in this Annual Report and have filed as exhibits to this Annual Report completely and with the understanding that our actual future results, levels of activity, performance and events and circumstances may be materially different from what we expect. We qualify all of our forward-looking statements by these cautionary statements.

Unless otherwise indicated, information contained in this Annual Report concerning our industry and the markets in which we operate, including our general expectations and market position, market opportunity and market size estimates, is based on information from independent industry analysts, third-party sources and management estimates. Management estimates are derived from publicly available information released by independent industry analysts and third-party sources, as well as data from our internal research, and are based on assumptions made by us based on such data and our knowledge of such industry and market, which we believe to be reasonable. In addition, while we believe the market opportunity information included in this Annual Report is generally reliable and is based on reasonable assumptions, such data involve risks and uncertainties and are subject to change based on various factors, including those discussed under the section of this Annual Report titled "Item 3.D—Risk Factors."

PART I

Item 1. Identity of Directors, Senior Management and Advisers.

Not applicable.

Item 2. Offer Statistics and Expected Timetable.

Not applicable.

Item 3. Key Information.

A. Selected Financial Data.

Our consolidated audited financial statements have been prepared in accordance with IFRS, as issued by the IASB. We derived the selected consolidated statement of income (loss) data for the years ended December 31, 2017, 2018 and 2019 and the selected consolidated statement of financial position data as of December 31, 2017, 2018 and 2019 from our consolidated audited financial statements included elsewhere in this Annual Report. This data should be read together with, and is qualified in its entirety by reference to, "Item 5. Operating and Financial Review and Prospects" as well as our financial statements and notes thereto appearing elsewhere in this Annual Report. Our historical results are not necessarily indicative of the results to be expected in the future.

Consolidated Statement of Income (Loss) Data:

	Year ended December 31,		
	2017	**2018[1]**	**2019[2]**
	(in thousands of euros, except per share data and number of ordinary shares)		
Revenue and other income	€ 44,033	€ 93,952	€ 85,814
Operating expenses			
Research and development	(67,000)	(69,555)	(78,844)
Selling, general and administrative	(17,015)	(18,142)	(25,803)
Net income (loss) from distribution agreements	—	(1,109)	(8,219)
Operating income (loss)	€ (39,983)	€ 5,146	€ (27,052)
Net financial income (loss)	(8,034)	(2,427)	6,293
Income tax benefit (expense)	(368)	333	—
Net income (loss)	€ (48,385)	€ 3,049	€ (20,759)
Net income (loss) per share attributable to equity holders			
Basic	€ (0.89)	€ 0.05	€ (0.31)
Diluted	€ (0.89)	€ 0.05	€ (0.31)
Number of ordinary shares outstanding used for computing basic net income (loss) per share	54,351,967	58,776,712	66,908,389
Number of ordinary shares outstanding used for computing diluted net income (loss) per share	54,351,967	58,777,282	66,908,389

(1) The consolidated financial statements as of and for the year ended December 31, 2018 reflect the impacts of the adoption of IFRS 9 and IFRS 15 that became applicable on January 1, 2018. The comparative consolidated financial statements as of and for the year ended December 31, 2017 have not been restated. The impact on the consolidated statement of income (loss) of the adoption of IFRS 9 is not material and the impact of the adoption of IFRS 15 and transition measures are presented in Note 2.d and 2.e a to our consolidated financial statements appearing elsewhere in this Annual Report.

(2) The consolidated financial statements as of and for the year ended December 31, 2019 reflect the impacts of the adoption of IFRS 16 that became applicable on January 1, 2019. The Company applied the modified retrospective transition method. As a consequence, the comparative consolidated financial information as of and for the years ended December 31, 2017 and 2018 have not been restated. See Note 2.f to our consolidated financial statements appearing elsewhere in this Annual Report.

Consolidated Statement of Financial Position Data:	**Year ended December 31,**		
	2017	**2018[1]**	**2019[2]**
	(in thousands of euros)		
Cash and cash equivalents, short-term investments and non-current financial assets [3]	€ 176,578	€ 202,712	€ 255,869
Total assets	255,023	451,216	401,361
Total financial debt and defined benefit obligations	8,495	8,219	22,484
Total shareholders' equity	85,956	167,240	217,416

(1) The consolidated financial statements as of and for the year ended December 31, 2018 reflect the impacts of the adoption of IFRS 9 and IFRS 15 that became applicable on January 1, 2018. The comparative consolidated financial statements as of and for the year ended December 31, 2017 have not been restated. The impact on the consolidated statement of income (loss) of the adoption of IFRS 9 is not material and the impact of the adoption of IFRS 15 and transition measures are presented in Note 2.d and 2.e a to our consolidated financial statements appearing elsewhere in this Annual Report.

(2) The consolidated financial statements as of and for the year ended December 31, 2019 reflect the impacts of the adoption of IFRS 16 that became applicable on January 1, 2019. The Company applied the modified retrospective transition method. As a consequence, the comparative consolidated financial information as of and for the years ended December 31, 2017 and 2018 have not been restated. See Note 2.f to our consolidated financial statements appearing elsewhere in this Annual Report.

(3) Non-current financial assets account for €60.5, 35.2 and 37.0 million for the years ended December 31, 2017, 2018 and 2019, respectively.

B. Capitalization and Indebtedness.

Not applicable.

C. Reasons for the Offer and Use of Proceeds.

Not applicable.

D. Risk Factors.

Our business faces significant risks. You should carefully consider all of the information set forth in this Annual Report and in our other filings with the United States Securities and Exchange Commission, or the SEC, including the following risk factors which we face and which are faced by our industry. Our business, financial condition or results of operations could be materially adversely affected by any of these risks. This report also contains forward-looking statements that involve risks and uncertainties. Our results could materially differ from those anticipated in these forward-looking statements, as a result of certain factors including the risks described below and elsewhere in this Annual Report and our other SEC filings. See "Special Note Regarding Forward-Looking Statements" above.

Risks Related to the Development and Commercialization of Lumoxiti and Our Product Candidates

Biopharmaceutical development involves a high degree of uncertainty and most of our product candidates are in early stages of development, which makes it difficult to evaluate our current business and future prospects and may increase the risk of your investment.

We are a biopharmaceutical company with one commercial product, Lumoxiti, which we acquired in October 2018 from AstraZeneca and which we have not yet begun to commercialize on our own. The rest of our portfolio consists of product candidates, some of which we are co-developing, in the early stages of clinical development and preclinical programs. Although we have generated limited revenue from product sales from our only product approved by regulatory authorities, Lumoxiti, we do not expect to have any other significant product sales or related revenue unless our additional product candidates or any future product candidates are approved for sale and successfully commercialized. Accordingly, our ability to predict our future operating results or business prospects is more limited than if we had a longer history of approved products on the market or later-stage clinical product candidates. Although Lumoxiti has been approved by the U.S. Food and Drug Administration, or the FDA, it has only been marketed for a short period of time and, to date, AstraZeneca has been responsible for its commercialization.

A key element of our strategy is to mature and expand our portfolio of proprietary and partnered product candidates to address unmet medical needs in immuno-oncology. Although our research and development efforts to date have resulted in a pipeline of product candidates, all of our product candidates require additional development, regulatory review and approvals, substantial investment, access to sufficient commercial manufacturing capacity and significant marketing efforts before they can be commercialized and before we can generate any revenue from product sales or royalties. If we or our collaboration partners are unable to successfully develop and market these product candidates, our business, prospects, financial condition and results of operations may be adversely affected.

Aside from our acquisition of Lumoxiti, our operations to date have been limited to developing our product candidates and undertaking preclinical studies and clinical trials of our product candidates, including monalizumab, through our partnership with AstraZeneca, lacutamab and avdoralimab, our most advanced product candidates. The success in development of our current and future product candidates by us or our collaborators will depend on many factors, including:

- obtaining positive results in clinical trials including by demonstrating efficacy, safety and durability of effect of such product candidates;
- completing preclinical studies and receiving regulatory approvals or clearance for conducting clinical trials for our preclinical programs;
- receiving and maintaining approvals for commercialization of such product candidates from regulatory authorities;
- manufacturing or overseeing the manufacturing of our product candidates in acceptable quantities and at an acceptable cost;
- negotiating favorable terms in any collaboration, licensing or other arrangements into which we may enter, and performing our obligations pursuant to such arrangements;
- maintaining, protecting, enforcing and expanding our portfolio of intellectual property rights, including patents, trade secrets and know-how;
- avoiding and defending against third-party interference, infringement or other intellectual property claims; and
- maintaining and growing an organization of scientists, medical professionals, marketing, distribution and sales personnel and executives who can develop our product candidates and commercialize any approved products.

In addition, if we are unable to reduce our dependence on Lumoxiti and our current clinical and preclinical product candidates, either by in-licensing or acquiring new product candidates, developing our other product candidates or discovering new product candidates, we may be similarly adversely affected.

We will become fully responsible for the commercialization of Lumoxiti by end of 2020 but we are in the process of building our sales, marketing or commercial product distribution organization and have no experience in marketing or managing the manufacturing of products.

We are a biopharmaceutical company with one commercial product, Lumoxiti, which we recently acquired and have not yet begun to commercialize on our own. Even though we began to transition certain activities relating to the commercialization and manufacturing of Lumoxiti in the United States in the second half of 2019, AstraZeneca is still responsible for most of those aspects. We plan on being fully responsible for its commercialization by end of 2020 and for its manufacturing at a later date. We are in the process of building our sales, marketing or commercial product distribution capabilities and have no experience in managing the manufacturing of or marketing products. Developing our in-house marketing and sales capabilities and infrastructure requires significant expenses, management resources and time. If we are able to achieve this goal, we will compete with other pharmaceutical and biotechnology companies to recruit, hire, train and retain marketing, sales and distribution personnel.

If we are unable or decide not to establish or expand internal sales, marketing and commercial distribution capabilities for Lumoxiti or any of the products we may develop, we will likely pursue contractual arrangements for the sale, marketing and distribution of such products. However, there can be no assurance that we will be able to establish or maintain such arrangements, and if we do, we may have little or no control over the sales, marketing and commercial distribution efforts of such third parties. Any revenue we receive will depend upon the efforts of these third parties, and their efforts may not be successful. Our revenue from product sales may be lower than if we had commercialized Lumoxiti or any future product candidates we may develop, if approved, ourselves. We will also face competition in our search for third parties to assist us with the sales, marketing and distribution efforts of Lumoxiti or any of our product candidates that receive regulatory approval.

There can be no assurance that we will be able to develop in-house sales and commercial distribution capabilities or establish or maintain relationships with third-party partners to successfully commercialize any product in the United States, Europe or elsewhere and, as a result, we may not be able to generate product revenue.

If we are unable to establish sales, marketing and distribution capabilities for Lumoxiti on a timely basis, we may not be successful in commercializing Lumoxiti.

We have a limited sales, marketing or distribution infrastructure and have no experience in the sale, marketing or distribution of pharmaceutical products. To achieve commercial success for any approved product, including our approved product, Lumoxiti, we must either develop a sales and marketing organization or outsource these functions to third parties. Lumoxiti has only been commercially available for a short period of time and, to date, the responsibilities of commercialization have been handled by AstraZeneca. We plan to use a combination of focused in-house sales and marketing capabilities and third-party collaboration, licensing and distribution arrangements to sell any of our products that receive marketing approval.

The development of sales, marketing and distribution capabilities will require substantial resources, will be time-consuming, could delay the continued commercialization of Lumoxiti and could delay any other potential product launch. If the commercial launch of a product for which we recruit a sales force and establish marketing and distribution capabilities is delayed or does not occur for any reason, we could have prematurely or unnecessarily incurred these commercialization costs. This may be costly, and our investment could be lost if we cannot retain or reposition our sales and marketing personnel. In addition, we may not be able to hire or retain a sales force that is sufficient in size or has adequate expertise in the medical markets that we plan to target. If we are unable to establish or retain a sales force and marketing and distribution capabilities, our operating results may be adversely affected. If a potential partner has development or commercialization expertise that we believe is particularly relevant to one of our product candidates, we may seek to collaborate with that potential partner even if we believe we could otherwise develop and commercialize the product independently.

The scientific evidence to support the feasibility of developing product candidates is both preliminary and limited.

Our innovative approach to immuno-oncology aims to activate both the innate and adaptive immune systems against abnormal or cancerous cells and restore the body's ability to disrupt their proliferation, potentially leading to durable responses in patients. This approach is focused on developing checkpoint inhibitors, tumor-targeting antibodies and antibodies that affect the tumor microenvironment, and several of our product candidates rely on novel mechanisms of action for which we have limited scientific evidence and preclinical and clinical data.

We may not ultimately be able to provide the FDA, European Medicines Agency, or EMA, or other regulatory authorities with substantial clinical evidence to support a claim of efficacy and durability of response to enable the applicable regulators to approve our product candidates for any indication. This may occur because later clinical trials fail to reproduce favorable data obtained in earlier clinical trials, because the applicable regulator disagrees with how we interpret the data from these clinical trials or because the applicable regulator does not accept these therapeutic effects as valid endpoints in pivotal clinical trials that are sufficient to grant marketing approval. Additionally, because product candidates in later stages of clinical trials may fail to show the desired safety and efficacy traits despite having progressed through preclinical studies and earlier clinical trials our collaborators in earlier stages of clinical trials may eventually choose to discontinue later stage trials. For example, following initial promising results assessing the safety and efficacy of our product candidate lirilumab for the treatment of various cancer indications, our collaborator decided not to continue development after receiving Phase II clinical trial data.

In addition to the safety and efficacy traits of any product candidate, clinical trial failures may result from a multitude of factors including flaws in trial design, dose selection, placebo effect and patient enrollment criteria. A number of companies in the pharmaceutical industry have suffered significant setbacks in advanced clinical trials due to lack of efficacy or adverse safety profiles, notwithstanding promising results in earlier trials, and it is possible that we will as well. Based upon negative or inconclusive results, we or our collaborators may decide, or regulators may require us, to conduct additional clinical trials or preclinical studies. In addition, data obtained from trials and studies are susceptible to varying interpretations, and regulators may not interpret our data as favorably as we do, which may delay, limit or prevent regulatory approval.

We will also need to demonstrate that our product candidates are safe and well tolerated. We do not have significant data on possible harmful long-term effects of our product candidates and do not expect to have this data in the near future. As a result, our ability to generate clinical safety and efficacy data sufficient to support submission of a marketing application or commercialization of our product candidates is uncertain and is subject to significant risk.

We intend to develop monalizumab, avdoralimab (IPH5401) and other product candidates in combination with other therapies, which exposes us to additional risks.

We are currently developing monalizumab and avdoralimab, and may develop other product candidates, in combination with one or more currently approved cancer therapies. Specifically, with AstraZeneca, we are currently evaluating monalizumab in an ongoing open-label Phase Ib/II trial in combination with cetuximab, an epidermal growth factor receptor, or EGFR, inhibitor, and also in a triplet setting with cetuximab and durvalumab, an anti-PD-L1 immune checkpoint inhibitor. AstraZeneca is also currently evaluating monalizumab in ongoing Phase I and II trials in combination with durvalumab Additionally, we are currently conducting a Phase I/II clinical trial of avdoralimab in combination with durvalumab, initially in patients with select advanced solid tumors. Patients may not be able to tolerate our product candidates in combination with other therapies, and preliminary clinical results indicate that monalizumab, for example, has no meaningful clinical activity as a monotherapy. Even if any product candidate we develop were to receive marketing approval or be commercialized for use in combination with other existing therapies, we would continue to be subject to the risks that the FDA, EMA or other comparable foreign regulatory authorities could revoke approval of the therapy used in combination with our product candidate or that safety, efficacy, manufacturing or supply issues could arise with these existing therapies. Combination therapies are commonly used for the treatment of cancer, and we would be subject to similar risks if we develop any of our product candidates for use in combination with other therapies or for indications other than cancer. This could result in our own products, if approved, being removed from the market or being less successful commercially.

We may also evaluate monalizumab, avdoralimab or any other future product candidates in combination with one or more other cancer therapies that have not yet been approved for marketing by the FDA, EMA or comparable foreign regulatory authorities. We will not be able to market and sell monalizumab, avdoralimab or any other product candidate we develop in combination with any such unapproved cancer therapies that do not ultimately obtain marketing approval.

If the FDA, EMA or other comparable foreign regulatory authorities do not approve, revoke their approval of, or if safety, efficacy, manufacturing or supply issues arise with, the products or product candidates we choose to evaluate in combination with monalizumab, avdoralimab or any other product candidate we develop, we may be unable to obtain approval of or market monalizumab, avdoralimab or any other such product candidate we develop.

We and our collaborators rely on third parties to conduct some of our preclinical studies and clinical trials and perform other clinical development tasks. If these third parties do not successfully carry out their contractual duties, meet expected deadlines or comply with regulatory requirements, it may not be possible to obtain regulatory approval for, or commercialize, our product candidates and our business could be substantially harmed.

We have relied upon and plan to continue to rely upon third parties to conduct clinical trials of our product candidates or product candidates that we have licensed to them. For example, under our license and collaboration agreements with AstraZeneca, AstraZeneca is responsible for a number of clinical trials relating to monalizumab and IPH5201, which are subject to such agreements. In addition, we and our collaborators are responsible for and are supporting several clinical trials that are sponsored by academic or research institutions, known as investigator-sponsored trials. By definition, the financing, design and conduct of an investigator-sponsored trial are the sole responsibility of the sponsor, and we or our collaborators, as applicable, have limited control over these aspects of these clinical trials, or the timing and reporting of the data from these trials. We and our collaborators also depend on independent clinical investigators and Contract Research Organizations, or CROs, to conduct clinical trials. CROs may also assist in the collection and analysis of data. There are a limited number of CROs that have the expertise to run clinical trials of our product candidates. Identifying, qualifying and managing performance of third-party service providers can be difficult and time consuming and can cause delays in our development programs. These investigators and CROs are not our employees and we are not able to control, other than by contract, the amount of resources, including the amount of time, that they devote to our product candidates and clinical trials. If the investigators sponsoring trials of our product candidates, independent investigators participating in clinical trials that we or our collaborators are sponsoring or CROs fail to devote sufficient resources to our clinical trials and development of our product candidates or product candidates we have licensed to others, or if their performance is substandard, it may delay or compromise the prospects for approval and commercialization of any product candidates that we or our collaborators develop. In addition, the use of third-party service providers requires us to disclose our proprietary information to these parties, which could increase the risk that this information will be misappropriated, and we may not be able to obtain adequate remedies for such disclosure or misappropriation. Further, the FDA, EMA and other regulatory authorities require that we comply with standards, commonly referred to as Good Clinical Practice, or GCP, and other local legal requirements, including data privacy regulations, for conducting, recording and reporting clinical trials to assure that data and reported results are credible and accurate and that the rights, integrity and confidentiality of clinical trial subjects are protected. If clinical investigators or CROs fail to meet their obligations to us or comply with GCP procedures or other applicable legal requirements, the data generated in these trials may be deemed unreliable and the FDA, EMA or comparable foreign regulatory authorities may require us to perform additional trials before approving our marketing applications. We cannot assure that upon inspection by a given regulatory authority, such regulatory authority will determine that all of our clinical trials comply with GCP regulations.

In addition, our clinical trials must be conducted with product produced under current Good Manufacturing Practice, or cGMP, regulations. Our failure to comply with these regulations may require us to repeat clinical trials, which would delay the regulatory approval process. If clinical investigators or CROs do not successfully carry out their contractual duties or obligations or meet expected deadlines, if they need to be replaced or if the quality or accuracy of the data they obtain is compromised due to the failure to adhere to our protocol or regulatory requirements, or for other reasons, our clinical trials or those of our collaborators may be extended, delayed or terminated, and we or our collaborators may not be able to obtain regulatory approval for or successfully commercialize our product candidates. As a result, our results of operations and the commercial prospects for our product candidates would be harmed, our costs could increase and our ability to generate revenue could be delayed.

We are heavily dependent on the success of our current clinical-stage product candidates and we cannot be certain that we or our collaborators will be able to obtain regulatory approval for, or successfully commercialize, these product candidates.

Our business and future success depend on receiving regulatory approval for, and the commercial success of, our proprietary and partnered product candidates. We have agreements with AstraZeneca with respect to the advanced development, clinical trial collaboration and potential future registration and marketing of several of our product candidates, including monalizumab and IPH5201, and with Sanofi for the research and development of IPH61. Our near-term prospects depend heavily on AstraZeneca's successful clinical development and commercialization of monalizumab as well as the successful clinical development of our other product candidates. The clinical success of these product candidates will depend on a number of factors, including the ability and willingness of AstraZeneca and our other collaborators to complete ongoing clinical trials for monalizumab, our ability to complete the clinical trials for which we are responsible, and the safety, tolerability and efficacy of our product candidates.

We may not be successful in our efforts to develop additional products that receive regulatory approval and are successfully commercialized.

Other than our commercial product, Lumoxiti, our pipeline consists of various product candidates at different phases of preclinical and clinical development. The development of a product candidate is a long, costly and uncertain process, aimed at demonstrating the therapeutic benefit of a product candidate that competes with existing products or those being developed. There is no guarantee that we or our collaborators will be able to demonstrate a sufficient degree of clinical efficacy or safety of one or more of our proprietary or licensed product candidates in order to gain regulatory approval or to become commercially viable. The degree of uncertainty associated with clinical development and the risks associated with developing new product candidates may make it difficult to evaluate our current business and our future prospects.

We intend to continue to develop our product candidates that are currently in clinical trials, including monalizumab, lacutamab, avdoralimab and IPH5201. Monalizumab is currently being investigated in multiple Phase I and Phase II clinical trials under a co-development agreement with AstraZeneca. Lacutamab is currently being investigated in an open-label, multi-cohort Phase II clinical trial. Avdoralimab is currently being evaluated in Phase I and Phase II clinical trials. IPH5201 is currently being investigated in an open-label Phase I clinical trial sponsored by AstraZeneca. While we believe that we will eventually have the in-house capabilities to complete the development of monalizumab, lacutamab, avdoralimab and IPH5201, we have not yet completed the clinical trials for these or other product candidates, and there can be no assurance that these or other product candidates will gain regulatory approval or become commercially viable.

Delays in the preclinical development of a product candidate could lead to delays in initiating its clinical development. A failure in the preclinical development of a product candidate could lead to abandoning its development. Further delays or failures at the various clinical stages for a given indication could result in delay or halt the development of the product candidate in such indication or in other indications. Moreover, disappointing results during the initial phases of development are often not a sufficient basis for deciding whether or not to continue a project. At these early stages, sample sizes, the duration of studies and the parameters examined may not be sufficient to enable a definitive conclusion to be drawn, in which case further investigations are required. Conversely, promising results during the initial phases, and even after advanced clinical trials have been conducted, do not guarantee that a product candidate or an approved drug, such as Lumoxiti, will be successfully commercialized and marketed.

The risks related to the failure of a product candidate's development are highly related to the stage of maturity of the product candidate. Given the relatively early stage of the product candidates in our pipeline, there is a substantial risk that some or all of our product candidates will not obtain regulatory approval or be commercialized, which would have an adverse impact on our business, prospects, financial condition and results of operations.

We may not be successful in our efforts to identify, discover or develop additional product candidates.

We are seeking to develop a broad and innovative pipeline of product candidates in addition to monalizumab, lacutamab, avdoralimab and IPH5201. We may not be successful in identifying additional product candidates for clinical development for a number of reasons. For example, our research methodology may be unsuccessful in identifying potential product candidates or the potential product candidates we identify may have harmful side effects, lack of efficacy or other characteristics that make them unmarketable or unlikely to receive regulatory approval.

Research programs to pursue the development of our product candidates for additional indications and to identify new product candidates and disease targets require substantial technical, financial and human resources. Our research programs may initially show promise in identifying potential indications or product candidates, yet fail to yield results for clinical development for a number of reasons, including:

- the research methodology used may not be successful in identifying potential indications or product candidates;
- potential product candidates may, after further study, be shown to have harmful adverse effects or other characteristics that indicate they are unlikely to be effective drugs; or
- it may take greater human and financial resources to identify additional therapeutic opportunities for our product candidates or to develop suitable potential product candidates through internal research programs than we will possess, thereby limiting our ability to diversify and expand our product portfolio.

Accordingly, there can be no assurance that we will ever be able to identify additional indications for our product candidates or to identify and develop new product candidates through internal research programs. We may focus our efforts and resources on potential product candidates or other potential programs that ultimately prove to be unsuccessful.

We may encounter substantial delays in our clinical trials, or may be unable to conduct our clinical trials on the timelines we expect.

Clinical testing is expensive, time consuming, and subject to uncertainty. We cannot guarantee that any clinical trials will be conducted as planned or completed on schedule, if at all. A failure of one or more clinical trials can occur at any stage of testing, and our future clinical studies may not be successful. Events that may prevent successful or timely completion of clinical development include:

- inability to generate sufficient preclinical, toxicology, or other *in vivo* or *in vitro* data to support the initiation of clinical trials;
- delays or failure in reaching a consensus with regulatory agencies on clinical trial design;
- delays in reaching agreement on acceptable terms with prospective CROs and investigational sites, the terms of which can be subject to extensive negotiation and may vary significantly among different CROs and investigational sites;
- imposition of a temporary or permanent clinical hold by regulatory agencies, including as a result of a new safety finding that presents unreasonable risk to clinical trial participants, a negative finding from an inspection of our clinical trial operations or investigational sites, developments in trials conducted by competitors for related technology that raise regulators' concerns about risk to patients of the technology broadly or if a regulatory body finds that the investigational protocol or plan is clearly deficient to meet its stated objectives. For example, in November 2019, our TELLOMAK trial was put on full or partial holds in a number of countries. See "Item 4.B–Business Overview—Lacutamab, A Tumor Targeting Anti-KIR3DL2 Antibody—Clinical Development of Lacutamab—Phase II Clinical Trial (TELLOMAK);"

- delays in recruiting suitable patients to participate in our clinical trials;
- difficulty collaborating with patient groups and investigators;
- failure by us, our CROs or other third parties, including our collaborators, to adhere to clinical trial requirements;
- delays in having patients complete participation in a clinical trial or return for post-treatment follow-up;
- patients withdrawing from a clinical trial;
- occurrence of adverse events associated with a product candidate that are viewed to outweigh its potential benefits;
- changes in regulatory requirements and guidance that require amending or submitting new clinical trial protocols;
- regulatory feedback requiring us to amend the protocols of ongoing clinical trials in response to safety considerations, as we have previously been required to;
- changes in the standard of care on which a clinical development plan was based, which may require new or additional clinical trials;
- the cost of clinical trials of our product candidates being greater than we anticipate;
- clinical trials of our product candidates producing negative or inconclusive results, which may result in our deciding, or regulators requiring us, to conduct additional clinical trials or abandon product development programs;
- transfer of manufacturing processes to larger-scale facilities operated by either a contract manufacturing organization, or CMO, or by us, and delays or failure by our CMOs or us to make any necessary changes to such manufacturing process; and
- batch recalls, recalls of manufactured product candidates or delays in manufacturing, testing, releasing, validating, or importing or exporting sufficient stable quantities of our product candidates for use in clinical trials or the inability to do any of the foregoing.

Any inability to successfully complete preclinical and clinical development could result in additional costs to us or impair our ability to generate revenue. In addition, if we make manufacturing or formulation changes to our product candidates, we may be required to or we may elect to conduct additional studies to bridge our modified product candidates to earlier versions. Clinical study delays could also shorten any periods during which our products have patent protection and may allow our competitors to bring products to market before we do, which could impair our ability to successfully commercialize our product candidates and may harm our business and results of operations.

Lumoxiti or our product candidates in development may cause undesirable side effects or have other properties that could halt or delay their clinical development, prevent their regulatory approval, limit their commercialization or result in other negative consequences.

Use of our approved product, Lumoxiti, or our product candidates in development could be associated with side effects or adverse events which can vary in severity and in frequency. Undesirable side effects or unacceptable toxicities caused by our products or product candidates could cause us or regulatory authorities to interrupt, delay, or halt clinical trials. The FDA or European regulatory authorities could delay or deny approval of our product candidates for any or all targeted indications and negative side effects could result in a more restrictive label for any drug that is approved. Side effects such as toxicity or other safety issues associated with the use of our product candidates could also require us or our collaborators to perform additional studies or halt development of product candidates or sale of approved products.

Treatment-related side effects could also affect patient recruitment or the ability of enrolled subjects to complete the trial, or could result in potential product liability claims. In addition, these side effects may not be appropriately or timely recognized or managed by the treating medical staff, as toxicities resulting from immunotherapy are not normally encountered in the general patient population and by medical personnel. Inadequate training in recognizing or managing the potential side effects of our product candidates or our approved product, Lumoxiti, could result in adverse effects to patients, including death. Any of these occurrences may have an adverse impact on our business, prospects, financial condition and results of operations.

We face substantial competition from companies with significantly greater resources and experience.

The biotechnology and pharmaceutical market, and notably the immuno-oncology field, is characterized by rapidly advancing technologies, products protected by intellectual property rights and intense competition and is subject to significant and rapid change as researchers learn more about diseases and develop new technologies and treatments. We face potential competition from many different sources, including major pharmaceutical companies, specialty pharmaceutical and biotechnology companies, academic institutions and governmental agencies and public and private research institutions. Any product candidates that we or our collaborators successfully develop will compete with existing therapies and new therapies that may become available in the future. If competing products are marketed before ours, or at lower prices, or cover a wider therapeutic spectrum, or if they prove to be more effective or better tolerated, our business, prospects, financial condition and results of operations could be affected.

Many of our competitors who are developing immuno-oncology and anti-cancer therapies have considerably greater resources and experience in research, access to patients for clinical trials, drug development, finance, manufacturing, marketing, technology and personnel than we do. In particular, large pharmaceutical companies have substantially more experience than we do in conducting clinical trials and obtaining regulatory authorizations. Mergers and acquisitions in the pharmaceutical, biotechnology and diagnostic industries may result in even more resources being concentrated among a smaller number of our competitors. Smaller or early-stage companies may also prove to be significant competitors, particularly through collaborative arrangements with large and established companies. These competitors are also likely to compete with us to recruit and retain scientific and management personnel, acquire rights for promising product candidates and other complementary technologies, establish clinical trial sites and patient registration for clinical trials and acquire technologies complementary to, or necessary for, our programs, as well as to enter into collaborations with partners who have access to innovative technologies. If we cannot successfully compete with new or existing products, our marketing and sales will suffer and we may never be profitable. Should any of these risks materialize, our business, prospects, financial condition and results of operations may be adversely affected.

We cannot guarantee that our product candidates or our approved product, Lumoxiti, will:

- obtain regulatory authorizations or become commercially available before those of our competitors;
- remain competitive in the face of other products developed by our competitors, which may prove to be safer, are more effective, have fewer or less severe side effects, are more convenient, have a broader label, have more robust intellectual property protection or are less expensive;
- remain competitive in the face of products of competitors that are more efficient in their manufacturing or more effective in their marketing; and
- not become obsolete or unprofitable due to technological progress or other therapies developed by our competitors.

In addition, while our approved product and any future product candidates that are approved may compete with many existing drugs or other therapies, to the extent they are solely used in combination with these therapies, our product candidates will not be competitive with such therapies but any sales of such products could be limited to sales of the combination therapy. In this case, we would be exposed to the same competitive risks as the product used in combination with our product, such as a product that is marketed before the combination therapy, has lower prices, covers a wider therapeutic spectrum or proves to be more effective or better tolerated. For additional information regarding competition to our business see "Business—Competition."

We depend on enrollment of patients in our clinical trials for our product candidates.

Successful and timely completion of clinical trials will require that we or our subcontractors enroll a sufficient number of suitable patients. Clinical trials may be subject to delays as a result of patient enrollment taking longer than anticipated or patient withdrawal. Patient enrollment depends on many factors, including the size and nature of the patient population, which is typically limited for rare or orphan diseases making the enrollment more difficult, eligibility criteria for the trial, the proximity of patients to clinical sites, the design of the clinical protocol, the availability of competing clinical trials, the availability of new drugs approved for the indication the clinical trial is investigating, and clinicians' and patients' perceptions as to the potential advantages of the drug being studied in relation to other available therapies. For example, we are developing lacutamab for the treatment of cutaneous T-cell lymphoma, or CTCL. CTCL is an orphan disease, which means that the potential patient population is limited. In addition, there are several other product candidates potentially in development for the indications for which we are developing product candidates, and we may compete for patients with the sponsors of trials for those drugs. These factors may make it difficult for us to enroll enough patients to complete our clinical trials in a timely and cost-effective manner. Delays in the completion of any clinical trial of any of our product candidates will increase our costs, slow down our product candidate development and approval process and delay or potentially jeopardize our ability to commence product sales and generate revenue. In addition, some of the factors that cause, or lead to, a delay in the commencement or completion of clinical trials may also ultimately lead to the inability to obtain regulatory approval of our product candidates.

Coverage and reimbursement may be limited or unavailable in certain market segments for our approved product, Lumoxiti, and product candidates, if approved, which could make it difficult for us to sell our product or product candidates profitably.

Successful sales of Lumoxiti and our product candidates, if approved, will depend, in part, on the availability of adequate coverage and reimbursement from government authorities and third-party payors, such as private health insurers and health maintenance organizations. Patients who are provided medical treatment for their conditions generally rely on third-party payors to reimburse all or part of the costs associated with their treatment. Adequate coverage and reimbursement from governmental healthcare programs, such as Medicare and Medicaid in the United States or the Social Security in France, and commercial payors are critical to new product acceptance.

Government authorities and third-party payors, such as private health insurers and health maintenance organizations, decide which drugs and treatments they will cover and the amount of reimbursement. Coverage and reimbursement by a third-party payor may depend upon a number of factors, including the third-party payor's determination that use of a product is:

- a covered benefit under its health plan;
- safe, effective and medically necessary;
- appropriate for the specific patient;
- cost-effective; and
- neither experimental nor investigational.

Policies for coverage and reimbursement for products vary among third-party payors. No uniform policy of coverage and reimbursement for products exists among third-party payors, and third-party payors are increasingly challenging the price, examining the medical necessity, and reviewing the cost-effectiveness of approved drugs and medical services, in addition to questioning their safety and efficacy. As a result, obtaining coverage and reimbursement approval of a product from a government or other third-party payor is a time-consuming and costly process that could require us or our partners to provide to each payor supporting scientific, clinical and cost-effectiveness data for the use of our products on a payor-by-payor basis, with no assurance that coverage and adequate reimbursement will be obtained. Coverage decisions may depend upon clinical and economic standards that disfavor new drug products when more established or lower cost therapeutic alternatives are already available or subsequently become available. Even if we obtain coverage for a given product, the resulting reimbursement payment rates might not be adequate for us to achieve or sustain profitability or may require co-payments that patients find unacceptably high. Additionally, third-party payors may not cover, or provide adequate reimbursement for, long-term follow-up evaluations required following the use of our product candidates or approved products.

Because our product candidates and our approved product, Lumoxiti, represent new approaches to the treatment of cancer and accordingly, may have a higher cost than conventional therapies and may require long-term follow-up evaluations, the risk that coverage and reimbursement rates may be inadequate for us to achieve profitability may be elevated. There are currently a limited number of immunotherapy products that are designed to treat cancer on the market and, accordingly, there is less experience or precedent for the reimbursement of such treatments by governmental entities or third-party payors.

Government restrictions on pricing and reimbursement and other healthcare cost-containment initiatives may negatively affect our ability to generate revenues for Lumoxiti and other product candidates for which we obtain regulatory approval.

Government authorities and other third-party payors are developing increasingly sophisticated methods of controlling healthcare costs, including by limiting coverage and the amount of reimbursement for particular medications. Increasingly, third-party payors are requiring that pharmaceutical and biotechnology companies provide them with predetermined discounts from list prices as a condition of coverage, are using restrictive formularies and preferred drug lists to leverage greater discounts in competitive classes and are challenging the prices charged for medical products.

In the United States, the European Union and other foreign jurisdictions, there have been a number of legislative and regulatory changes to the healthcare system that could affect our or our partners' ability to sell our products profitably. By way of example, in the United States, the Patient Protection and Affordable Care Act, as amended by the Health Care and Education Reconciliation Act, which we collectively refer to as the ACA, was enacted in March 2010 and is having a significant impact on the provision of, and payment for, healthcare in the United States. The ACA was intended to broaden access to health insurance, reduce or constrain the growth of healthcare spending, enhance remedies against fraud and abuse, add new transparency requirements for the healthcare and health insurance industries, impose new taxes and fees on the health industry and impose additional health policy reforms.

Among the provisions of the ACA of importance to our product candidates are:

- an annual, nondeductible fee on any entity that manufactures or imports specified branded prescription drugs and biologic agents, apportioned among these entities according to their market share in certain government healthcare programs;

- an increase in the statutory minimum rebates a manufacturer must pay under the Medicaid Drug Rebate Program to 23.1% and 13.0% of the average manufacturer price for branded and generic drugs, respectively;

- a new Medicare Part D coverage gap discount program, in which manufacturers must now agree to offer 70% point-of-sale discounts off negotiated prices of applicable brand drugs to eligible beneficiaries during their coverage gap period, as a condition for a manufacturer's outpatient drugs to be covered under Medicare Part D;

- extension of a manufacturer's Medicaid rebate liability to covered drugs dispensed to individuals who are enrolled in Medicaid managed care organizations;
- expansion of eligibility criteria for Medicaid programs by, among other things, allowing states to offer Medicaid coverage to additional individuals and by adding new mandatory eligibility categories for certain individuals with income at or below 133% of the federal poverty level, thereby potentially increasing a manufacturer's Medicaid rebate liability;
- expansion of the entities eligible for discounts under the Public Health Service pharmaceutical pricing program; and
- a new Patient-Centered Outcomes Research Institute to oversee, identify priorities in, and conduct comparative clinical effectiveness research, along with funding for such research.

There have been judicial and Congressional challenges to certain aspects of the ACA, as well as recent efforts by the Trump administration to repeal and replace certain aspects of the ACA, and we expect such challenges to continue. Since January 2017, President Trump has signed two executive orders designed to delay the implementation of certain provisions of the ACA or otherwise circumvent some of the requirements for health insurance mandated by the ACA. Concurrently, Congress has considered legislation that would repeal or repeal and replace all or part of the ACA. While Congress has not passed comprehensive repeal legislation, two bills affecting the implementation of certain taxes under the ACA have been signed into law. The Tax Cuts and Jobs Act of 2017 includes a provision that repealed, effective January 1, 2019, the tax-based shared responsibility payment imposed by the ACA on certain individuals who fail to maintain qualifying health coverage for all or part of a year that is commonly referred to as the "individual mandate." In addition, the 2020 federal spending package permanently eliminated, effective January 1, 2020, the ACA-mandated "Cadillac" tax on high-cost employer-sponsored health coverage and medical device tax and, effective January 1, 2021, also eliminates the health insurer tax. In July and December 2018, Centers for Medicare & Medicaid Services, or CMS, within the United States Department of Health and Human Services, published final rules with respect to permitting further collections and payments to and from certain ACA qualified health plans and health insurance issuers under its risk adjustment program in response to the outcome of federal district court litigation regarding the method CMS uses to determine this risk adjustment. On December 14, 2018, a Texas U.S. District Court Judge ruled that the ACA is unconstitutional in its entirety because the "individual mandate" was repealed by the U.S. Congress as part of the Tax Cuts and Jobs Act of 2017 Act. Additionally, on December 18, 2019, the U.S. Court of Appeals for the 5th Circuit upheld the Texas U.S. District Court ruling and remanded the case back to the District Court to determine whether the remaining provisions of the ACA are invalid as well. It is unclear how this decision, subsequent appeals, and other efforts to repeal and replace the ACA will impact the ACA.

Other legislative changes have been proposed and adopted since the ACA was enacted. These changes include aggregate reductions to Medicare payments to providers of 2% per fiscal year, which went into effect in April 2013 and will remain in effect through 2027 unless additional Congressional action is taken. Both the Budget Control Act of 2011 and the American Taxpayer Relief Act of 2012, or ATRA, further reduced Medicare payments to several providers and the ATRA increased the statute of limitations period for the government to recover overpayments to providers from three to five years. Additional legislative proposals to reform healthcare and government insurance programs, along with the trend toward managed healthcare in the United States, could influence the purchase of medicines and reduce demand and prices for our product candidates, if approved. This could harm our or our partners' ability to market any drugs and generate revenues. Cost containment measures that healthcare payors and providers are instituting and the effect of further healthcare reform could significantly reduce potential revenues from the sale of any of our product candidates approved in the future, and could cause an increase in our compliance, manufacturing, or other operating expenses.

In addition, in the United States, federal programs impose penalties on drug manufacturers in the form of mandatory additional rebates and/or discounts if commercial prices increase at a rate greater than the U.S. Bureau of Labor Statistics consumer price index, and these rebates or discounts, which can be substantial, may affect our ability to raise commercial prices.

Further, there has been increasing legislative and enforcement interest in the United States with respect to drug pricing practices. Specifically, there have been several recent U.S. Congressional inquiries and proposed and enacted federal and state legislation designed to, among other things, bring more transparency to drug pricing, review the relationship between pricing and manufacturer patient programs, reduce the cost of drugs under Medicare, and reform government program reimbursement methodologies for drugs. At the federal level, the Trump administration's budget proposal for fiscal years 2020 contains further drug price control measures that could be enacted during the budget process or in other future legislation. The Trump administration also released a "Blueprint", or plan, to lower drug prices and reduce out of pocket costs of drugs that contains additional proposals to increase manufacturer competition, increase the negotiating power of certain federal healthcare programs, incentivize manufacturers to lower the list price of their products and reduce the out of pocket costs of drug products paid by consumers. For example, in May 2019, CMS issued a final rule to allow Medicare Advantage Plans the option of using step therapy for Part B drugs beginning January 1, 2020. This final rule codified CMS's policy change that was effective January 1, 2019. While some measures may require additional authorization to become effective, the U.S. Congress and the Trump administration have each indicated that it will continue to seek new legislative and/or administrative measures to control drug costs. At the state level, legislatures are increasingly passing legislation and implementing regulations designed to control pharmaceutical and biological product pricing, including price or patient reimbursement constraints, discounts, restrictions on certain product access and marketing cost disclosure and transparency measures, and, in some cases, designed to encourage importation from other countries and bulk purchasing.

In some countries, the proposed pricing for a biopharmaceutical product must be approved before it may be lawfully marketed. In addition, in certain foreign markets, the pricing of biopharmaceutical product is subject to government control and reimbursement may in some cases be unavailable. The requirements governing drug pricing vary widely from country to country. For example, the European Union provides options for its member states to restrict the range of medicinal products for which their national health insurance systems provide reimbursement and to control the prices of medicinal products for human use. An EU member state may approve a specific price for the medicinal product, it may refuse to reimburse a product at the price set by the manufacturer or it may instead adopt a system of direct or indirect controls on the profitability of the company placing the medicinal product on the market. There can be no assurance that any country that has price controls or reimbursement limitations for biopharmaceutical products will allow favorable reimbursement and pricing arrangements for any of our products. Historically, biopharmaceutical products launched in the European Union do not follow price structures of the United States and generally tend to have significantly lower prices.

We believe that pricing pressures will continue and may increase, which may make it difficult for us to sell Lumoxiti or any of our product candidates that may be approved in the future at a price acceptable to us or any of our existing or future collaborators.

Lumoxiti and any of our other product candidates, if approved and commercialized, may fail to achieve market acceptance by physicians, patients, third-party payors or the medical community to a degree that is necessary for commercial success.

Even if the medical community accepts a product as safe and efficacious for its indicated use, physicians may choose to restrict the use of the product if we are unable to demonstrate that, based on experience, clinical data, side-effect profiles and other factors, our drug is preferable to any existing drugs or treatments. We cannot predict the degree of market acceptance of Lumoxiti or any product candidate that receives marketing authorization, which will depend on a number of factors, including, but not limited to:

- the demonstration of the clinical efficacy and safety of the drug;
- the approved labeling for the drug and any required warnings;
- prevalence and severity of adverse side effects;
- the advantages and disadvantages of the drug compared to alternative treatments;
- ease of the drug's use;
- our ability to educate the medical community about the safety and effectiveness of the drug;
- the scope of any approval provided by the FDA or foreign regulatory authorities;
- publicity about our product or about competitive products;
- the coverage and reimbursement policies of government and commercial third-party payors pertaining to the drug;
- the market price of our drugs relative to competing treatments; and
- due to the rarity of orphan diseases, it could be difficult finding patients seeking treatment for Lumoxiti.

Poor market penetration could have an adverse effect on our business, prospects, financial condition and results of operations.

Even if some of our other product candidates receive marketing authorization, the terms of such approval, ongoing regulation and potential post-marketing restrictions or withdrawal from the market may limit how the drug may be marketed and may subject us to penalties for failure to comply with regulatory requirements, which could impair our ability to generate revenues.

Even if any of our other product candidates receives marketing authorization, such approval may carry conditions that limit the market for the drug or put the drug at a competitive disadvantage relative to alternative therapies. Regulators may limit the marketing of products to particular indications or patient populations. Regulators may require warning labels and drugs with warnings are subject to more restrictive marketing regulations than drugs without such warnings. These restrictions could make it more difficult to market any drug effectively. Marketing restrictions may reduce the revenue that we are able to obtain.

Any of our product candidates for which we obtain marketing authorization, and the manufacturing processes, post-approval studies and measures, labeling, advertising and promotional activities for such products, among other things, will be subject to continual requirements of and review by the FDA, EMA and other regulatory authorities. These requirements include submissions of safety and other post-marketing information and reports, registration and listing requirements, requirements relating to manufacturing, quality control, quality assurance and corresponding maintenance of records and documents, requirements regarding the distribution of samples to physicians and recordkeeping. Even if marketing authorization of a product candidate is granted, the approval may be subject to limitations on the indicated uses for which the product may be marketed or to the conditions of approval, including the FDA requirement to implement a risk evaluation and mitigation strategy to ensure that the benefits of a drug or biological product outweigh its risks.

The FDA, EMA and other national authorities may also impose requirements for costly post-marketing studies or clinical trials and surveillance to monitor the safety or efficacy of a product, such as long-term observational studies on natural exposure. The FDA and other agencies, including the U.S. Department of Justice, closely regulate and monitor the post-approval marketing and promotion of products to ensure that they are manufactured, marketed and distributed only for the approved indications and in accordance with the provisions of the approved labeling. Later discovery of previously unknown problems with our product candidates or with manufacturing processes, including adverse events of unanticipated severity or frequency, or failure to comply with regulatory requirements, may result in revisions to the approved labeling to add new safety information; imposition of post-market studies or clinical studies to assess new safety risks, or the imposition of distribution or other restrictions including suspension of production and/or distribution and withdrawal of regulatory approvals. Failure to comply with these requirements may lead to financial penalties, compliance expenditures, total or partial suspension of production and/or distribution, product seizure or detention, refusal to permit the import or export of products, suspension of the applicable regulator's review of a company's submissions, enforcement actions, product recalls, injunctions and even criminal prosecution, any of which could materially and adversely affect our business, financial condition and results of operations.

The recent global COVID-19 pandemic could adversely affect our business, financial condition and results of operations.

An outbreak of a novel strain of coronavirus (i.e. COVID-19), which first emerged in the PRC in late December 2019, has since spread to other parts of the world, including the United States and Europe. We may experience or continue to experience disruptions relating to this pandemic that could severely impact our business, financial condition and results of operations.

In France, on March 12, 2020, the French government announced the closure of all schools and the closure of all non-essential businesses until further notice. On March 16, 2020, President Macron announced the confinement of the French population for a minimum of 15 days. Such confinement has been subsequently extended and, on April 13, 2020, President Macron announced that such confinement will not be lifted until at least May 11, 2020. On March 13, 2020, President Trump declared a national emergency under the Robert T. Stafford Disaster Relief and Emergency Assistance Act of 1988, and subsequently, many U.S. states closed their schools and public gathering places.

Because of these containment measures, we have temporarily closed all of our corporate sites in France and the United States, and in particular our Luminy site, where we carry out our laboratory experiments. However, our Luminy site has been partially reopened for our exploratory study on COVID-19 therapies. We may take further actions required by authorities or that we determine are in the best interests of our employees, customers, partners, suppliers and counterparts. We cannot be certain that such measures will be sufficient to mitigate the risks posed by COVID-19, and the implementation of such measures (or their insufficiency) could harm our ability to perform critical functions. The unavailability of our staff could adversely impact the quality and continuity of our operations. Furthermore, we expect these containment measures to delay our planned recruitment of additional employees, which is necessary to support our growth.

The closure of our sites could also cause a delay in obtaining certain data from our research and development programs, and thereby delay our mid-term development timelines. Restarting the Luminy site and its activities could be a potentially long, costly and complex process.

Because of the spread of COVID-19, we may experience or continue to experience the following adverse impacts on our clinical trials:

- diversion of investigational sites and physicians adhering to government recommended protocols that interfere with our clinical trials, including the clinical trials carried out by our hospital or industrial partners, whose crisis management decisions are not under our control;
- delays or difficulties in enrolling new patients in our clinical trials;
- delays or difficulties in continuing treatment of patients already enrolled in our clinical trials, which delays obtaining results from such trials;
- delays or interruptions of key clinical trial activities due to shortages or interruptions in the supply chain of third-party marketed drugs used in connection with our products in our clinical trials as well as active pharmaceutical ingredients or components used to manufacture our marketed drugs;
- deterioration of the quality and completeness of data obtained during our clinical trials due to limitations in patient monitoring as a result of containment measures and the possibility of participating patients to be infected with COVID-19, which could result in refusals of local regulatory authorities to accept data from such clinical trials;

- changes in local regulations as part of a response to the COVID-19 pandemic, which could require us to change the ways in which our clinical trials are conducted, which could result in unexpected costs or decisions to discontinue such clinical trials altogether; and

- delays in necessary interactions with local regulators, ethics committees and other important agencies and contractors due to limitations in employee resources or forced furlough of government employees, or the need of these institutions to prioritize COVID-19 matters.

It is not only true for trials we sponsor but also for trials sponsored by academic or industrial partners, which might take decision in this context that we cannot control. We expect those factors to have a higher impact on our product candidates at early clinical trial stages. For example, AstraZeneca has made the decision to temporarily pause enrollment of the Phase I clinical trial evaluating IPH5201, an anti-CD39 blocking monoclonal antibody, in adult patients with advanced solid tumors, due to the COVID-19 pandemic.

The COVID-19 pandemic could also delay or impair our sales of Lumoxiti. Since the end of the fourth quarter of 2019, we have become the primary commercial entity promoting Lumoxiti, having transitioned all sales and medical affairs activities, including medical science liaisons and sales representatives, from AstraZeneca to us. The COVID-19 pandemic could impair our ability to achieve our product development or commercialization objectives in the timeframes we had expected due to the factors listed above and, also due to limited opportunities for in-person marketing of Lumoxiti to oncology healthcare professionals due to social distancing measures and interruptions of treatments for Lumoxiti patients as a result of limited access to physicians.

As a consequence, we may not receive milestone or royalty payments from our partners. See "—If we do not achieve our product development or commercialization objectives in the timeframes we expect, we may not receive product revenue or milestone or royalty payments and we may not be able to conduct our operations as planned."

The global COVID-19 pandemic continues to evolve. The extent to which the COVID-19 pandemic may affect our business and clinical trials will depend on future developments, which are highly uncertain and cannot be predicted with confidence, such as the ultimate geographic spread of the disease, the duration of the outbreak, travel restrictions and social distancing in the European Union, the United States and other countries, business closures or business disruptions and the effectiveness of actions taken in the European Union, the United States and other countries to contain and treat the disease. Further, the adverse effect on the financial markets, on the market price of our ADSs and/or ordinary shares in the long term, is unknown. To date, the global economy remains catastrophically affected by the outbreak of the COVID-19 pandemic.

We are exposed to a number of regulatory and commercial risks relating to the United Kingdom's exit from the European Union.

The United Kingdom formally withdrew from the EU ("Brexit") on January 31, 2020 on the basis of the Third Reading of the Withdrawal Agreement Bill. There will be a short transitional/implementation period which is currently due to end on December 31, 2020 during which the United Kingdom and the EU are negotiating transitional arrangements. The United Kingdom has stated that it wants the transition period to expire, and the transitional arrangements to be agreed, by December 31, 2020. During the transition period the existing rules on trade, travel, and business for the United Kingdom and the EU continue to apply. Any changes that may occur after the transitional period are currently uncertain. There is still concern that the United Kingdom does not find an agreement with the EU regarding such transitional arrangements and the U.K. Government has commenced preparations for a "hard" or "no-deal" Brexit to minimize the risks for firms and businesses associated with an exit with no transitional agreement.

Our clinical trials in the U.K. are subject to the UK Medicines and Healthcare Products Regulatory Agency, or MHRA and EMA regulations. If the U.K. proceeds to leave the EU without any formal withdrawal arrangements, there could be considerable uncertainty as to the continued applicability of such regulations in the U.K. We are currently conducting clinical trials of lacutamab in the U.K. and we cannot be certain such trials will not be affected if the U.K. leaves the EU without any formal withdrawal arrangements. Lacutamab received an orphan drug designation in the EU, which provides for an exclusive 10-year marketing period during which no similar product may apply for a marketing authorization in the EU for the same indication, as well as an exemption from regulatory fees and other advantages. We may lose this designation and benefits for lacutamab in the U.K. in the event that the U.K. exits the EU without any formal withdrawal arrangements. Furthermore, if we obtain an MA in the EU, such authorization may not permit us to engage in commercial sales of our product candidates in the U.K. and we may not be able to obtain the required authorization from the U.K. regulator. If we are required to obtain additional authorizations in the U.K., we will incur additional costs to obtain such authorizations, which may be significant.

Risks Related to our Financial Position and Capital Needs

We have incurred and may in the future incur significant operational losses related to our research and development activities.

We have incurred net losses in each year since our inception except for the years ended December 31, 2016 and 2018. Our net income (loss) was €(48.4) million, €3.0 million and €(20.8) million for the years ended December 31, 2017, 2018 and 2019, respectively. Substantially all of our net losses resulted from costs incurred in connection with our development programs and from selling, general and administrative expenses associated with our ongoing operations. We expect to incur significant expenses and operating losses for the foreseeable future.

We currently only have one product, Lumoxiti, that has received regulatory approval for sale or has generated revenues from commercial sales, and none of our other product candidates have received regulatory approval. Unless this happens, the likelihood and amount of our future operational losses will depend on several factors, including the commercialization of our approved product, Lumoxiti, the pace and amount of our future expenditures in connection with our product candidates and development programs and our ability to obtain funding through milestone or royalty payments under our license and collaboration agreements, equity or debt financings, strategic collaborations and government grants and tax credits. We expect that our main source of income for the near- and medium-term will be:

- revenue from the commercialization of Lumoxiti;
- payments received under our license and collaboration agreements with third parties, including AstraZeneca and Sanofi; and
- government grants and research tax credits.

The interruption of one of those sources of income, including as a result of the COVID-19 pandemic, could have a material adverse effect on our business, prospects, financial condition and results of operations. See "—The recent global COVID-19 pandemic could adversely affect our business, financial condition and results of operations."

Our ability to be profitable in the future will depend on our ability to generate revenue from sales relating to our sole commercial product, Lumoxiti, and other product candidates, if approved, and our ability to obtain regulatory approval for marketing our product candidates. If our product candidates receive regulatory approval, our future revenues will depend upon the size of any markets in which our product candidates have received approval, and market acceptance, reimbursement from third-party payors and market share. Any of these factors could have a material adverse effect on our business, prospects, financial condition and results of operations.

We may need to raise additional funding to complete the development and any commercialization of our product candidates, which may not be available on acceptable terms, or at all, and failure to obtain this necessary capital when needed may force us to delay, limit or terminate our product development efforts or other operations.

We are currently advancing our product candidates through preclinical and clinical development, and anticipate relying on partners less as we develop into a commercial stage biopharmaceutical company with research, development and commercial capabilities. We currently retain the full development and marketing rights to lacutamab and avdoralimab and may retain rights to additional proprietary product candidates in the future. The development of immunotherapy product candidates is expensive, and we expect our research and development expenses to increase as we advance our product candidates through clinical trials and regulatory approvals. If clinical trials are successful and if we obtain regulatory approval for product candidates that we develop, we expect to incur commercialization expenses before these product candidates are marketed and sold.

We anticipate that our expenses will increase substantially if and as we:

- continue our research, preclinical and clinical development of our product candidates if our current collaboration partners cease their collaborations with us;
- expand the scope of our current clinical trials for our product candidates;
- initiate additional preclinical, clinical or other studies for our product candidates;
- further develop manufacturing processes for our product candidates;
- change or add additional manufacturers or suppliers;
- seek regulatory and marketing authorizations for our product candidates that successfully complete clinical studies;
- establish a sales, marketing and distribution infrastructure to commercialize Lumoxiti and any other products for which we may obtain marketing authorization;

- seek to identify and validate additional product candidates that may result in additional preclinical, clinical or other product studies;
- acquire or in-license other product candidates and technologies;
- make milestone or other payments under any in-license agreements;
- maintain, protect, defend and expand our intellectual property portfolio;
- attract and retain new and existing skilled personnel;
- create additional infrastructure to support our operations as a public company in the United States following the completion of the October 2019 global offering; and
- experience any delays or encounter issues with any of the above.

As of December 31, 2019, we had cash, cash equivalents, short-term investments and non-current financial assets of €255.9 million. We believe our cash, cash equivalents, short-term investments and non-current financial assets together with our cash flow from operations, will be sufficient to fund our operations for the next twelve months. However, in order to complete the development process, obtain regulatory approval and, if approved, commercialize our product candidates that we are developing in-house, including lacutamab and avdoralimab, develop our proprietary technology and develop a pipeline of additional product candidates, we will require additional funding. Our existing resources may not be sufficient to cover any additional financing needs, in which case new funding would be required. See "—We have incurred and may in the future incur significant operational losses related to our research and development activities." The conditions and arrangements for such new financing would depend, among other factors, on economic and market conditions that are beyond our control, including the current volatility in the capital markets as a result of the COVID-19 pandemic. See "—The recent global COVID-19 pandemic could adversely affect our business, financial condition and results of operations."

Any additional fundraising efforts may divert our management from their day-to-day activities, which may adversely affect our ability to develop and commercialize our product candidates. In addition, we cannot guarantee that future financing will be available in sufficient amounts or on terms acceptable to us, if at all. Under French law, our share capital may be increased only with shareholders' approval at an extraordinary general shareholders' meeting on the basis of a report from the Executive Board. In addition, the French Commercial Code imposes certain limitations on our ability to price certain offerings of our share capital without preferential subscription rights (droit préférentiel de souscription), which limitation may prevent us from successfully completing any such offering. See "Description of Share Capital—Key Provisions of Our Bylaws and French Law Affecting Our Ordinary Shares."

Moreover, the terms of any financing may adversely affect the holdings or the rights of our shareholders and the issuance of additional securities, whether equity or debt, by us, or the possibility of such issuance, may cause the market price of our ordinary shares or the ADSs to decline. The sale of additional equity or convertible securities would dilute our shareholders. We may seek funds through arrangements with collaborative partners or otherwise at an earlier stage of product development than otherwise would be desirable and we may be required to relinquish rights to some of our technologies or product candidates or otherwise agree to terms unfavorable to us, any of which may have a material adverse effect on our business, prospects, financial condition and results of operations.

If we need and are unable to obtain funding on a timely basis, we may be required to significantly curtail, delay or discontinue one or more of our research or development programs or the commercialization of any product or product candidate or we may be unable to expand our operations or otherwise capitalize on our business opportunities as desired, which could impair our growth prospects. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

The terms of our loan agreement with Société Générale and certain other loan obligations place restrictions on our operating and financial flexibility.

In July 2017, we entered into a loan and security agreement with Société Générale (the "Loan Agreement") in order to finance the construction of our future headquarters. The Loan Agreement is secured by collateral in the form of financial instruments valued at €15.2 million held at Société Générale. As of December 31, 2019, we had drawn down €15.2 million under the Loan Agreement. The Loan Agreement subjects us to a covenant to maintain a minimum balance of our total cash, cash equivalents and current and non-current financial assets as of each fiscal year end at least equal to the amount of outstanding principal under the Loan Agreement. Compliance with this covenant may limit our flexibility in operating our business and our ability to take actions that might be advantageous to us and our shareholders. For example, if we fail to meet our minimum cash covenant and we are unable to raise additional funds or obtain a waiver or other amendment to the Loan Agreement, we may be required to delay, limit, reduce or terminate certain of our clinical development efforts.

Additionally, we may be required to repay the entire amount of outstanding indebtedness under the Loan Agreement in cash if we fail to stay in compliance with our covenant or suffer some other event of default under the Loan Agreement. Under the Loan Agreement, an event of default will occur if, among other things, we fail to make payments under the Loan Agreement or we breach our covenant under the Loan Agreement. We may not have enough available cash or be able to raise additional funds through equity or debt financings to repay such indebtedness at the time any such event of default occurs. In that case, we may be required to delay, limit, reduce or terminate our clinical development efforts or grant rights to others to develop and market product candidates that we would otherwise prefer to develop and market ourselves. Société Générale could also exercise its rights as collateral agent to take possession and dispose of the collateral securing the loan for its benefit. Our business, financial condition and results of operations could be substantially harmed as a result of any of these events.

We are also subject to a €1.5 million PTZI loan (Prêt à Taux Zéro Innovation—interest-free loan for innovation) from Banque Publique d'Investissement, or BPI France, entered into in 2013. In addition, in 2008 we entered into a finance lease agreement with Sogebail, a subsidiary of Société Générale. The present value of all minimum lease payments under this agreement is €0.3 million as of December 31, 2019. Our business, financial condition and results of operations could likewise be substantially harmed if, among other things, we fail to make payments under these agreements, or we breach any of our covenants under these agreements.

If we do not achieve our product development or commercialization objectives in the timeframes we expect, we may not receive product revenue or milestone or royalty payments and we may not be able to conduct our operations as planned.

We have received and expect to continue to receive payments from our collaborators when we satisfy certain pre-specified milestones in our licensing or collaboration agreements. We currently depend to a large degree on these milestone payments from our existing collaborators in order to fund our operations and we may enter into new collaboration agreements that also provide for milestone payments. For example, we have granted options to license or acquire intellectual property rights in certain of our programs to our collaborators which, if exercised, will result in up-front option exercise fees and, assuming we meet all specified development, clinical, regulatory and sales milestones, could result in substantial milestone payments. These milestone payments are generally dependent on the accomplishment of various scientific, clinical, regulatory, sales and other product development objectives, and the successful or timely achievement of many of these milestones is outside of our control, in part because some of these activities are being or will be conducted by our collaborators. If we or our collaborators fail to achieve the applicable milestones, we may not receive such milestone payments. A failure to receive any such milestone payment may cause us to:

- delay, reduce or terminate certain research and development programs;
- reduce headcount;
- raise funds through additional equity or convertible debt financings that could be dilutive to our shareholders and holders of our ADSs;
- obtain funds through collaboration agreements that may require us to assign rights to technologies or products that we would have otherwise retained;
- sign new collaboration or license agreements that may be less favorable than those we would have obtained under different circumstances; and
- consider strategic transactions or engaging in a joint venture with a third-party.

In addition, although we may be eligible to receive an aggregate of approximately $5.5 billion in future contingent payments from existing collaboration agreements and any license agreements that become effective upon the exercise by our collaborators of options to license future product candidates, there is no guarantee that we will receive any contingent payments or that our collaborators will exercise any options to license or acquire additional intellectual property rights in any of our programs. If our collaborators decide not to exercise such options with respect to a program, we will not receive the up-front option exercise fee and will not be eligible to receive any of the related commercial, development, royalty or other milestone payments. Even if our collaborators exercise such options with respect to a particular program, we may never achieve the related milestones for any number of reasons. The failure to receive milestone or royalty payments and the occurrence of any of the events above may have a material adverse impact on our business, prospects, financial condition and results of operations.

The revenues generated from our collaboration and license agreements have contributed and are expected to contribute a large portion of our revenue for the foreseeable future.

We have entered into collaboration and license agreements with pharmaceutical companies, including AstraZeneca. The cash payments received from our partners were €14.0 million, €40.3 million and €108.6 million for the years ended December 31, 2017, 2018 and 2019, respectively.

We also enhance our research efforts by establishing collaborations with academic or non-profit research institutions and other biopharmaceutical companies. The participation in these collaborations may generate revenue and funding in the form of operating grants or the reimbursement of research and development expenses.

We may not be able to renew or maintain our license agreements or collaborative research contracts or may be unable to sign new agreements with new collaborators on reasonable terms or at all. The early termination of a contract, the non-renewal of a contract or our inability to find new collaborators would adversely affect our business. Should any of these risks materialize, this could have an adverse effect on our business, prospects, financial condition and results of operations.

We benefit from tax credits in France that could be reduced or eliminated.

As a French biopharmaceutical company, we benefit from certain tax advantages, including the Research Tax Credit (*Crédit Impôt Recherche*), which is a French tax credit aimed at stimulating research and development. The Research Tax Credit is calculated based on our claimed amount of eligible research and development expenditures in France and represented €11.0 million, €13.5 million and €16.7 million for the years ended December 31, 2017, 2018 and 2019, respectively. The Research Tax Credit is a source of financing to us that could be reduced or eliminated by the French tax authorities or by changes in French tax law or regulations.

The Research Tax Credit can be offset against French corporate income tax due by the company with respect to the year during which the eligible research and development expenditures have been made. The portion of tax credit in excess which is not being offset, if any, represents a receivable against the French Treasury which can in principle be offset against the French corporate income tax due by the company with respect to the three following years. The remaining portion of tax credit not being offset upon expiry of such a period may then be refunded to the company.

Until the end of the year ended December 31, 2018, we qualified as a small- and medium-size business and the French Treasury refunded each of our 2016, 2017 and 2018 Research Tax Credit claims immediately (meaning that, in practice, we received the refund during the year following the year in which the eligible research and development expenditures are made). We no longer qualify as a small and medium-size business for the year ended December 31, 2019, and therefore, we will no longer be entitled to the immediate reimbursement of the Research Tax Credit but instead will be reimbursed within the expiry of the period of three years mentioned above.

The French tax authorities, with the assistance of the Higher Education and Research Ministry, may audit each research and development program in respect of which a Research Tax Credit benefit has been claimed and assess whether such program qualifies in their view for the Research Tax Credit benefit. The French tax authorities may challenge our eligibility for, or our calculation of, certain tax reductions or deductions in respect of our research and development activities (and therefore the amount of Research Tax Credit claimed), or the accelerated reimbursement allowed for small- and medium-size businesses and our credits may be reduced, which would have a negative impact on our revenue and future cash flows. Furthermore, the French Parliament may decide to eliminate, or to reduce the scope or the rate of, the Research Tax Credit benefit, either of which it could decide to do at any time. If we fail to receive future Research Tax Credit amounts or if our calculations are challenged, even if we comply with the current requirements in terms of documentation and eligibility of its expenditure, our business, prospects, financial condition and results of operations could be adversely affected.

We may be unable to carry forward existing tax losses.

We have accumulated tax loss carry forwards of €230.6 million as of December 31, 2019. Applicable French law provides that, for fiscal years ending after December 31, 2012, the use of these tax losses is limited to €1.0 million, plus 50% of the portion of net earnings exceeding this amount. The unused balance of the tax losses in application of such rule can be carried forward to future fiscal years, under the same conditions and without time restriction. There can be no assurance that future changes to applicable tax law and regulation will not eliminate or alter these or other provisions in a manner unfavorable to us, which could have an adverse effect on our business, prospects, financial condition, cash flows or results of operations.

Changes to U.S. and non-U.S. tax laws could materially adversely affect our company.

On December 22, 2017, the Tax Cuts and Jobs Act was signed into law and significantly revised the Internal Revenue Code of 1986, as amended, or the Code. The Tax Cuts and Jobs Act, among other things, contains significant changes to corporate taxation, including reduction of the corporate tax rate from a top marginal rate of 35% to a flat rate of 21%, limitation of the tax deduction for interest expense to 30% of adjusted taxable income (except for certain small businesses), implementation of a "base erosion anti-abuse tax," which requires U.S. corporations to make an alternative determination of taxable income without regard to tax deductions for certain payments to affiliates, taxation of certain non-U.S. corporations' earnings considered to be "global intangible low taxed income," which is also referred to as GILTI, repeal of the alternative minimum tax, or AMT, for corporations and changes to a taxpayer's ability to either utilize or refund the AMT credits previously generated, changes to the limitation on deductions for certain executive compensation particularly with respect to the removal of the previously allowed performance based compensation exception, changes in the attribution rules relating to shareholders of certain "controlled foreign corporations," limitation of the deduction for net operating losses to 80% of current year taxable income and elimination of net operating loss carrybacks, one-time taxation of offshore earnings at reduced rates regardless of whether they are repatriated, elimination of U.S. tax on foreign earnings (subject to certain important exceptions), immediate deductions for certain new investments instead of deductions for depreciation expense over time, and modifying or repealing many business deductions and credits. Notwithstanding the reduction in the U.S. corporate income tax rate, the overall impact of the Tax Cuts and Jobs Act is uncertain and our business and financial condition could be adversely affected. The impact of the Tax Cuts and Jobs Act on holders of our ordinary shares or ADSs is also uncertain and could be adverse. For example, recent changes in U.S. federal income tax law resulting in additional taxes owed by U.S. holders (as described under "Material United States Federal Income Tax and French Tax Considerations—Material U.S. Federal Income Tax Considerations") under the new GILTI tax rules or related to "controlled foreign corporations" may discourage U.S. investors from owning or acquiring 10% or greater of our outstanding ordinary shares or ADSs, which other shareholders may have viewed as beneficial or may otherwise negatively impact the trading price of our ordinary shares or ADSs. We are unable to predict what federal tax law may be proposed or enacted in the future or what effect such changes would have on our business, but such changes, to the extent they are brought into tax legislation, regulations, policies or practices, could affect our effective tax rates in the future in countries where we have operations and have an adverse effect on our overall tax rate in the future, along with increasing the complexity, burden and cost of tax compliance. In addition, several of the measures implemented by the Tax Cuts and Jobs Act, including several of those discussed above, have been temporarily modified pursuant to the Coronavirus Aid, Relief, and Economic Security Act (the "CARES Act"), which was signed into law on March 27, 2020. We urge our shareholders and holders of our ADSs to consult with their legal and tax advisors with respect to the Tax Cuts and Jobs Act, including the modifications made pursuant to the CARES Act and the potential tax consequences of investing in or holding our ordinary shares or ADSs.

Tax authorities may disagree with our positions and conclusions regarding certain tax positions, resulting in unanticipated costs, taxes or non-realization of expected benefits.

A tax authority may disagree with tax positions that we have taken, which could result in increased tax liabilities. For example, the French tax authorities, the U.S. Internal Revenue Service or another tax authority could challenge our allocation of income by tax jurisdiction and the amounts paid between our affiliated companies pursuant to our intercompany arrangements and transfer pricing policies, including amounts paid with respect to our intellectual property development. Similarly, a tax authority could assert that we are subject to tax in a jurisdiction where we believe we have not established a taxable connection, often referred to as a "permanent establishment" under international tax treaties, and such an assertion, if successful, could increase our expected tax liability in one or more jurisdictions. A tax authority may take the position that material income tax liabilities, interest and penalties are payable by us, in which case, we expect that we might contest such assessment. Contesting such an assessment may be lengthy and costly and if we were unsuccessful in disputing the assessment, the result could increase our anticipated effective tax rate.

Risks Related to Regulatory Approval and Marketing of Our Product Candidates and Legal Compliance Matters

Even if we complete the necessary preclinical studies and clinical trials, the marketing approval process is expensive, time-consuming and uncertain and may prevent us from obtaining approvals for the commercialization of some or all of our product candidates. If we are not able to obtain, or if there are delays in obtaining, required regulatory approvals, in particular in the United States or the European Union, we will not be able to commercialize our product candidates, and our ability to generate revenue will be materially impaired.

The research and development of pharmaceutical products is governed by complex regulatory requirements. The regulatory agencies that oversee these requirements have the authority to permit the commencement of clinical trials or to temporarily or permanently halt a study. They are entitled to request additional clinical data before authorizing the commencement or resumption of a study, which could result in delays or changes to our product development plan. As we advance our product candidates, we will be required to consult with these regulatory agencies and comply with all applicable guidelines, rules and regulations. If we fail to do so, we may be required to delay or discontinue development of our product candidates. Delay or failure to obtain, or unexpected costs in obtaining, the regulatory approval necessary to bring a potential product to market could decrease our ability to generate sufficient product revenue to maintain our business.

The clinical trials of our product candidates are, and the manufacturing and marketing of our one approved product, Lumoxiti, and our other product candidates will be, subject to regulation by numerous government authorities in the United States, in the European Union and in other countries where we intend to test and, if approved, market any product candidate. Before obtaining regulatory approvals for the commercial sale of any product candidate, we must demonstrate, with substantial evidence gathered in well-controlled clinical trials, and, with respect to approval in the United States, to the satisfaction of the FDA, with respect to approval in the European Union, to the satisfaction of the EMA or, with respect to approval in other countries, similar regulatory authorities in those countries, that the product candidate is safe and effective for use in each target indication.

When we acquired Lumoxiti, AstraZeneca had already obtained marketing approval from the FDA. We have never submitted a product candidate for marketing approval in the United States or elsewhere.

In the United States, we expect that the requisite regulatory submission to seek marketing authorization for our product candidates will be a Biologic License Application, or BLA, and the competent regulatory authority is the FDA. In the European Union, the requisite approval is a Marketing Authorization, or MA, which for products developed by the means of antibody-based therapeutics, gene or cell therapy products as well as tissue engineered products, is issued through a centralized procedure involving the EMA (see "Business—Regulation"). We submitted an MA application for Lumoxiti to the EMA, but have not received the MA yet and may not receive it. Satisfaction of these and other regulatory requirements is costly, time consuming, uncertain and subject to unanticipated delays. Failure to comply with the applicable requirements at any time during the product development process, approval process or after approval, may subject an applicant to administrative or judicial sanctions. These sanctions could include, for example, the FDA's refusal to approve pending applications, withdrawal of an approval, a clinical hold, untitled or warning letters, product recalls or withdrawals from the market, product seizures, total or partial suspension of production or distribution injunctions, fines, refusals of government contracts, restitution, disgorgement, or civil or criminal penalties.

Data from preclinical and clinical studies are likely to give rise to different interpretations, which could delay regulatory authorization, restrict the scope of any such authorization or force us to repeat trials in order to meet the requirements of the various regulators. Regulatory requirements and processes vary widely among countries, and we may be unable to obtain authorization within each relevant country in a timely manner. Regulatory authorities may prevent us from starting clinical trials or continuing clinical development if the data were not produced according to applicable regulations or if they consider that the balance between the expected benefits of the product and its possible risks is not sufficient to justify the trial.

Despite our efforts, our product candidates may not:

- offer improvement over existing, comparable products;
- be proven safe and effective in clinical trials; or

- meet applicable regulatory standards.

This process can take many years and may include post-marketing studies and surveillance, which will require the expenditure of substantial resources beyond our existing cash on hand. Of the large number of drugs in development globally, only a small percentage successfully complete the regulatory approval process and not all approved drugs are successfully commercialized. Delay or failure to obtain, or unexpected costs in obtaining, the regulatory approval necessary for us or our partners to bring a potential product candidate to market could have a material adverse effect on our business, prospects, financial condition and results of operations.

The regulatory processes that will govern the approval of our product candidates are complex and changes in regulatory requirements could result in delays or discontinuation of development or unexpected costs in obtaining regulatory approval.

Our product candidates are based on new technologies that are constantly evolving and have not been extensively tested on humans. The applicable regulatory requirements vary between jurisdictions and are also complex, potentially difficult to apply and subject to significant modifications. Modifications to regulations during the course of clinical development and regulatory review may lead to delays or the refusal of authorization.

In Europe, the United States and other countries, regulations can potentially:

- significantly delay or increase the cost of development, testing, manufacturing and marketing of our products;
- limit the indications for which we will be authorized to market our products; and
- impose new, more stringent, requirements, suspend marketing authorizations, or request the suspension of clinical trials or the marketing of our products if unexpected results are obtained during trials performed by other researchers on products similar to our products.

Marketing authorization in one jurisdiction does not ensure marketing authorization in another, but a failure or delay in obtaining marketing authorization in one jurisdiction may have a negative effect on the regulatory process in others. Failure to obtain marketing authorization in other countries or any delay or setback in obtaining such approval would impair our ability to develop additional markets for our product, Lumoxiti, or any additional product candidates that are approved. This would reduce our target market and limit the full commercial potential of our product or product candidates. Should any of these risks materialize, this could harm our business.

Our failure to obtain marketing approval in jurisdictions other than the United States and Europe would prevent our product candidates from being marketed in these other jurisdictions, and any approval we are granted for our product candidates in the United States and Europe would not assure approval of product candidates in other jurisdictions.

In order to market and sell our other product candidates in jurisdictions other than the United States and Europe, we must obtain separate marketing approvals and comply with numerous and varying regulatory requirements. The approval process varies among countries and can involve additional testing. The time required to obtain approval may differ from that required to obtain FDA approval or approvals from regulatory authorities in the European Union. The regulatory approval process outside the United States and Europe generally includes all of the risks associated with obtaining FDA approval or approvals from regulatory authorities in the European Union. In addition, some countries outside the United States and Europe require approval of the sales price of a product before it can be marketed. In many countries, separate procedures must be followed to obtain reimbursement and a product may not be approved for sale in the country until it is also approved for reimbursement. We may not obtain marketing, pricing or reimbursement approvals outside the United States and Europe on a timely basis, if at all. Approval by the FDA or regulatory authorities in the European Union does not ensure approval by regulatory authorities in other countries or jurisdictions, and approval by one regulatory authority outside the United States and Europe does not ensure approval by regulatory authorities in other countries or jurisdictions or by the FDA or regulatory authorities in the European Union. We may not be able to file for marketing approvals and may not receive necessary approvals to commercialize our products in any market. Marketing approvals in countries outside the United States and Europe do not ensure pricing approvals in those countries or in any other countries, and marketing approvals and pricing approvals do not ensure that reimbursement will be obtained.

Side effects that appear following the launch of a drug on the market may result in the product being taken off the market or additional warnings being added to the label despite having obtained all regulatory approvals.

A drug's launch in the market may expose a large number of patients to potential risks associated with the treatment with a new pharmaceutical product. Certain side effects, which may not have been identified during clinical trials, can subsequently appear. For these reasons, regulatory agencies require companies to implement post-approval monitoring. Depending on the occurrence of serious undesirable effects, the agencies may require that we or a collaboration partner of ours take a drug off the market temporarily or permanently, even if it is effective and has obtained all the necessary marketing authorizations. Such an action would negatively impair our ability to generate revenue from such product and could more generally negatively affect our ability to develop, obtain regulatory approval for, and commercialize our other product candidates and our reputation generally, each of which could have a material adverse effect on our business and results of operations. In addition, if the product candidates we develop receive marketing authorization and we or others identify undesirable side effects caused by Lumoxiti or any other products after the approval, a number of potentially significant negative consequences could result, including that regulatory authorities may require the addition of labeling statements, such as a "boxed" warning or a contraindication, we may be required to create a medication guide outlining the risks of such side effects for distribution to patients and our reputation may suffer.

Lumoxiti and any other product candidate for which we obtain marketing approval will be subject to strict enforcement of post-marketing requirements and we could be subject to substantial penalties, including withdrawal of our product from the market, if we fail to comply with all regulatory requirements or if we experience unanticipated problems with our product and product candidates, when and if any of them are approved.

Lumoxiti and any product candidate for which we obtain marketing approval, will be subject to continual requirements of and review by the FDA, EMA and other regulatory authorities, including requirements relating to manufacturing processes, post-approval clinical data, labeling, advertising and promotional activities for such product. These requirements include, but are not limited to, restrictions governing promotion of an approved product, submissions of safety and other post-marketing information and reports, registration and listing requirements, cGMP requirements relating to manufacturing, quality control, quality assurance and corresponding maintenance of records and documents, and requirements regarding the distribution of samples to physicians and recordkeeping. In addition, even if marketing approval of a product candidate is granted, the approval may be subject to limitations on the indicated uses for which the product may be marketed, restrictions for specified age groups, warnings, precautions or contraindications or to the conditions of approval.

The FDA and other federal and state agencies, including the U.S. Department of Justice, or DOJ, closely regulate compliance with all requirements governing prescription products, including requirements pertaining to marketing and promotion of products in accordance with the provisions of the approved labeling and manufacturing of products in accordance with cGMP requirements. The FDA and DOJ impose stringent restrictions on manufacturers' communications regarding off-label use and if we do not market our products for their approved indications, we may be subject to enforcement action for off-label marketing. Prescription products may be promoted only for the approved indications and in accordance with the provisions of the approved label. However, companies may also share truthful and not misleading information that is otherwise consistent with the labeling. Violations of such requirements may lead to investigations alleging violations of the Food, Drug and Cosmetic Act and other statutes, including the False Claims Act and other federal and state health care fraud and abuse laws as well as state consumer protection laws. Our failure to comply with all regulatory requirements, and later discovery of previously unknown adverse events or other problems with our products, manufacturers or manufacturing processes, may yield various results, including:

- litigation involving patients taking our products;
- restrictions on such products, manufacturers or manufacturing processes;
- restrictions on the labeling or marketing of a product;
- restrictions on product distribution or use;
- requirements to conduct post-marketing studies or clinical trials;
- warning letters or untitled letters;
- withdrawal of the products from the market;
- refusal to approve pending applications or supplements to approved applications that we submit;
- recall of products;
- fines, restitution or disgorgement of profits or revenues;
- suspension or withdrawal of marketing approvals;
- damage to relationships with any potential collaborators;

- unfavorable press coverage and damage to our reputation;
- refusal to permit the import or export of our products;
- product seizure; or
- injunctions or the imposition of civil or criminal penalties.

Non-compliance by us or any future collaborator with the FDA, EMA or other regulatory requirements regarding safety monitoring or pharmacovigilance, and with requirements related to the development of products for the pediatric population, can also result in significant financial penalties. Similarly, failure to comply with regulatory requirements regarding the protection of personal information can also lead to significant penalties and sanctions.

Our future growth depends, in part, on our ability to penetrate multiple markets, in which we would be subject to additional regulatory burdens and other risks and uncertainties.

Our future profitability will depend, in part, on our ability to commercialize Lumoxiti and our product candidates, if approved, in markets in Europe, the United States and other countries where we maintain commercialization rights. If we commercialize Lumoxiti and any of our product candidates, if approved, in multiple markets, we would be subject to additional risks and uncertainties, including:

- foreign currency exchange rate fluctuations and currency controls;
- economic weakness, including inflation, or political instability in particular economies and markets;
- potentially adverse and/or unexpected tax consequences, including penalties due to the failure of tax planning or due to the challenge by tax authorities on the basis of transfer pricing and liabilities imposed from inconsistent enforcement;
- the burden of complying with complex and changing regulatory, tax, accounting and legal requirements, many of which vary between countries;
- different medical practices and customs in multiple countries affecting acceptance of drugs in the marketplace;
- differing payor reimbursement regimes, governmental payors or patient self-pay systems and price controls;
- tariffs, trade barriers, import or export licensing requirements or other restrictive actions;
- compliance with tax, employment, immigration and labor laws for employees living or traveling abroad;
- workforce uncertainty in countries where labor unrest is common;
- reduced or loss of protection of intellectual property rights in some foreign countries, and related prevalence of generic alternatives to therapeutics; and

- becoming subject to the different, complex and changing laws, regulations and court systems of multiple jurisdictions and compliance with a wide variety of foreign laws, treaties and regulations.

These and other risks associated with international operations may adversely affect our ability to attain or maintain profitable operations. Future sales of Lumoxiti or our product candidates, if they are approved, will be dependent on purchasing decisions of and reimbursement from government health administration authorities, distributors and other organizations. As a result of adverse conditions affecting the global economy and credit and financial markets, including disruptions due to political instability or otherwise, these organizations may defer purchases, may be unable to satisfy their purchasing or reimbursement obligations, or may affect milestone payments or royalties for Lumoxiti, monalizumab or any of our product candidates that are approved for commercialization in the future. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

Even if our product candidates obtain regulatory approval, they will be subject to continuous regulatory review.

If marketing authorization is obtained for any of our product candidates, the candidate will remain subject to continuous review and therefore authorization could be subsequently withdrawn or restricted. We will be subject to ongoing obligations and oversight by regulatory authorities, including adverse event reporting requirements, marketing restrictions and, potentially, other post-marketing obligations, all of which may result in significant expense and limit our ability to commercialize such products. For example, we will be responsible for the completion of an FDA required post-marketing trial of Lumoxiti.

If there are changes in the application of legislation or regulatory policies, or if problems are discovered with a product or our manufacture of a product, or if we or one of our distributors, licensees or co-marketers fails to comply with regulatory requirements, the regulators could take various actions. These include imposing fines on us, imposing restrictions on the product or its manufacture and requiring us to recall or remove the product from the market. The regulators could also suspend or withdraw our marketing authorizations, requiring us to conduct additional clinical trials, change our product labeling or submit additional applications for marketing authorization. If any of these events occurs, our ability to sell such product may be impaired, and we may incur substantial additional expense to comply with regulatory requirements, which could materially adversely affect our business, financial condition and results of operations.

Even if one of our product candidates has orphan drug designation, we may not be able to obtain any benefit from such designation. Furthermore, if a product is granted orphan drug exclusivity in the same indication for which we are developing lacutamab or our other product candidates that is granted orphan drug designation, we may not be able to have our product candidate approved by the applicable regulatory authority for a significant period of time.

Regulatory authorities in some jurisdictions, including the United States and Europe, may designate drugs for relatively small patient populations as orphan drugs. Under the Orphan Drug Act, the FDA may designate a product candidate as an orphan drug if it is a drug intended to treat a rare disease or condition, which is generally defined as a patient population of fewer than 200,000 individuals in the United States. In the European Union, the European Commission may designate a product candidate as an orphan medicinal product if it is a medicine for the diagnosis, prevention or treatment of life-threatening or very serious conditions that affects not more than five in 10,000 persons in the European Union, or it is unlikely that marketing of the medicine would generate sufficient returns to justify the investment needed for its development. Generally, if a product candidate with an orphan drug designation receives the first marketing approval for the indication for which it has such designation, the product is entitled to a period of marketing exclusivity, which, subject to certain exceptions, precludes the FDA from approving the marketing application of another drug for the same indication for that time period or precludes the EMA, and other national drug regulators in the European Union, from accepting the marketing application for another medicinal product for the same indication. The applicable period is seven years in the United States and ten years in the European Union. The European Union period can be reduced to six years if a product no longer meets the criteria for orphan drug designation or if the product is sufficiently profitable so that market exclusivity is no longer justified. Orphan drug exclusivity may be lost in the United States if the FDA determines that the request for designation was materially defective or if the manufacturer is unable to assure sufficient quantity of the product to meet the needs of patients with the rare disease or condition. The granting of a request for orphan drug designation does not alter the standard regulatory requirements and process for obtaining marketing approval.

Lacutamab has been granted orphan drug designation for CTCL in Europe and in the United States and we may pursue orphan drug designation for another product candidate that we may develop in the future in the United States and/or Europe. However, there is no assurance we will be able to receive orphan drug designation for other product candidates that we may develop in the United States and/or Europe or for any other product candidate in any jurisdiction. Even if we are successful in obtaining orphan drug designation, orphan drug status may not ensure that we have market exclusivity in a particular market. Even if we obtain orphan drug exclusivity for any of our product candidates, that exclusivity may not effectively protect the product from competition because exclusivity can be suspended under certain circumstances. In the United States, even after an orphan drug is approved, the FDA can subsequently approve another drug for the same condition if the FDA concludes that the later drug is clinically superior in that it is shown to be safer, more effective or makes a major contribution to patient care. In the European Union, orphan exclusivity will not prevent a marketing authorization being granted for a similar medicinal product in the same indication if the new product is safer, more effective or otherwise clinically superior to the first product or if the marketing authorization holder of the first product is unable to supply sufficient quantities of the product. In addition, if another product is granted marketing approval and orphan drug exclusivity in the same indication for which we are developing a product candidate with orphan drug designation, we may not be able to have our product candidate approved by the applicable regulatory authority for a significant period of time.

A fast track, breakthrough therapy or other designation by the FDA may not actually lead to a faster development.

We may seek fast track, breakthrough therapy or similar designation for our product candidates. If a product is intended for the treatment of a serious or life-threatening condition and the product demonstrates the potential to address unmet medical need for this condition, the sponsor may apply for FDA fast track designation. We have received fast track designation for lacutamab for the treatment of adult patients with relapsed or refractory Sézary syndrome who have received at least two prior systemic therapies.

Additionally, we may in the future seek a breakthrough therapy designation for some of our product candidates that reach the regulatory review process. A breakthrough therapy is a drug candidate that is intended, alone or in combination with one or more other drugs, to treat a serious or life-threatening disease or condition, and that, as indicated by preliminary clinical evidence, may demonstrate substantial improvement over existing therapies on one or more clinically significant endpoints, such as substantial treatment effects observed early in clinical development. Drugs designated as breakthrough therapies by the FDA are eligible for accelerated approval and increased interaction and communication with the FDA designed to expedite the development and review process.

However, these designations do not ensure that we will experience a faster development process, review or approval compared to conventional FDA procedures. In addition, the FDA may withdraw a designation if it believes that the designation is no longer supported by data from our clinical development program. A designation alone does not guarantee qualification for the FDA's priority review procedures.

Priority review designation by the FDA may not lead to a faster regulatory review or approval process and, in any event, does not assure FDA approval of our product candidates.

If the FDA determines that a product candidate offers major advances in treatment or provides a treatment where no adequate therapy exists, the FDA may designate the product candidate for priority review. A priority review designation means that the goal for the FDA to review an application is six months, rather than the standard review period of ten months. We may request priority review for our product candidates. The FDA has broad discretion with respect to whether or not to grant priority review status to a product candidate, so even if we believe a particular product candidate is eligible for such designation or status, the FDA may decide not to grant it. Moreover, a priority review designation does not necessarily mean a faster regulatory review process or necessarily confer any advantage with respect to approval compared to conventional FDA procedures. Receiving priority review from the FDA does not guarantee approval within the six-month review cycle or thereafter.

We are subject to anti-corruption laws, as well as export control laws, customs laws, sanctions laws and other laws governing our operations. If we fail to comply with these laws, we could be subject to civil or criminal penalties, other remedial measures and legal expenses, which could adversely affect our business, results of operations and financial condition.

We are subject to other laws and regulations governing our international operations, including regulations administered by the governments of the United States, and authorities in the European Union, including applicable export control regulations, economic sanctions on countries and persons, customs requirements and currency exchange regulations, collectively referred to as the trade control laws.

The Foreign Corrupt Practices Act, or FCPA, prohibits any U.S. individual or business from paying, offering, authorizing payment or offering of anything of value, directly or indirectly, to any foreign official, political party or candidate for the purpose of influencing any act or decision of the foreign entity in order to assist the individual or business in obtaining or retaining business. The FCPA also obligates companies whose securities are listed in the United States to comply with certain accounting provisions requiring the company to maintain books and records that accurately and fairly reflect all transactions of the corporation, including international subsidiaries, and to devise and maintain an adequate system of internal accounting controls for international operations.

Compliance with the FCPA is expensive and difficult, particularly in countries in which corruption is a recognized problem. In addition, the FCPA presents particular challenges in the pharmaceutical industry, because, in many countries, hospitals are operated by the government, and doctors and other hospital employees are considered foreign officials. Certain payments to hospitals in connection with clinical trials and other work have been deemed to be improper payments to government officials and have led to FCPA enforcement actions.

French anti-corruption laws also prohibit acts of bribery and influence peddling:

- Articles 433-1 1° and 432-11 1° of the French Criminal Code (bribery of domestic public officials);
- Articles 433-1 2° and 432-11 2° of the French Criminal Code (influence peddling involving domestic public officials);
- Article 434-9 of the French Criminal Code (bribery of domestic judicial staff);
- Article 434-9-1 of the French Criminal Code (influence peddling involving domestic judicial staff);
- Articles 445-1 and 445-2 of the French Criminal Code (bribery of private individuals);
- Article 433-2 of the French Criminal Code (influence peddling involving private individuals);
- Articles 435-1 and 435-3 of the French Criminal Code (bribery of foreign or international public officials);
- Articles 435-7 and 435-9 of the French Criminal Code (bribery of foreign or international judicial staff);
- Articles 435-2, 435-4, 435-8 and 435-10 of the French Criminal Code (active and passive influence peddling involving foreign or international public officials and foreign or international judicial staff); and
- French Law of December 9, 2017 on Transparency, the Fight Against Corruption and the Modernization of the Economy (Sapin 2 Law).

There is no assurance that we will be effective in ensuring our compliance with all applicable anti-corruption laws, including the FCPA, the French anti-corruption laws or other legal requirements, including trade control laws. If we are not in compliance with the FCPA, the French anti-corruption laws and other anti-corruption laws or trade control laws, we may be subject to criminal and civil penalties, disgorgement and other sanctions and remedial measures, and legal expenses, which could have an adverse impact on our business, financial condition, results of operations and liquidity. Likewise, any investigation of any potential violations of the FCPA, the French anti-corruption laws, other anti-corruption laws or trade control laws by U.S. or other authorities could also have an adverse impact on our reputation, our business, results of operations and financial condition.

We are subject to healthcare laws and regulations which may require substantial compliance efforts and could expose us to criminal sanctions, civil penalties, contractual damages, reputational harm and diminished profits and future earnings, among other penalties.

Healthcare providers, physicians and others will play a primary role in the recommendation and prescription of our products, if approved. Our arrangements with such persons and third-party payors and our operations will expose us to broadly applicable fraud and abuse and other healthcare laws and regulations that may constrain the business or financial arrangements and relationships through which we research, market, sell and distribute our products, if we obtain marketing authorization. Restrictions under applicable U.S. federal, state and foreign healthcare laws and regulations include, but are not limited to, the following:

- the U.S. Anti-Kickback Statute, which prohibits, among other things, persons or entities from knowingly and willfully soliciting, offering, receiving or providing remuneration, including any kickback, bribe or rebate, directly or indirectly, in cash or in kind, to induce or reward, or in return for, either the referral of an individual for, or the purchase or lease, order or recommendation of, any item, good, facility or service, for which payment may be made under federal healthcare programs such as Medicare and Medicaid;

- U.S. federal civil and criminal false claims laws and civil monetary penalties laws, including the civil False Claims Act, which impose criminal and civil penalties, including those from civil whistle-blower or qui tam actions, against individuals or entities for, among other things, knowingly presenting, or causing to be presented, claims for payment that are false or fraudulent or making a false statement to avoid, decrease, or conceal an obligation to pay money to the federal government;

- the U.S. Health Insurance Portability and Accountability Act of 1996, or HIPAA, which created additional federal criminal statutes that impose criminal and civil liability for, among other things, executing or attempting to execute a scheme to defraud any healthcare benefit program or knowingly and willingly falsifying, concealing or covering up a material fact or making false statements relating to healthcare matters;

- HIPAA, as amended by the Health Information Technology for Economic and Clinical Health Act and its implementing regulations, which impose certain requirements on covered entities and their business associates, including mandatory contractual terms, with respect to safeguarding the privacy, security and transmission of individually identifiable health information;

- U.S. federal transparency requirements under the Physician Payments Sunshine Act, enacted as part of the ACA, that require applicable manufacturers of covered drugs, devices, biologics and medical supplies for which payment is available under Medicare, Medicaid, or the Children's Health Insurance Program, with specific exceptions, to track and annually report to CMS payments and other transfers of value provided to physicians and teaching hospitals, and certain ownership and investment interests held by physicians or their immediate family members; and

- analogous state or foreign laws and regulations, such as state anti-kickback and false claims laws, including the French "Bertrand Law", French Ordinance n°2017-49 of January 19, 2017, and the UK's Bribery Act 2010, which may apply to items or services reimbursed by any third-party payor, including commercial insurers, state marketing and/or transparency laws applicable to manufacturers that may be broader in scope than the federal requirements, state laws that require biopharmaceutical companies to comply with the biopharmaceutical industry's voluntary compliance guidelines and the relevant compliance guidance promulgated by the federal government, state laws that require the reporting of information relating to drug and biologic pricing; state and local laws that require the registration of pharmaceutical sales representatives and state laws governing the privacy and security of health information in certain circumstances, many of which differ from each other in significant ways and may not have the same effect as HIPAA, thus complicating compliance efforts.

Ensuring that our business arrangements with third parties comply with applicable healthcare laws and regulations will likely be costly. It is possible that governmental authorities will conclude that our business practices do not comply with current or future statutes, regulations or case law involving applicable fraud and abuse or other healthcare laws and regulations. If our operations were found to be in violation of any of these laws or any other governmental regulations that may apply to us, we may be subject to significant civil, criminal and administrative penalties, damages, fines, disgorgement, imprisonment, possible exclusion from government funded healthcare programs, such as Medicare and Medicaid, additional reporting requirements and oversight if we become subject to a corporate integrity agreement or similar agreement to resolve allegations of non-compliance with these laws, contractual damages, reputational harm, diminished profits and future earnings, and curtailment of our operations, any of which could substantially disrupt our operations. If the physicians or other providers or entities with whom we expect to do business are found not to be in compliance with applicable laws, they may be subject to criminal, civil or administrative sanctions, including exclusions from government funded healthcare programs. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

European data collection is governed by restrictive regulations governing the collection, use, processing and cross-border transfer of personal information.

We may collect, process, use or transfer personal information from individuals located in the European Union in connection with our business, including in connection with conducting clinical trials in the European Union. Additionally, we intend to commercialize Lumoxiti, and any of our product candidates that receive marketing approval, in the European Union. The collection and use of personal health data in the European Union are governed by the provisions of the General Data Protection Regulation ((EU) 2016/679), or the GDPR. This legislation imposes requirements relating to having legal bases for processing personal information relating to identifiable individuals and transferring such information outside of the European Economic Area, or EEA, including to the United States, providing details to those individuals regarding the processing of their personal information, keeping personal information secure, having data processing agreements with third parties who process personal information, responding to individuals' requests to exercise their rights in respect of their personal information, reporting security breaches involving personal data to the competent national data protection authority and affected individuals, appointing data protection officers, conducting data protection impact assessments and record-keeping. The GDPR imposes additional responsibilities and liabilities in relation to personal data that we process and we may be required to put in place additional mechanisms ensuring compliance with the new data protection rules. Failure to comply with the requirements of the GDPR and related national data protection laws of the member states of the European Union may result in substantial fines, other administrative penalties and civil claims being brought against us, which could have a material adverse effect on our business, prospects, financial condition and results of operations.

Risks Related to our Reliance on Third Parties

We depend upon our existing collaboration partners, AstraZeneca, Sanofi and other third parties, and may depend upon future collaboration partners to commit to the research, development, manufacturing and marketing of our drugs.

We have significant collaborations with AstraZeneca for the commercialization of Lumoxiti and the development of monalizumab, IPH5201 and other product candidates. We also collaborate with Sanofi for the development of IPH61, and we may enter into additional collaborations for other of our product candidates or technologies in development. We cannot control the timing or quantity of resources that our existing or future collaborators will dedicate to research, preclinical and clinical development, manufacturing or marketing of our products. Our collaborators may not perform their obligations according to our expectations or standards of quality. Our collaborators could terminate our existing agreements for a number of reasons, including that they may have other, higher priority products in development or because our partnered programs may no longer be a priority for them. If any of our collaboration agreements were to be terminated, we could encounter significant delays in developing our product candidates, lose the opportunity to earn any revenues we expected to generate under such agreements, incur unforeseen costs, and suffer damage to the reputation of our product, product candidates and as a company generally.

In order to optimize the launch and market penetration of certain of our future product candidates, we may enter into distribution and marketing agreements with pharmaceutical industry leaders. For these product candidates, we would not market our products alone once they have obtained marketing authorization. The risks inherent in entry into these contracts are as follows:

- the negotiation and execution of these agreements is a long process that may not result in an agreement being signed or that can delay the development or commercialization of the product candidate concerned;

- these agreements are subject to cancellation or non-renewal by our collaborators, or may not be fully complied with by our collaborators;

- in the case of a license granted by us, we lose control of the development of the product candidate licensed; in such cases we would have only limited control over the means and resources allocated by our partner for the commercialization of our product; and

- collaborators may not properly obtain, maintain, enforce, or defend our intellectual property or proprietary rights or may use our proprietary information in such a way as to invite litigation that could jeopardize or invalidate our proprietary information or expose us to potential litigation.

Should any of these risks materialize, or should we fail to find suitable collaborators, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

The late-stage development and marketing of our product candidates may partially depend on our ability to establish collaborations with major biopharmaceutical companies.

In order to develop and market some of our product candidates, we rely on collaboration, research and license agreements with pharmaceutical companies to assist us in the development of product candidates and the financing of their development. For our most advanced clinical product candidate, monalizumab, we entered into an agreement with AstraZeneca, in part because of their late-stage development and marketing capabilities. As we identify new product candidates, we will determine the appropriate strategy for development and marketing, which may result in the need to establish collaborations with major biopharmaceutical companies. We may also enter into agreements with institutions and universities to participate in our other research programs and to share intellectual property rights.

We may fail to find collaboration partners and to sign new agreements for our other product candidates and programs. The competition for partners is intense, and the negotiation process is time-consuming and complex. Any new collaboration may be on terms that are not optimal for us, and we may not be able to maintain any new collaboration if, for example, development or approval of a product candidate is delayed, sales of an approved product candidate do not meet expectations or the collaborator terminates the collaboration. Any such collaboration, or other strategic transaction, may require us to incur non-recurring or other charges, increase our near- and long-term expenditures and pose significant integration or implementation challenges or disrupt our management or business. These transactions would entail numerous operational and financial risks, including exposure to unknown liabilities, disruption of our business and diversion of our management's time and attention in order to manage a collaboration or develop acquired products, product candidates or technologies, incurrence of substantial debt or dilutive issuances of equity securities to pay transaction consideration or costs, higher than expected collaboration, acquisition or integration costs, write-downs of assets or goodwill or impairment charges, increased amortization expenses, difficulty and cost in facilitating the collaboration or combining the operations and personnel of any acquired business, impairment of relationships with key suppliers, manufacturers or customers of any acquired business due to changes in management and ownership and the inability to retain key employees of any acquired business. Accordingly, although there can be no assurance that we will undertake or successfully complete any transactions of the nature described above, any transactions that we do complete may be subject to the foregoing or other risks and have a material and adverse effect on our business, financial condition, results of operations and prospects. Conversely, any failure to enter any additional collaboration or other strategic transaction that would be beneficial to us could delay the development and potential commercialization of our product candidates and have a negative impact on the competitiveness of any product candidate that reaches market.

We rely on third parties to supply key materials used in our research and development, to provide services to us and to assist with clinical trials.

We make considerable use of third-party suppliers for the key materials used in our business. The failure of third-party suppliers to comply with regulatory standards could result in the imposition of sanctions on us. These sanctions could include fines, injunctions, civil penalties, refusal by regulatory organizations to grant approval to conduct clinical trials or marketing authorization for our products, delays, suspension or withdrawal of approvals, license revocation, seizure or recalls of our products, operating restrictions and legal proceedings. Furthermore, the presence of non-conformities, as detected in regulatory toxicology studies, could result in delays in the development of one or more of our product candidates and would require further tests to be financed. Although we are involved in establishing the protocols for the production of these materials, we do not control all the stages of production and cannot guarantee that the third parties will fulfil their contractual and regulatory obligations. In particular, a partner's failure to comply with protocols or regulatory constraints, or repeated delays by a partner, could compromise the development of our products or limit its liability. Such events could also inflate the product development costs incurred by us.

We also use third parties to provide certain services such as scientific, medical or strategic consultancy services. These service providers are generally selected for their specific expertise, as is the case with the academic partners with whom we collaborate. To build and maintain such a network under acceptable terms, we face intense competition. Such external collaborators may terminate, at any time, their involvement. We can exert only limited control over their activities. We may not be able to obtain the intellectual property rights to the product candidates or technologies developed under collaboration, research and license agreements under acceptable terms or at all. Moreover, our scientific collaborators may assert intellectual property rights or other rights beyond the terms of their engagement.

Finally, we use third-party investigators to assist with conducting clinical trials. All clinical trials are subject to strict regulations and quality standards. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

We do not and will not have access to all information regarding our product candidates that are subject to collaboration and license agreements. Consequently, our ability to inform our shareholders about the status of product candidates that are subject to these agreements, and our ability to make business and operational decisions, may be limited.

We do not and will not have access to all information regarding our product candidates that are subject to our license and collaboration agreements with AstraZeneca, Sanofi and other third parties, including potentially material information about clinical trial design, execution and timing, safety and efficacy, clinical trial results, regulatory affairs, manufacturing, marketing and other areas known by our collaborators. In addition, we have confidentiality obligations under our collaboration and license agreements. Therefore, our ability to keep our shareholders informed about the status of product candidates subject to such agreements will be limited by the degree to which our collaborators keep us informed and allow us to disclose information to the public or provide such information to the public themselves. If our collaborators do not inform us about our product candidates subject to agreements with them, we may make operational and investment decisions that we would not have made had we been fully informed, which may have an adverse impact on our business, prospects, financial condition and results of operations.

Risks Related to the Manufacture of Lumoxiti and Our Product Candidates

We have no manufacturing capabilities and rely on third-party manufacturers for Lumoxiti and our product candidates.

Our product candidates that are tested during our preclinical and clinical trials are manufactured by third parties. We have no production capabilities and rely on third parties to manufacture our products.

This strategy means that we do not directly control certain key aspects of our product development, such as:

- the quality of the product manufactured;
- the delivery times for drugs for a given clinical trial;
- the clinical and commercial quantities that can be supplied; and
- compliance with applicable laws and regulations.

Our reliance on third-party manufacturers creates risks that may not exist if we had our own manufacturing capabilities. These risks include:

- failure of third-party manufacturers to comply with regulatory and quality-control standards;
- production of insufficient quantities;
- damage during transport and/or storage of our product candidates;
- breach of agreements by third-party manufacturers; and
- termination or non-renewal of the agreements for reasons beyond our control.

Should our third-party manufacturers breach their obligations or should we fail to renew our contracts with them, we cannot guarantee that we will be able to find new suppliers within a timeframe and under conditions that would not be detrimental. We could also be faced with delays or interruptions in our supplies, which could result in a delay in the clinical trials and, ultimately, a delay in the commercialization of the product candidates that we are developing or a loss of product sales. For example, manufacturing issues, leading to out-of-specification product, can occur during a manufacturing campaign at the CMO in charge of the production of our product candidates.

Reproducing a batch of product is a lengthy and costly process and sometimes can lead to drug shortage that can in turn lead to a delay in the development of the candidate, or even an early stop of a clinical trial. This happened in the early clinical development of lacutamab and led to the decision to limit the number of patients in order to ensure drug supply for treated patients in the Phase I clinical trial.

In November 2019, Impletio Wirkstoffabfüllung GmbH (formerly known as Rentschler Fill Solutions GmbH), the subcontractor in charge of the fill-and-finish manufacturing operations of lacutamab, unilaterally decided to withdraw the certificates of conformance of all clinical batches produced at their facilities, including the lacutamab batch used for the TELLOMAK Phase II clinical trial assessing lacutamab in multiple indications. Impletio Wirkstoffabfüllung GmbH decided to withdraw the certificates of conformance even though the compliance of its manufacturing site with Good Manufacturing Practices has been confirmed by two on-site inspections performed by the Austrian Health Agency before and after we began to work with them.

The transfer of the manufacturing process to another contract manufacturing organization will be lengthy and we will not be able to receive new clinical batches before the second half of 2020. As a consequence and after discussions with the regulatory agencies of the countries in which the TELLOMAK trial is being conducted in a number of countries, the TELLOMAK trial has been placed on partial or full hold in the U.S., Spain, Germany and Italy. See "Item 4.B–Business Overview—Lacutamab, A Tumor Targeting Anti-KIR3DL2 Antibody—Clinical Development of Lacutamab—Phase II Clinical Trial (TELLOMAK)."

Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

We are reliant upon third parties to manufacture and supply components of certain substances necessary to manufacture Lumoxiti and our product candidates.

We do not currently independently conduct manufacturing activities for Lumoxiti or our product candidates in development, and we are reliant on several third-party CMOs for the manufacture and supply of components and substances for all of the product candidates we are developing. In addition, certain component materials are currently available from a single supplier, or a small number of suppliers. We cannot be sure that these suppliers will remain in business, or that they will not be purchased by one of our competitors or another company that is not interested in continuing to manufacture these materials for us. We cannot assure you that, if required, we will be able to identify alternate sources with the desired scale and capability and establish relationships with such sources. A loss of any CMO or component supplier and delay in establishing a replacement could delay our clinical development and regulatory approval process.

Manufacturing facilities and clinical trial sites are subject to significant government regulations and approvals and if our or our partners' third-party manufacturers fail to comply with these regulations or maintain these approvals, our business could be materially harmed.

Our third-party manufacturers are subject to ongoing regulation and periodic inspection by national authorities, including the EMA, FDA and other regulatory bodies to ensure compliance with cGMP, when producing batches of Lumoxiti and our product candidates for clinical trials. CROs and other third-party research organizations must also comply with Good Laboratory Practices (GLP) when carrying out regulatory toxicology studies. Any failure to follow and document our or their adherence to such GMP and GLP regulations or other regulatory requirements may lead to significant delays in the availability of products for commercial sale or clinical trials, may result in the termination of or a hold on a clinical trial, or may delay or prevent filing or approval of marketing applications for our products.

Failure to comply with applicable regulations could also result in national authorities, the EMA, FDA or other applicable regulatory authorities taking various actions, including:

- levying fines and other civil penalties;
- imposing consent decrees or injunctions;
- requiring us to suspend or put on hold one or more of our clinical trials;
- suspending or withdrawing regulatory approvals;
- delaying or refusing to approve pending applications or supplements to approved applications;
- requiring us to suspend manufacturing activities or product sales, imports or exports;
- requiring us to communicate with physicians and other customers about concerns related to actual or potential safety, efficacy, and other issues involving our products;
- mandating product recalls or seizing products;
- imposing operating restrictions; and
- seeking criminal prosecutions.

Any of the foregoing actions could be detrimental to our reputation, business, financial condition or operating results. Furthermore, our key suppliers may not continue to be in compliance with all applicable regulatory requirements, which could result in our failure to produce our products on a timely basis and in the required quantities, if at all. In addition, before any additional products would be considered for marketing authorization in Europe, the United States or elsewhere, our suppliers will have to pass an inspection by the applicable regulatory agencies. We are dependent on our suppliers' cooperation and ability to pass such inspections, and the inspections and any necessary remediation may be costly. Failure to pass such inspections by us or any of our suppliers would affect our ability to commercialize Lumoxiti or our product candidates in Europe, the United States or elsewhere. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations. For example, in November 2019, Impletio Wirkstoffabfüllung GmbH (formerly known as Rentschler Fill Solutions GmbH), the subcontractor in charge of the fill-and-finish manufacturing operations of lacutamab unilaterally decided to withdraw the certificates of conformance of all clinical batches produced at their facilities, including the lacutamab batch used for the TELLOMAK Phase II clinical trial assessing lacutamab in multiple indications, which resulted in partial or full holds in a number of countries. See "Item 4.B–Business Overview—Lacutamab, A Tumor Targeting Anti-KIR3DL2 Antibody—Clinical Development of Lacutamab—Phase II Clinical Trial (TELLOMAK)."

Our production costs may be higher than we currently estimate.

Lumoxiti and our product candidates are manufactured according to manufacturing best practices applicable to drugs for clinical trials and to specifications approved by the applicable regulatory authorities. If any of our products were found to be non-compliant, we would be required to manufacture the product again, which would entail additional costs and may prevent delivery of the product to patients on time.

Other risks inherent in the production process may have the same effect, such as:

- contamination of the controlled atmosphere area;
- unusable premises and equipment;
- new regulatory requirements requiring a partial and/or extended stop to the production unit to meet the requirements;
- unavailable qualified personnel;
- power failure of extended duration; and
- logistical error.

Should any of these risks materialize, this could have a material adverse effect our business, prospects, financial condition and results of operations.

We may use hazardous chemicals and biological materials in our business and any claims relating to improper handling, storage or disposal of these materials could be time-consuming and costly.

Our research and development processes involve the controlled use of hazardous materials, including chemicals, biological and radioactive materials. We cannot eliminate the risk of accidental contamination or discharge and any resultant injury from these materials. We also handle genetically recombined material, genetically modified species and pathological biological samples. Consequently, in France and in the jurisdictions where we conduct clinical trials, we are subject to environment and safety laws and regulations governing the use, storage, handling, discharge and disposal of hazardous materials, including chemical and biological products and radioactive materials. We impose preventive and protective measures for the protection of our workforce and waste control management in accordance with applicable laws, including part four of the French Labor Code, relating to occupational health and safety.

In France, we are required to comply with a number of national, regional and local legislative or regulatory provisions regarding radiation and hazardous materials, including specific regulations regarding the use, handling and storage of radioactive materials and the potential exposure of employees to hazardous materials and radiation. We must also comply with French regulations concerning the use and handling of genetically modified organisms, or GMOs, in confined spaces.

If we fail to comply with applicable regulations, we could be subject to fines and may have to suspend all or part of our operations. Compliance with environmental, health and safety regulations involves additional costs, and we may have to incur significant costs to comply with future laws and regulations in relevant jurisdictions. Compliance with environmental laws and regulations could require us to purchase equipment, modify facilities and undertake considerable expenses. We could be liable for any inadvertent contamination, injury or damage, which could negatively affect its business, although we have subscribed to an insurance policy covering certain risks inherent to its business.

Risks Related to Our Organization and Operations

We may encounter difficulties in managing our growth, which could disrupt our operations.

Our strategy involves continuing to grow our business internally. However, we may also grow externally through selective acquisitions of complementary products and technologies, or of companies with such assets, although no such plan is currently contemplated. As our development progresses, we expect to experience significant growth in the number of our employees and the scope of our operations, particularly in the areas of research, drug development, regulatory affairs and sales, marketing and distribution for our approved product, Lumoxiti. To manage our anticipated future growth, we must continue to implement and improve our managerial, operational and financial systems, expand our facilities and continue to recruit and train additional qualified personnel. Due to our limited financial resources and the limited experience of our management team in managing a company with such anticipated growth, we may not be able to effectively manage the expansion of our operations or recruit and train additional qualified personnel. This risk is compounded by the fact that we are located in Marseille, France and compete with other locations that potential recruits may find more attractive.

Our management may need to divert a disproportionate amount of its attention away from its day-to-day activities and devote a substantial amount of time to managing internal or external growth. We may not be able to effectively manage the expansion of our operations which may result in weaknesses in our infrastructure, give rise to operational errors, loss of business opportunities, loss of employees and reduced productivity among remaining employees. Our expected growth could require significant capital expenditures and may divert financial resources from other projects, such as the development of existing and additional product candidates. If our management is unable to effectively manage our expected growth, our expenses may increase more than expected, our ability to generate and/or grow revenue could be reduced and we may not be able to implement our business strategy.

If we were to acquire assets or companies, the success of such an acquisition would depend on our capacity to carry out such acquisitions and to integrate such assets or companies into our existing operations. The implementation of such a strategy could impose significant constraints, including:

- human resources: recruiting, integrating, training, managing, motivating and retaining a growing number of employees;
- financial and management system resources: identification and management of appropriate financing and management of our financial reporting systems; and
- infrastructure: expansion or transfer of our laboratories or the development of our information technology system.

In 2019, we initiated a significant upgrade of our information system to support our development, starting with the implementation of an Enterprise Resource Planning system to equip our company with robust and standard tools and reinforce the reliability of our financial operations and information. Such a project is transformative and involves a significant amount of human resources and presents risks, such as (i) the risk of delays in the operations during the first months of implementation, (ii) the risk of loss of data and/or quality of data during the migration process and (iii) the risk that our employees do not fully adhere to such new organizations and information systems (the so-called “change management risk”).

If we are unable to manage internal growth or have difficulty integrating any acquisitions, it could have a material adverse effect on our business, prospects, financial condition and results of operations.

We will need to hire new employees and expand our use of service providers.

As of December 31, 2019, we had 235 employees. As our development and commercialization plans and strategies develop, we must add a significant number of additional managerial, operational, sales, marketing, financial and other personnel.

We currently rely, and for the foreseeable future will continue to rely, in part on certain independent organizations, advisors and consultants to provide certain services. There can be no assurance that the services of these independent organizations, advisors and consultants will continue to be available to us on a timely basis when needed, or that we can find qualified replacements. In addition, if we are unable to effectively manage our outsourced activities or if the quality or accuracy of the services provided by consultants is compromised for any reason, our clinical trials may be extended, delayed, or terminated, and we may not be able to obtain regulatory approval of our product candidates or otherwise advance our business. There can be no assurance that we will be able to manage our existing consultants or find other competent outside contractors and consultants on economically reasonable terms, if at all.

If we are not able to effectively expand our organization by hiring new employees and expanding our groups of consultants and contractors, we may not be able to successfully implement the tasks necessary to further develop and commercialize Lumoxiti and our product candidates and, accordingly, may not achieve our research, development and commercialization goals.

We depend on qualified management personnel and our business could be harmed if we lose key personnel and cannot attract new personnel.

Our ability to retain key persons in our organization and to recruit qualified personnel is crucial for our success. In particular, our success depends heavily on its ability to retain key people in our organization, including key scientific and medical personnel.

Should we be unable to retain the individuals who form our team of key managers and key scientific advisors, it could have a material adverse effect on our business and development and could consequently affect our business, prospects, financial condition and results of operations.

We will need to recruit qualified scientific and medical personnel to carry out our clinical trials and expand into new areas that require specialized skills, such as regulatory matters, marketing and manufacturing. We compete with other companies, research organizations and academic institutions in recruiting and retaining highly qualified scientific, technical and management personnel. Competition for such personnel is very intense in the biopharmaceutical field and there can be no assurance that we will be successful in attracting or retaining such personnel and the failure to do so could harm our operations and our growth prospects. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

Our business may be exposed to foreign exchange risks.

We incur some of our expenses, and derive certain of our revenues, in currencies other than the euro. In particular, as we expand our operations and conduct additional clinical trials in the United States, we will incur additional expenses in U.S. dollars. As a result, we are exposed to foreign currency exchange risk as our results of operations and cash flows are subject to fluctuations in foreign currency exchange rates.

We currently do not engage in hedging transactions to protect against uncertainty in future exchange rates between particular foreign currencies and the euro. Therefore, an unfavorable change in the value of the euro against the U.S. dollar could have a negative impact on our revenue and earnings growth. We cannot predict the impact of foreign currency fluctuations, and foreign currency fluctuations in the future may adversely affect our financial condition, results of operations and cash flows. The ADSs being offered in the U.S. offering are quoted in U.S. dollars on Nasdaq, while our ordinary shares trade in euro on Euronext Paris. Our financial statements are prepared in euro. Therefore, fluctuations in the exchange rate between the euro and the U.S. dollar will also affect, among other matters, the value of our ordinary shares and ADSs.

Under our license and collaboration agreements with AstraZeneca, the payments we receive are in U.S. dollars. In the future, we could generate part of our sales in the United States and part in Europe and could therefore be subject to an unfavorable euro/dollar exchange rate. Therefore, for example, an increase in the value of the euro against the U.S. dollar could be expected to have a negative impact on our revenue and earnings growth as U.S. dollar revenue and earnings, if any, would be translated into euro at a reduced value. We could also sign contracts denominated in other currencies, which would increase our exposure to currency risk. In accordance with our business decisions, our exposure to this type of risk could change depending on:

- the currencies in which we receive our revenues;
- the currencies chosen when agreements are signed, such as licensing agreements, or co-marketing or co- development agreements;
- the location of clinical trials on product candidates; and
- our policy for insurance cover.

At present, we have not put any specific hedging arrangements in place to address these risks. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

Product liability and other lawsuits could divert our resources, result in substantial liabilities, reduce the commercial potential of Lumoxiti or our product candidates and damage our reputation.

Given that we develop therapeutic products intended to be tested on humans and used to treat humans, the risk that we may be sued on product liability claims is inherent in our business. Side effects of, or manufacturing defects in, products that we develop could result in the deterioration of a patient's condition, injury or even death. For example, our liability could be sought after by patients participating in the clinical trials in the context of the development of the therapeutic products tested and unexpected side effects resulting from the administration of these products. Once a product is approved for sale and commercialized, the likelihood of product liability lawsuits increases. Criminal or civil proceedings might be filed against us by patients, regulatory authorities, biopharmaceutical companies and any other third-party using or marketing our products. These actions could include claims resulting from acts by our partners, licensees and subcontractors, over which we have little or no control. These lawsuits may divert our management from pursuing our business strategy and may be costly to defend. In addition, if we are held liable in any of these lawsuits, we may incur substantial liabilities, may be forced to limit or forgo further commercialization of the affected products and may suffer damage to our reputation.

Although the clinical trial process is designed to identify and assess potential side effects, it is always possible that a drug, even after regulatory approval, may exhibit unforeseen side effects. If any of our product candidates were to cause adverse side effects during clinical trials or after approval of the product candidate, we may be exposed to substantial liabilities. Physicians and patients may not comply with any warnings that identify known potential adverse effects and patients who should not use Lumoxiti or our product candidates.

We have obtained liability insurance coverage for each of our clinical trials in compliance with local legislation and rules. In the United States, our aggregate insurance coverage for our ongoing clinical trials is €10.0 million in the aggregate. Our insurance coverage may not be sufficient to cover any expenses or losses we may suffer. Moreover, insurance coverage is becoming increasingly expensive, and, in the future, we may not be able to maintain insurance coverage at a reasonable cost or in sufficient amounts to protect us against losses due to liability. On occasion, large judgments have been awarded in class action lawsuits based on drugs that had unanticipated side effects. The cost of any product liability litigation or other proceedings, even if resolved in our favor, could be substantial. A successful product liability claim, or series of claims, brought against us could cause our share price to decline and, if judgments exceed our insurance coverage, could decrease our cash and adversely affect our business.

To date, we have obtained product liability insurance with a coverage amount of €10 million per year. Our product liability insurance will need to be adjusted in connection with the commercial sales of Lumoxiti and our product candidates, and may be unavailable in meaningful amounts or at a reasonable cost. If we are the subject of a successful product liability claim that exceeds the limits of any insurance coverage we obtain, we would incur substantial charges that would adversely affect our earnings and require the commitment of capital resources that might otherwise be available for the development and commercial launch of our product programs. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

There are material weaknesses and significant deficiencies in our internal controls over financial reporting and if we are unable to maintain effective internal controls over financial reporting, the accuracy and timeliness of our financial reporting may be adversely affected, which could hurt our business, lessen investor confidence and depress the market price of our securities.

We must maintain effective internal control over financial reporting in order to accurately and timely report our results of operations and financial condition. In addition, as a public company listed in the United States, the Sarbanes-Oxley Act will require, among other things, that we assess the effectiveness of our internal control over financial reporting at the end of each fiscal year starting year ended December 31, 2020. However, our independent registered public accounting firm will not be required to attest to the effectiveness of our internal controls over financial reporting for so long as we are an "emerging growth company," which may be up to five fiscal years following the date of the October 2019 public global offering. An independent assessment of the effectiveness of our internal controls over financial reporting could detect problems that our management's assessment might not.

During the audit of our consolidated financial statements as of and for the years ended December 31, 2019, we identified material weaknesses in our internal control over financial reporting. A company's internal control over financial reporting is a process designed by, or under the supervision of, a company's principal executive and principal financial officers, or persons performing similar functions, and effected by a company's executive board, management and other personnel to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements in accordance with generally accepted accounting principles. Under standards established by the Public Company Accounting Oversight Board, a material weakness is a deficiency or combination of deficiencies in internal control over financial reporting, such that there is a reasonable possibility that a material misstatement in our annual or interim financial statements will not be prevented or detected and corrected on a timely basis.

In the course of auditing the consolidated financial statements as of and for the year ended December 3 1, 2019, several material weaknesses in our internal control over financial reporting were identified. The material weaknesses related to (i) the accounting for subcontracting clinical costs for which there was insufficient control on the input data coming from clinical studies and used in assessing their advancement (input data mainly includes expected termination date of the study, overall budget and/or number of patient visits), and (ii) the recognition of the revenue from our collaboration and licensing agreement with AstraZeneca on monalizumab for which there was insufficient review of the calculation of the transaction price and percentage of completion of costs incurred. Errors not detected in relation to topic (i) have led to incorrect amounts of R&D expenses for the year ended December 31, 2019, which were subsequently corrected prior to the issuance of our audited financial statements. The material weakness in relation to topic (ii) has led to a material misstatement of revenue for the year ended December 31, 2019, which was subsequently corrected prior to the issuance of our audited financial statements. In addition our information system, supporting the production of our financial information, also showed material weaknesses in terms of "general IT controls" (GITC) related to the management of access rights, including segregation of duties and change management.

We are in the process of implementing measures aimed at remedying such weaknesses. In particular, in 2019, we initiated a significant upgrade of our information system to support our development, starting with the implementation of an Enterprise Resource Planning system to equip our company with robust and standard tools and reinforce the reliability of our financial operations and information. In addition, we intend to allocate further human resources to our information systems and internal control departments in 2020.

We have taken and are taking steps to remediate the foregoing weaknesses and deficiencies. However, if we do not successfully remediate these issues or if we fail to design and operate effective internal controls in the future, it could result in material misstatements in our financial statements, result in the loss of investor confidence in the reliability of our financial statements and subject us to regulatory scrutiny and sanctions, which in turn could harm the market value of our ordinary shares and ADSs.

The rules governing the standards must be met for our management to assess our internal control over financial reporting pursuant to Section 404 of the Sarbanes-Oxley Act are complex and require significant documentation, testing and possible remediation. These stringent standards require that our audit committee be advised and regularly updated on management's review of internal control over financial reporting. We have begun the process of designing, implementing, and testing the internal control over financial reporting required to comply with this obligation. This process is time-consuming, costly, and complicated. Our management may not be able to effectively and timely implement controls and procedures that adequately respond to the increased regulatory compliance and reporting requirements that are or will be applicable to us as a public company listed in the United States. If we fail to staff our accounting and finance function adequately or maintain internal control over financial reporting adequate to meet the demands that are or will be placed upon us as a public company listed in the United States, our business and reputation may be harmed and the price of our ordinary shares and ADSs may decline. In addition, undetected material weaknesses in our internal control over financial reporting could lead to restatements of financial statements and require us to incur the expense of remediation. Any of these developments could result in investor perceptions of us being adversely affected, which could cause a decline in the market price of our securities.

Our internal computer systems, or those of our third-party contractors or consultants, may fail or suffer security breaches, which could result in a material disruption of our product development programs.

We have implemented a security policy that are both intended to secure our data against impermissible access and to preserve the integrity and confidentiality of the data. Despite the implementation of such security measures, including a cybersecurity program under development since 2019, our internal computer systems and those of our third-party contractors and consultants are vulnerable to damage from computer viruses, unauthorized access, natural disasters, terrorism, war, telecommunication and electrical failures, and other sources. Moreover, part of our information system is "cloud"-based and thus is not fully under our control.

In addition, our research and development facility and headquarters in Luminy, France is located in an area that may be more susceptible to wildfires. If our facility or computer systems are damaged by fire despite the fire prevention and data archiving measures we have put in place, we could suffer financial losses and delays in our operations.

If such an event were to occur and cause interruptions in our operations, it could result in a material disruption of our programs. For example, the loss of clinical trial data for our product candidates could result in delays in our regulatory approval efforts and significantly increase our costs to recover or reproduce the lost data. To the extent that any disruption or security breach results in a loss of or damage to our data or applications or other data or applications relating to our technology or product candidates, or inappropriate disclosure of confidential or proprietary information, we could incur liabilities, including penalties under data privacy laws such as the GDPR and other regulations, and the further development of our product candidates could be delayed. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

Our employees may engage in misconduct or other improper activities, including violating applicable regulatory standards and requirements, engaging in insider trading or violate the terms of their confidentiality agreements, which could significantly harm our business.

We are exposed to the risk of employee fraud or other misconduct. Misconduct by employees could include intentional failures to comply with legal requirements or the requirements of national authorities, the EMA, FDA and other government regulators, provide accurate information to applicable government authorities, comply with fraud and abuse and other healthcare laws and regulations in the United States, Europe and elsewhere, report financial information or data accurately or disclose unauthorized activities to us. In particular, sales, marketing and business arrangements in the healthcare industry are subject to extensive laws and regulations intended to prevent fraud, misconduct, kickbacks, self-dealing and other abusive practices. These laws and regulations restrict or prohibit a wide range of pricing, discounting, marketing and promotion, sales commission, customer incentive programs and other business arrangements. Employee misconduct could also involve the improper use of, including trading on, information obtained in the course of clinical trials, which could result in regulatory sanctions and serious harm to our reputation. We have a Code of Ethics that applies to all employees and consultants, and other policies and charters, but it is not always possible to identify and deter employee misconduct, and the precautions we take to detect and prevent this activity may be ineffective in controlling unknown or unmanaged risks or losses or in protecting us from governmental investigations or other actions or lawsuits stemming from a failure to comply with these laws or regulations.

In order to protect our proprietary technology and processes, we rely in part on confidentiality agreements with our partners, employees, consultants, outside scientific collaborators and sponsored researchers, and other advisors. These agreements may not effectively prevent disclosure of confidential information and may not provide an adequate remedy in the event of unauthorized disclosure of confidential information. Costly and time-consuming litigation could be necessary to enforce and determine the scope of our proprietary rights, and failure to obtain or maintain trade secret protection could adversely affect our competitive business position. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

We may acquire businesses or products in the future and we may not realize the benefits of such acquisitions.

Although our current strategy involves continuing to grow our business internally, we may grow externally through selective acquisitions of complementary products and technologies, or of companies with such assets. If such acquisitions were to become necessary or attractive in the future, we may not be able to identify appropriate targets or make acquisitions under satisfactory conditions, in particular, satisfactory price conditions. In addition, we may be unable to obtain the financing for these acquisitions under favorable conditions, and could be led to finance these acquisitions using cash that could be allocated to other purposes in the context of existing operations. We may encounter numerous difficulties in developing, manufacturing and marketing any new products resulting from an acquisition that delay or prevent us from realizing their expected benefits or enhancing our business. We cannot assure you that, following any such acquisition, we will achieve the expected synergies to justify the transaction, which could have a material adverse effect on our business, financial conditions, earnings and prospects.

Risks Related to Intellectual Property Rights

Our ability to compete may be adversely affected if we do not adequately obtain, maintain, protect and enforce our intellectual property or proprietary rights, or if the scope of intellectual property protection we obtain is not sufficiently broad.

Our success depends, in large part, on our ability to obtain and maintain patent and other intellectual property protection in the United States and other countries with respect to Lumoxiti and our product candidates. However, we may not be able to obtain, maintain or enforce our patents and other intellectual property rights which could affect our ability to compete effectively. For example, we cannot guarantee:

- that we will file all necessary or desirable patent applications or that we will obtain the patents that we have applied for and that are under review;
- that we will be able to develop new patentable product candidates or technologies or obtain patents to protect such new product candidates or technologies;

- that we or our licensing or collaboration partners were the first to make the product candidates or technologies covered by the issued patents or pending patent applications that we license or own;
- that we will be able to obtain sufficient rights to all necessary or desirable patents or other intellectual property rights, whether at all or on reasonable terms;
- that the scope of any issued patents that we own or license will be broad enough to protect Lumoxiti or our product candidates or effectively prevent others from commercializing competitive technologies and product candidates; and
- that there is no risk of our owned and licensed patents being challenged, invalidated or circumvented by a third-party.

The patent prosecution process is expensive, time-consuming, and complex, and we may not be able to file, prosecute, maintain, enforce, or license all necessary or desirable patent applications at a reasonable cost or in a timely manner. For example, we do not intend to systematically file, maintain, prosecute and defend patents on Lumoxiti and our product candidates in all countries. Consequently, we may not be able to prevent third parties from exploiting products that are the same as or similar to our products and product candidates in countries in which we do not obtain patent protection, or from selling or importing such products in and into the countries in which we do have patent protection. It is also possible that we will fail to identify patentable aspects of our research and development output in time to obtain patent protection. Although we enter into confidentiality agreements with parties who have access to confidential or patentable aspects of our research and development output, such as our employees, consultants, CROs, outside scientific collaborators, sponsored researchers, and other advisors, any of these parties may breach the agreements and disclose such output before a patent application is filed, thereby jeopardizing our ability to seek patent protection. Given the amount of time required for the development, testing and regulatory review of new product candidates, patents protecting such candidates might expire before or shortly after such candidates are commercialized. As a result, our intellectual property may not provide us with sufficient rights to exclude others from commercializing product candidates similar or identical to ours. In addition, in some circumstances, we may not have the right to control the preparation, filing, prosecution, maintenance, enforcement and defense of patents and patent applications covering technology that we license to or from third parties. For example, pursuant to our license agreement with AstraZeneca for monalizumab, AstraZeneca retains control of such activities for certain patents that we license to it under the agreement and patents that arise under the collaboration. We cannot be certain that these patents and patent applications will be prepared, filed, prosecuted, maintained, enforced, and defended in a manner consistent with the best interest of our business. If any third-party that controls our patents and patent applications fails to maintain our patents or such third-party loses rights to our patents or patent applications, our rights to those patents and underlying technology may be reduced or eliminated and our right to develop and commercialize our product candidates that are subject to such rights could be adversely affected.

Moreover, some of our patents and patent applications are, and may in the future be, co-owned with third parties. If we are unable to obtain an exclusive license to any such third-party co-owners' interest in such patents or patent applications, such co-owners may be able to license their rights to other third parties, including our competitors, and our competitors could market competing products and technology. We may also need the cooperation of any such co-owners of our patents in order to enforce such patents against third parties, and such cooperation may not be provided to us.

The coverage claimed in a patent application can be significantly reduced before the patent is issued, and its scope can be reinterpreted after issuance. The issuance of a patent is not conclusive as to its inventorship, scope, validity or enforceability. Even if patent applications we license or own currently or in the future issue as patents, they may not issue in a form that will provide us with any meaningful protection, prevent competitors or other third parties from circumventing our patents by developing similar or alternative technologies or products in a non-infringing manner, or otherwise provide us with any competitive advantage. Challenges from competitors or other third parties could reduce the scope of our patents or render them invalid or unenforceable, which could limit our ability to stop others from using or commercializing similar or identical technology and product candidates, or limit the duration of the patent protection for Lumoxiti and our product candidates. The legal proceedings that we may then have to enter into in order to enforce and defend our intellectual property could be very costly and could distract our management and other personnel from their normal responsibilities, notably in the case of lawsuits in the United States. The probability of disputes arising over our intellectual property will increase progressively as patents are granted and as the value and appeal of the inventions protected by these patents are confirmed. The occurrence of any of these events concerning any of our patents or intellectual property rights could have a material adverse effect our business, prospects, financial condition and results of operations. These risks are even higher for us, because of our limited financial and human resources.

The patent position of biotechnology and pharmaceutical companies generally is highly uncertain, involves complex legal and factual questions, and has been the subject of much litigation in recent years. As a result, the issuance, scope, validity, enforceability, and commercial value of our patent rights are highly uncertain. Our pending and future patent applications may not result in patents being issued which protect our technology or product candidates or which effectively prevent others from commercializing competitive technologies and product candidates. Furthermore, our owned and in-licensed patents may be subject to a reservation of rights by one or more third parties. For example, the research resulting in certain of our owned and licensed patent rights and technology was funded in part by the U.S. government. As a result, the government may have certain rights, or march-in rights, to such patent rights and technology. When new technologies are developed with government funding, the government generally obtains certain rights in any resulting patents, including a non-exclusive license authorizing the government to use the invention for non-commercial purposes. These rights may permit the government to disclose our confidential information to third parties and to exercise march-in rights to use or allow third parties to use our licensed technology. The government can exercise its march-in rights if it determines that action is necessary because we fail to achieve practical application of the government-funded technology, because action is necessary to alleviate health or safety needs, to meet requirements of federal regulations, or to give preference to U.S. industry. In addition, our rights in such inventions may be subject to certain requirements to manufacture products embodying such inventions in the United States. Any exercise by the government of such rights could harm our competitive position, business, financial condition, results of operations, and prospects.

Third parties may allege that we or our partners infringe, misappropriate or otherwise violate such third parties' intellectual property rights, which could prevent or delay our development efforts, stop us from commercializing Lumoxiti or our product candidates, or increase the costs of commercializing Lumoxiti or our product candidates.

Our commercial success depends on our ability and the ability of our partners to develop, manufacture, market and sell Lumoxiti and our product candidates, and use our proprietary technologies, without infringing, misappropriating or otherwise violating any intellectual property or proprietary rights of third parties. The field of biopharmaceuticals involves significant patent and other intellectual property litigation, which can be highly uncertain and involve complex legal and factual questions. The interpretation and breadth of claims allowed in some patents covering biopharmaceutical compositions also may be uncertain and difficult to determine.

We may not be aware of all third-party intellectual property rights potentially relating to our product candidates. In general, in the United States patent applications are not published until 18 months after filing or, in some cases, not at all. Therefore, we cannot be sure that we were the first to make the inventions claimed in any owned or licensed patents or pending patent applications, or that we were the first to file for patent protection for such inventions. If we were not the first to invent such inventions or first to file any patent or patent application for such inventions, we may be unable to make use of such inventions in connection with our products. We may need to obtain licenses from third parties (which may not be available under commercially reasonable terms, or at all), delay the launch of product candidates, or cease the production and sale of certain product candidates or develop alternative technologies that are the subject of such patents or patent applications, any of which could have a material adverse effect on our business, prospects, financial condition and results of operations. For example, third parties may claim that lacutamab and other product candidates may use technology protected by their patents. Although we believe that our current activities and our planned development of lacutamab does not and will not infringe on such patents, which expire in the near term, third parties may disagree.

Third parties may allege that we or our partners infringe, misappropriate or otherwise violate any such third-party's patents or other intellectual property rights and assert infringement claims against us, regardless of their merit. A court of competent jurisdiction could hold that these third-party patents are valid, enforceable and infringed, which could materially and adversely affect our ability to commercialize Lumoxiti and any product candidates we may develop and any other product candidates or technologies covered by the asserted third-party patents. In order to successfully challenge the validity of any such U.S. patent in federal court, we would need to overcome a presumption of validity. As this burden is a high one requiring us to present clear and convincing evidence as to the invalidity of any such U.S. patent claim, there is no assurance that a court of competent jurisdiction would invalidate the claims of any such U.S. patent. If we are found to infringe a third-party's intellectual property rights, and we are unsuccessful in demonstrating that such rights are invalid or unenforceable, we could be required to:

- bear the potentially significant costs of proceedings brought against us;

- pay damages, which may include treble damages and attorney's fees if we are found to have willfully infringed a third-party's patent rights;
- cease developing, manufacturing and commercializing the infringing technology or product candidates; and
- acquire a license to such third-party intellectual property rights, which may not be available on commercially reasonable terms, or at all, and may be non-exclusive thereby giving our competitors and other third parties access to the same technologies licensed to us.

Even if resolved in our favor, litigation or other intellectual property proceedings may cause us to incur significant expenses and could distract our management and other personnel from their normal responsibilities. In addition, there could be public announcements of the results of hearings, motions or other interim proceedings or developments and if securities analysts or investors perceive these results to be negative, it could have a material adverse effect on the price of our ordinary shares or ADSs. We may not have sufficient financial or other resources to adequately conduct such litigation or proceedings. Some of our competitors may be able to sustain the costs of such litigation or proceedings more effectively than we can because of their greater financial resources and more mature and developed intellectual property portfolios. Should one or more of the foregoing risks materialize, this could have a material adverse effect on our reputation, business, prospects, financial condition and results of operations.

Our patents could be found invalid or unenforceable if challenged and we may not be able to protect our intellectual property.

Our and our licensors' patents and patent applications, if issued, may be challenged, invalidated or circumvented by third parties. U.S. patents and patent applications may also be subject to interference proceedings, re-examination proceedings, derivation proceedings, post-grant review or inter partes review in the United States Patent and Trademark Office, or USPTO, challenging our or our licensors' patent rights. Foreign patents may be subject also to opposition or comparable proceedings in the corresponding foreign patent office. For example, two of our European patents with claims directed to a class of anti-NKG2A antibodies defined by characteristics shared with monalizumab have been challenged in oppositions at the European Patent Office, or the EPO. Although the Opposition Division of the EPO issued a decision that some claims directed to such class of anti-NKG2A antibodies are valid, the Opposition Division's decisions for both patents are currently under appeal. We have also received notices that third parties filed oppositions challenging our in-licensed European patents directed to certain of our CD39 technology, and these oppositions are currently pending.

In addition, we may allege that third parties infringe our or our licensors' patents and the defendant could counterclaim that such patents are invalid or unenforceable. In patent litigation in the United States, defendant counterclaims alleging invalidity or unenforceability are commonplace. Grounds for a validity challenge could be an alleged failure to meet any of several statutory requirements, including lack of novelty, obviousness, or non-enablement. Grounds for an unenforceability assertion could be an allegation that someone connected with prosecution of the patent withheld relevant information from the USPTO, or made a misleading statement, during prosecution. The outcome following legal assertions of invalidity and unenforceability is unpredictable. With respect to the validity question, for example, we cannot be certain that there is no invalidating prior art, of which we or our licensing partners and the patent examiner were unaware during prosecution.

Any such patent litigation or proceeding could result in the loss of our or our licensors' patents, denial of our or our licensors' patent applications or loss or reduction in the scope of one or more of the claims of such patents or patent applications. Accordingly, our or our licensors' rights under any issued patents may not provide us with sufficient protection against competitive product candidates or processes, we could become unable to manufacture or commercialize Lumoxiti or our product candidates without infringing third-party patent rights, and the duration of the patent protection of Lumoxiti or our product candidates could be limited. Furthermore, because of the substantial amount of discovery required in connection with intellectual property litigation, there is a risk that some of our confidential information could be compromised by disclosure during this type of litigation. Even if we are successful, such litigation or proceedings may be costly and may distract our management and other personnel from their normal responsibilities. Any of the foregoing could have a material adverse effect on our business, prospects, financial condition and results of operations.

Obtaining and maintaining our patent protection depends on compliance with various procedural, document submission, fee payment and other requirements imposed by government patent agencies, and our patent protection could be reduced or eliminated for non-compliance with these requirements.

Periodic maintenance fees, renewal fees, annuity fees and various other government fees on patents and/or applications will be due to be paid to the USPTO, and various government patent agencies outside of the United States over the lifetime of our owned and licensed patents and/or patent applications and any patent rights we may own in the future. In certain circumstances, we may rely on our licensing partners to pay these fees. The USPTO and various foreign patent agencies require compliance with several procedural, documentary, fee payment and other similar provisions during the patent application process. In many cases, an inadvertent lapse can be cured by payment of a late fee or by other means in accordance with the applicable rules. There are situations, however, in which non-compliance can result in abandonment or lapse of the patent or patent application, resulting in partial or complete loss of patent rights in the relevant jurisdiction. In such an event, potential competitors might be able to enter the market with similar or identical products or technology, which could have a material adverse effect on our business, prospects, financial condition and results of operations.

Developments in patent law could have a negative impact on our business.

Changes in either the patent laws or interpretation of the patent laws could increase the uncertainties and costs surrounding the prosecution of patent applications and the enforcement or defense of issued patents. For example, from time to time, the U.S. Congress, the USPTO or similar foreign authorities may change the standards of patentability and any such changes could have a negative impact on our business. In addition, the Leahy-Smith America Invents Act, or the America Invents Act, which was signed into law in September 2011, includes a number of significant changes to U.S. patent law. These changes include a transition from a "first-to-invent" system to a "first-to-file" system, changes to the way issued patents are challenged and changes to the way patent applications are disputed during the examination process such as allowing third-party submission of prior art to the USPTO during patent prosecution. These changes may favor larger and more established companies that have greater resources to devote to patent application filing and prosecution. Under a first-to-file system, assuming that other requirements for patentability are met, the first inventor to file a patent application generally will be entitled to the patent on an invention regardless of whether another inventor made the invention earlier. The USPTO has developed new regulations and procedures to govern the full implementation of the America Invents Act, and many of the substantive changes to patent law associated with the America Invents Act, and, in particular, the first-to-file provisions, became effective in March 2013. Substantive changes to patent law associated with the America Invents Act, or any subsequent U.S. legislation regarding patents, may affect our ability to obtain patents, and if obtained, to enforce or defend them. Accordingly, it is not clear what, if any, impact the America Invents Act will have on the cost of prosecuting our U.S. patent applications, our ability to obtain U.S. patents based on our discoveries and our ability to enforce or defend any patents that may issue from our patent applications, all of which could have a material adverse effect on our business.

In addition, changes to or different interpretations of patent laws in the United States and other countries may permit others to use our or our partners' discoveries or to develop and commercialize our technology and product candidates without providing any compensation to us, or may limit the number of patents or claims we can obtain. The patent positions of companies in the biotechnology and pharmaceutical market are particularly uncertain. Recent U.S. Supreme Court rulings have narrowed the scope of U.S. patent protection available in certain circumstances and weakened the rights of patent owners in certain situations. This combination of events has created uncertainty with respect to the validity and enforceability of patents, once obtained. Depending on future actions by the U.S. Congress, the federal courts, and the USPTO, as well as similar bodies in other countries, the laws and regulations governing patents could change in unpredictable ways that could have a material adverse effect on our existing patent portfolio and our ability to protect and enforce our intellectual property in the future, which could have a material adverse effect on our business, prospects, financial condition and results of operations.

If we do not obtain protection under the Hatch-Waxman Amendments and similar non-U.S. legislation for extending the term of patents covering Lumoxiti and each of our product candidates, our business may be materially harmed.

Depending upon the timing, duration and conditions of FDA marketing authorization of Lumoxiti and our product candidates, one or more of our U.S. patents may be eligible for limited patent term extension under the Drug Price Competition and Patent Term Restoration Act of 1984, or the Hatch-Waxman Amendments, and similar legislation in the European Union. The Hatch-Waxman Amendments permit a patent term extension of up to five years for a patent covering an approved product as compensation for effective patent term lost during product development and the FDA regulatory review process. A patent term extension cannot extend the remaining term of a patent beyond a total of 14 years from the date of product approval, only one patent may be extended and only those claims covering the approved product, a method for using it or a method for manufacturing it may be extended. However, we may not receive an extension if we fail to apply within applicable deadlines, fail to apply prior to expiration of relevant patents, fail to exercise due diligence during the testing phase or regulatory review process or otherwise fail to satisfy applicable requirements. Moreover, the length of the extension could be less than we request. If we are unable to obtain patent term extension or the term of any such extension is less than we request, the period during which we can enforce our patent rights for that product will be shortened and our competitors may obtain approval to market competing products sooner. As a result, our revenue from Lumoxiti or an applicable product could be reduced, possibly materially, which could have a material adverse effect on our business, prospects, financial condition and results of operations.

We will not seek to protect our intellectual property rights in all jurisdictions throughout the world and we may not be able to adequately enforce our intellectual property rights in all jurisdictions where we seek intellectual property protection.

Filing, maintaining, prosecuting and defending patents on Lumoxiti and our product candidates in all countries and jurisdictions throughout the world would be prohibitively expensive, and our intellectual property rights in some countries outside the United States could be less extensive than those in the United States. Consequently, we may not be able to prevent third parties from using our product candidates or technologies in all countries outside the United States, or from selling or importing products made using our product candidates or technologies in and into the United States or other jurisdictions. Competitors may use our technologies in jurisdictions where we do not pursue and obtain patent protection to develop their own products and further, may export otherwise infringing products to territories where we have patent protection, and enforcement is not as strong as that in the United States. These products may compete with our products, and our patents or other intellectual property rights may not be effective or sufficient to prevent them from competing. Even if we pursue and obtain issued patents in particular jurisdictions, our patent claims or other intellectual property rights may not be effective or sufficient to prevent third parties from so competing.

In addition, the laws of some foreign countries do not protect intellectual property rights to the same extent as the federal and state laws in the United States. Many companies have encountered significant problems in protecting and defending intellectual property rights in certain foreign jurisdictions. The legal systems of some countries, particularly developing countries, do not favor the enforcement of patents and other intellectual property protection, especially those relating to biopharmaceuticals or biotechnologies. This could make it difficult for us to stop the infringement of our patents, if obtained, or the misappropriation or other violation of our other intellectual property rights. For example, many foreign countries have compulsory licensing laws under which a patent owner must grant licenses to third parties. In addition, many countries limit the enforceability of patents against third parties, including government agencies or government contractors. In these countries, patents may provide limited or no benefit. Patent protection must ultimately be sought on a country-by-country basis, which is an expensive and time-consuming process with uncertain outcomes. Accordingly, we may choose not to seek patent protection in certain countries, and we will not have the benefit of patent protection in such countries.

Proceedings to enforce our patent rights in foreign jurisdictions could result in substantial costs and divert our efforts and attention from other aspects of our business, could put our patents at risk of being invalidated or interpreted narrowly, could put our patent applications at risk of not issuing and could provoke third parties to assert claims against us. We may not prevail in any lawsuits that we initiate and the damages or other remedies awarded, if any, may not be commercially meaningful. In addition, changes in the law and legal decisions by courts in the United States and other countries may affect our ability to obtain adequate protection for our technology and the enforcement of our intellectual property. Accordingly, our efforts to enforce our intellectual property rights around the world may be inadequate to obtain a significant commercial advantage from the intellectual property that we develop or license. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

Third parties may assert ownership or commercial rights to products, product candidates or technologies that we develop.

Third parties have made, and may in the future make, claims challenging the inventorship or ownership of our intellectual property, which may result in the imposition of additional obligations on us, such as development, royalty and milestone payments. We have written agreements with partners or other third parties that provide for the ownership of intellectual property arising from our collaborations and our other work with such third parties. These agreements provide that we must negotiate certain commercial rights with partners and other third parties with respect to joint inventions or inventions made by our partners or such third parties that arise from the results of the collaboration or other work with such third parties. In some instances, there may not be adequate written provisions to address clearly the resolution of intellectual property rights that may arise under our agreements. For example, Orega Biotech SAS, or Orega Biotech, has made claims of joint ownership of certain patents relating to IPH5201, and we and Orega Biotech have agreed to resolve those claims in an arbitration proceeding. If we cannot successfully negotiate sufficient ownership and commercial rights to the inventions that result from our use of a third-party's materials where required, or if disputes otherwise arise with respect to the intellectual property developed with the use of a third-party's samples, we may be limited in our ability to capitalize on the market potential of these inventions. In addition, we may face claims by third parties that our agreements with employees, contractors, or consultants obligating them to assign intellectual property to us are ineffective, or in conflict with prior or competing contractual obligations of assignment, which could result in ownership disputes regarding intellectual property we have developed or will develop and interfere with our ability to capture the commercial value of such inventions. We also may be unsuccessful in executing assignment agreements with each party who, in fact, conceives or develops intellectual property that we regard as our own, or such agreements might not be self-executing or might be breached.

Litigation may be necessary to resolve an ownership dispute, and if we are not successful, we may be precluded from using certain intellectual property, may lose our exclusive rights in such intellectual property or may be required to acquire a license to such intellectual property, which may not be available on commercially reasonable terms or at all. Any of the foregoing could have a material adverse impact on our business.

If we fail to comply with our obligations under license or technology agreements with third parties, we could lose license rights that are critical to our business, and we may not be successful in obtaining necessary intellectual property rights.

We license intellectual property from third parties that is critical to our business through license agreements, including but not limited to licenses related to the manufacture, composition, use and sale of our product candidates, and in the future we may enter into additional agreements that provide us with licenses to valuable intellectual property or technology. For example, we depend on our license agreement with AstraZeneca for the commercialization of Lumoxiti and our license agreement with Novo Nordisk A/S for the development and commercialization of monalizumab. Our license agreements impose various obligations on us, which may include development, royalty and milestone payments. If we fail to comply with any of these obligations, our licensors may have the right to terminate the agreements. If our license agreements with AstraZeneca or Novo Nordisk A/S or any other current or future licensors terminate, we would lose valuable rights and may be required to cease our development, manufacture or commercialization of Lumoxiti or our product candidates, including monalizumab. In addition, our business would suffer if our licensors fail to abide by the terms of the agreements, if our licensors fail to prevent infringement by third parties, or if the licensed patents or other rights are found to be invalid or unenforceable. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

In addition, disputes may arise regarding intellectual property subject to a license agreement, including:

- the scope of rights granted under the license agreement and other interpretation-related issues;
- the extent to which our technology and processes infringe on intellectual property of the counterparty that is not subject to the license agreement;
- our diligence obligations under the license agreement and what activities satisfy those diligence obligations;
- the inventorship or ownership of inventions and know-how resulting from the joint creation or use of intellectual property by our counterparties and us; and
- the priority of invention of patented technology.

The agreements under which we currently license intellectual property from third parties are complex, and certain provisions in such agreements may be susceptible to multiple interpretations. The resolution of any contract dispute that may arise could narrow what we believe to be the scope of our rights to the relevant intellectual property, or modify in a manner adverse to us what we believe to be our or our counterpart's financial or other obligations under the relevant agreement, any of which could have material adverse effect on our business, financial condition, results of operations and prospects. If disputes over intellectual property that we have licensed prevent or impair our ability to maintain our current license agreement on acceptable terms, we may be unable to unsuccessfully develop and commercialize the affected product candidates.

Additionally, the growth of our business may depend, in part, on our ability to acquire, in-license or use proprietary rights held by third parties. We may be unable to acquire or in-license intellectual property rights from third parties that we identify as necessary for our product candidates on reasonable terms or at all. The licensing or acquisition of third-party intellectual property rights is a competitive area, and several more established companies may pursue strategies to license or acquire third-party intellectual property rights that we may consider attractive. These established companies may have a competitive advantage over us due to their size, capital resources, and greater clinical development and commercialization capabilities. In addition, companies that perceive us to be a competitor may be unwilling to assign or license rights to us. We also may be unable to license or acquire third-party intellectual property rights on terms that would allow us to make an appropriate return on our investment.

As part of our business, we collaborate with non-profit and academic institutions to accelerate our preclinical research or development under agreements with these institutions. Typically, these institutions provide us with an option to negotiate a license to any of the institution's or its employees' rights in technology resulting from the collaboration. Regardless of such option, we may be unable to negotiate a license within the specified timeframe or under terms that are acceptable to us. If we are unable to do so, the institution may offer the intellectual property rights to other parties, potentially blocking our ability to pursue our applicable development or commercialization program. If we are unable to successfully obtain rights to required third-party intellectual property rights or maintain the existing intellectual property rights we have, we may have to abandon the development and commercialization of the relevant program and our business, financial conditions, results of operations and prospects could be adversely affected.

Third parties may assert that our employees, consultants or independent contractors have wrongfully used or disclosed confidential information or misappropriated trade secrets of their current or former employers.

We employ individuals who are currently, or were previously, employed at universities or other biotechnology or pharmaceutical companies, including our competitors or potential competitors. Although we try to ensure that our employees, consultants and independent contractors do not use the proprietary information or know-how of others in their work for us, and no such claims against us are currently pending, we may be subject to claims that we or our employees, consultants or independent contractors have used or disclosed intellectual property, including trade secrets or other proprietary information, of any such individual's current or former employer or other third parties. Litigation may be necessary to defend against these claims. If we fail in defending any such claims, in addition to paying monetary damages, we may lose valuable intellectual property rights or personnel. Even if we are successful in defending against such claims, litigation could result in substantial costs and be a distraction to our management and other employees. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

If we are unable to protect the confidentiality of our trade secrets, our business and competitive position could be materially harmed.

In addition to patent protection, because we operate in the highly technical field of biopharmaceutical drug development, we rely in part on trade secret protection in order to protect our proprietary technology and processes. However, trade secrets are difficult to protect. We seek to protect our trade secrets, in part, by entering into confidentiality agreements with our employees, consultants, CROs, outside scientific collaborators, sponsored researchers, and other advisors. These agreements generally require that the other party keep confidential and not disclose to third parties all confidential information developed by such party or made known to such party by us during the course of such party's relationship with us. However, we cannot guarantee that we have entered into such agreements with each party that may have or have had access to our trade secrets and confidential information and these agreements may be breached, and we may not have adequate remedies for any breach.

In addition to contractual measures, we try to protect the confidential nature of our proprietary information using physical and technological security measures. Such measures may not, for example, in the case of misappropriation of a trade secret by an employee or third-party with authorized access, provide adequate protection for our proprietary information. Our security measures may not prevent an employee or consultant from misappropriating our trade secrets and providing them to a competitor, and recourse we take against such misconduct may not provide an adequate remedy to protect our interests fully. Enforcing a claim that a party illegally disclosed or misappropriated a trade secret can be difficult, expensive, and time-consuming, and the outcome is unpredictable. In addition, courts outside the United States may be less willing to protect trade secrets. Moreover, trade secrets may be independently developed by others in a manner that could prevent legal recourse by us. If any of our confidential or proprietary information, such as our trade secrets, were to be disclosed to or misappropriated by a third-party, or if any such information was independently developed by a third-party, our competitive position could be materially harmed.

Our trade and technical secrets include:

- certain unpatented technical expertise that we believe provides us with an advantage in conducting research and development work in our field;
- certain scientific knowledge generated by the work we carry out;
- certain information relating to the product candidates we are currently developing; and
- certain information relating to the agreements signed between us and third parties.

The unauthorized disclosure or misappropriation of certain of these secrets could allow third parties to offer products or services to compete with ours or generally have a material adverse effect on our business.

The structures put in place to protect our trade and technical secrets do not constitute a guarantee that one or more of our trade and technical secrets will not be disclosed or misappropriated. The agreements or other arrangements to protect our trade secrets may fail to provide the protection sought, or are breached, or that our trade secrets are disclosed to, or developed independently by, our competitors. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

Unauthorized use of our trademarks may generate confusion and result in costs and delays to the detriment of our marketing efforts.

Our trademarks are a key component of our identity and our products. Although the key components of our trademarks have been registered, notably in France and the United States, other companies in the pharmaceutical sector might use or attempt to use similar trademarks or components of our trademarks, and thereby create confusion in the minds of third parties. Our registered trademarks may be challenged, infringed, circumvented or declared generic or determined to be infringing on other marks. In addition, there could be potential trademark infringement claims brought by owners of other trademarks that incorporate variations of our registered or unregistered trademarks.

In the event we develop trademarks for products that conflict with intellectual property rights of third parties, we would then have to redesign or rename our products in order to avoid encroaching on the intellectual property rights of third parties. This could prove to be impossible or costly in terms of time and financial resources and could be detrimental to our marketing efforts. Should any of these risks materialize, this could have a material adverse effect on our business, prospects, financial condition and results of operations.

Intellectual property rights do not necessarily address all potential threats.

The degree of future protection afforded by our intellectual property rights is uncertain because intellectual property rights have limitations and may not adequately protect our business or permit us to maintain our competitive advantage. For example:

- others may be able to make products that are the same as or similar to Lumoxiti and our product candidates or utilize similar technology but that are not covered by the claims of the patents that we license or may own in the future;
- we, or our license partners or current or future collaborators, might not have been the first to make the inventions covered by the issued patent or pending patent application that we license or may own in the future;
- we, or our license partners or current or future collaborators, might not have been the first to file patent applications covering certain of our or their inventions;
- others may independently develop similar or alternative technologies or duplicate any of our technologies without infringing our owned or licensed intellectual property rights;
- it is possible that our owned or licensed pending patent applications will not lead to issued patents;
- issued patents that we hold rights to may be held invalid or unenforceable, including as a result of legal challenges by our competitors;
- our competitors might conduct research and development activities in countries where we do not have patent rights and then use the information learned from such activities to develop competitive products for sale in our major commercial markets;
- we may not develop additional proprietary technologies that are patentable;
- the patents of others may harm our business; and
- we may choose not to file a patent in order to maintain certain trade secrets or know-how, and a third-party may subsequently file a patent covering such intellectual property.

Should any of these events occur, they could have a material adverse effect on our business, financial condition, results of operations, and prospects.

Risks Related to Ownership of Our Ordinary Shares and the ADSs

The trading price of our equity securities may be volatile, and purchasers of our ordinary shares or ADSs could incur substantial losses.

It is likely that the price of our ordinary shares and ADSs will be significantly affected by events such as announcements regarding scientific and clinical results concerning product candidates currently being developed by us, our collaboration partners or our main competitors, changes in market conditions related to our sector of activity, announcements of new contracts, technological innovations and collaborations by us or our main competitors, developments concerning intellectual property rights, as well as the development, regulatory approval and commercialization of new products by us or our main competitors and changes in our financial results.

Equity markets are subject to considerable price fluctuations, and often, these movements do not reflect the operational and financial performance of the listed companies concerned. In particular, biotechnology companies' share prices have been highly volatile and may continue to be highly volatile in the future. As we operate in a single industry, we are especially vulnerable to these factors to the extent that they affect our industry. Fluctuations in the stock market as well as the macro-economic environment could significantly affect the price of our ordinary shares. As a result of this volatility, investors may not be able to sell their ordinary shares or ADSs at or above the price originally paid for the security. The market price for our ordinary shares and ADSs may be influenced by many factors, including:

- actual or anticipated fluctuations in our financial condition and operating results;
- actual or anticipated changes in our growth rate relative to our competitors;
- competition from existing products or new products that may emerge;
- announcements by us or our competitors of significant acquisitions, strategic partnerships, joint ventures, collaborations or capital commitments;
- adverse results of delays in our or any of our competitors' preclinical studies or clinical trials;
- adverse regulatory decisions, including failure to receive regulatory approval for any of our product candidates;
- the termination of a strategic alliance or the inability to establish additional strategic alliances;
- failure to meet or exceed financial estimates and projections of the investment community or that we provide to the public;
- issuance of new or updated research or reports by securities analysts;
- fluctuations in the valuation of companies perceived by investors to be comparable to us;
- ordinary share and ADS price and volume fluctuations attributable to inconsistent trading volume levels of our ordinary shares and ADSs;

- price and volume fluctuations in trading of our ordinary shares on Euronext Paris;
- additions or departures of key management or scientific personnel;
- disputes or other developments related to proprietary rights, including patents, litigation matters and our ability to obtain patent and other intellectual property protection for our technologies;
- changes to coverage policies or reimbursement levels by commercial third-party payors and government payors and any announcements relating to coverage policies or reimbursement levels;
- announcement or expectation of additional debt or equity financing efforts;
- sales of our ordinary shares or ADSs by us, our insiders or our other shareholders; and
- general economic and market conditions.

These and other market and industry factors may cause the market price and demand for our ordinary shares and ADSs to fluctuate substantially, regardless of our actual operating performance, which may limit or prevent investors from readily selling their ordinary shares or ADSs and may otherwise negatively affect the liquidity of the trading market for the ordinary shares and ADSs.

If securities or industry analysts do not publish research or publish inaccurate or unfavorable research about our business, the price of the ordinary shares or ADSs and their trading volume could decline.

The trading market for the ADSs and ordinary shares depends in part on the research and reports that securities or industry analysts publish about us or our business. As a public company in France since 2006, our equity securities are currently subject to coverage by a number of analysts. If fewer securities or industry analysts cover our company, the trading price for the ADSs and ordinary shares would be negatively impacted. If one or more of the analysts who covers us downgrades our equity securities or publishes incorrect or unfavorable research about our business, the price of the ordinary shares and ADSs would likely decline. If one or more of these analysts ceases coverage of our company or fails to publish reports on us regularly, or downgrades our securities, demand for the ordinary shares and ADSs could decrease, which could cause the price of the ordinary shares and ADSs or their trading volume to decline.

We do not currently intend to pay dividends on our securities and, consequently, your ability to achieve a return on your investment will depend on appreciation in the price of the ordinary shares and ADSs. In addition, French law (including any temporary measures taken in response to COVID-19 pandemic) may limit the amount of dividends we are able to distribute.

We have never declared or paid any cash dividends on our ordinary shares and do not currently intend to do so for the foreseeable future. We currently intend to invest our future earnings, if any, to fund our growth. Therefore, the holders of our ordinary shares and ADSs are not likely to receive any dividends for the foreseeable future and the success of an investment in our ordinary shares and ADSs depends upon any future appreciation in value. Consequently, investors may need to sell all or part of their holdings of the ordinary shares or ADSs after price appreciation, which may never occur, as the only way to realize any future gains on their investment. There is no guarantee that the ordinary shares or ADSs will appreciate in value or even maintain the price at which our shareholders have purchased them.

Further, under French law, the determination of whether we have been sufficiently profitable to pay dividends is made on the basis of our statutory financial statements prepared and presented in accordance with accounting standards applicable in France. Moreover, pursuant to French law, we must allocate 5% of our unconsolidated net profit for each year to our legal reserve fund before dividends, should we propose to declare any, may be paid for that year, until the amount in the legal reserve is equal to 10% of the aggregate nominal value of our issued and outstanding share capital. In addition, payment of dividends may subject us to additional taxes under French law. Therefore, we may be more restricted in our ability to declare dividends than companies that are not incorporated in France. See "Description of Share Capital—Key Provisions of Our Bylaws and French Law Affecting Our Ordinary Shares" for further details on the limitations on our ability to declare and pay dividends and the taxes that may become payable by us if we elect to pay a dividend.

In addition, exchange rate fluctuations may affect the amount of euro that we are able to distribute, and the amount in U.S. dollars that our shareholders receive upon the payment of cash dividends or other distributions we declare and pay in euro, if any. These factors could harm the value of the ADSs, and, in turn, the U.S. dollar proceeds that holders receive from the sale of the ADSs.

Future sales, or the possibility of future sales, of a substantial number of our ADSs or ordinary shares could adversely affect the market price of our ADSs and ordinary shares.

Future sales of a substantial number of our ADSs or ordinary shares, or the perception that such sales will occur, could cause a decline in the market price of our ADSs and/or ordinary shares. Sales in the United States of our ADSs and ordinary shares held by our directors, officers and affiliated shareholders or ADS holders are subject to restrictions. If these shareholders or ADS holders sell substantial amounts of ordinary shares or ADSs in the public market, or the market perceives that such sales may occur, the market price of our ADSs or ordinary shares and our ability to raise capital through an issue of equity securities in the future could be adversely affected.

The dual listing of our ordinary shares and the ADSs may adversely affect the liquidity and value of the ADSs.

Our ADSs are listed on Nasdaq, and our ordinary shares are admitted to trading on Euronext Paris. Trading of the ADSs or ordinary shares in these markets take place in different currencies (U.S. dollars on Nasdaq and euro on Euronext Paris), and at different times (resulting from different time zones, different trading days and different public holidays in the United States and France). The trading prices of our ordinary shares on these two markets may differ due to these and other factors. Any decrease in the price of our ordinary shares on Euronext Paris could cause a decrease in the trading price of the ADSs on Nasdaq. Investors could seek to sell or buy our ordinary shares to take advantage of any price differences between the markets through a practice referred to as arbitrage. Any arbitrage activity could create unexpected volatility in both our share prices on one exchange, and the ordinary shares available for trading on the other exchange. In addition, holders of ADSs are not immediately able to surrender their ADSs and withdraw the underlying ordinary shares for trading on the other market without effecting necessary procedures with the depositary. This could result in time delays and additional cost for holders of ADSs. We cannot predict the effect of this dual listing on the value of our ordinary shares and the ADSs. However, the dual listing of our ordinary shares and the ADSs may reduce the liquidity of these securities in one or both markets and may adversely affect the development of an active trading market for the ADSs in the United States.

The rights of shareholders in companies subject to French corporate law differ in material respects from the rights of shareholders of corporations incorporated in the United States.

We are a French company with limited liability. Our corporate affairs are governed by our bylaws and by the laws governing companies incorporated in France. The rights of shareholders and the responsibilities of members of our Executive Board and of our Supervisory Board are in many ways different from the rights and obligations of shareholders in companies governed by the laws of U.S. jurisdictions. For example, in the performance of its duties, our Executive Board is required by French law to consider the interests of our company, its shareholders, its employees and other stakeholders, rather than solely our shareholders and/or creditors. It is possible that some of these parties have interests that are different from, or in addition to, your interests as a shareholder or holder of ADSs. See "Item 16G.—Corporate Governance."

U.S. investors may have difficulty enforcing civil liabilities against our company and members of the Executive Board and the Supervisory Board.

Most of the members of our Executive Board and Supervisory Board and the experts named therein are non-residents of the United States, and all or a substantial portion of our assets and the assets of such persons are located outside the United States. As a result, it may not be possible to serve process on such persons or us in the United States or to enforce judgments obtained in U.S. courts against them or us based on civil liability provisions of the securities laws of the United States. Additionally, it may be difficult to assert U.S. securities law claims in actions originally instituted outside of the United States. Foreign courts may refuse to hear a U.S. securities law claim because foreign courts may not be the most appropriate forums in which to bring such a claim. Even if a foreign court agrees to hear a claim, it may determine that the law of the jurisdiction in which the foreign court resides, and not U.S. law, is applicable to the claim. Further, if U.S. law is found to be applicable, the content of applicable U.S. law must be proved as a fact, which can be a time-consuming and costly process, and certain matters of procedure would still be governed by the law of the jurisdiction in which the foreign court resides. In particular, there is some doubt as to whether French courts would recognize and enforce certain civil liabilities under U.S. securities laws in original actions or judgments of U.S. courts based upon these civil liability provisions. In addition, awards of punitive damages in actions brought in the United States or elsewhere may be unenforceable in France. An award for monetary damages under the U.S. securities laws would be considered punitive if it does not seek to compensate the claimant for loss or damage suffered but is intended to punish the defendant. French law provides that a shareholder, or a group of shareholders, may initiate a legal action to seek indemnification from the directors of a corporation in the corporation's interest if it fails to bring such legal action itself. If so, any damages awarded by the court are paid to the corporation and any legal fees relating to such action may be borne by the relevant shareholder or the group of shareholders. The enforceability of any judgment in France will depend on the particular facts of the case as well as the laws and treaties in effect at the time. The United States and France do not currently have a treaty providing for recognition and enforcement of judgments, other than arbitration awards, in civil and commercial matters.

Our bylaws and French corporate law contain provisions that may delay or discourage a takeover attempt.

Provisions contained in our bylaws and French corporate law could make it more difficult for a third-party to acquire us, even if doing so might be beneficial to our shareholders. In addition, provisions of our bylaws impose various procedural and other requirements, which could make it more difficult for shareholders to effect certain corporate actions. These provisions include the following:

- under French law, the owner of 90% of the share capital or voting rights of a public company listed on a regulated market in a Member State of the European Union or in a state party to the EEA Agreement, including from the main French stock exchange, has the right to force out minority shareholders following a tender offer made to all shareholders;
- under French law, a non-resident of France, as well as any French entity controlled by non-residents of France, may have to file a declaration for statistical purposes with the Bank of France (Banque de France) within 20 working days following the date of certain direct foreign investments in us, including any purchase of our ADSs. In particular, such filings are required in connection with investments exceeding €15,000,000 that lead to the acquisition of at least 10% of our share capital or voting rights or cross such 10% threshold;
- under French law, certain investments in a French company relating to certain strategic industries by individuals or entities not residents in a Member State of the EU are subject to prior authorization of the Ministry of Economy;
- a merger (i.e., in a French law context, a share for share exchange following which our company would be dissolved into the acquiring entity and our shareholders would become shareholders of the acquiring entity) of our company into a company incorporated in the European Union would require the approval of our Executive Board, as well as a two-thirds majority of the votes held by the shareholders present, represented by proxy or voting by mail at the relevant meeting;
- a merger of our company into a company incorporated outside of the European Union would require 100% of our shareholders to approve it;
- under French law, a cash merger is treated as a share purchase and would require the consent of each participating shareholder;
- our shareholders may in the future grant our Executive Board broad authorizations to increase our share capital or to issue additional ordinary shares or other securities (for example, warrants) to our shareholders, the public or qualified investors, including as a possible defense following the launching of a tender offer for our ordinary shares;
- our shareholders have preferential subscription rights on a pro rata basis on the issuance by us of any additional securities for cash or a set-off of cash debts, which rights may only be waived by the extraordinary general meeting (by a two-thirds majority vote) of our shareholders or on an individual basis by each shareholder;

- our Supervisory Board appoints the members of the Executive Board and shall fill any vacancy within two months;
- our Supervisory Board has the right to appoint members of the Supervisory Board to fill a vacancy created by the resignation or death of a member of the Supervisory Board for the remaining duration of such member's term of office, and subject to the approval by the shareholders of such appointment at the next shareholders' meeting, which prevents shareholders from having the sole right to fill vacancies on our Supervisory Board;
- our Executive Board can be convened by the chairman of the Executive Board or other members of the Executive Board delegated for this purpose;
- our Supervisory Board can be convened by the chairman or the vice-chairman of the Supervisory Board. A member of the Executive Board or one-third of the members of the Supervisory Board may send a written request to the chairman to convene the Supervisory Board. If the chairman does not convene the Supervisory Board 15 days following the receipt of such request, the authors of the request may themselves convene the Supervisory Board;
- our Supervisory Board meetings can only be regularly held if at least half of its members attend either physically or by way of videoconference or teleconference enabling the members' identification and ensuring their effective participation in the Supervisory Board's decisions;
- approval of at least a majority of the votes held by shareholders present, represented by a proxy, or voting by mail at the relevant ordinary shareholders' general meeting is required to remove members of the Executive Board and/or members of the Supervisory Board with or without cause;
- the crossing of certain ownership thresholds has to be disclosed and can impose certain obligations;
- advance notice is required for nominations to the Supervisory Board or for proposing matters to be acted upon at a shareholders' meeting, except that a vote to remove and replace a member of the Supervisory Board can be proposed at any shareholders' meeting without notice;
- transfers of shares shall comply with applicable insider trading rules and regulations, and in particular with the Market Abuse Regulation 596/2014 of April 16, 2014; and
- pursuant to French law, our bylaws, including the sections relating to the number of members of the Executive and Supervisory Boards, and election and removal of members of the Executive and Supervisory Boards from office may only be modified by a resolution adopted by two-thirds of the votes of our shareholders present, represented by a proxy or voting by mail at the meeting.

Purchasers of ADSs in the U.S. offering are not directly holding our ordinary shares.

A holder of ADSs is not treated as one of our shareholders and does not have direct shareholder rights. French law governs our shareholder rights. The depositary, through the custodian or the custodian's nominee, is the holder of the ordinary shares underlying ADSs held by purchasers of ADSs in the U.S. offering. Purchasers of ADSs in the U.S. offering have ADS holder rights. The deposit agreement among us, the depositary and purchasers of ADSs in the U.S. offering, as an ADS holder, and all other persons directly and indirectly holding ADSs, sets out ADS holder rights, as well as the rights and obligations of us and the depositary.

Your right as a holder of ADSs to participate in any future preferential subscription rights offering or to elect to receive dividends in shares may be limited, which may cause dilution to your holdings.

According to French law, if we issue additional securities for cash, current shareholders will have preferential subscription rights for these securities on a pro rata basis unless they waive those rights at an extraordinary meeting of our shareholders (by a two-thirds majority vote) or individually by each shareholder. However, our ADS holders in the United States will not be entitled to exercise or sell such rights unless we register the rights and the securities to which the rights relate under the Securities Act or an exemption from the registration requirements is available. In addition, the deposit agreement provides that the depositary will not make rights available to you unless the distribution to ADS holders of both the rights and any related securities are either registered under the Securities Act or exempted from registration under the Securities Act. Further, if we offer holders of our ordinary shares the option to receive dividends in either cash or shares, under the deposit agreement the depositary may require satisfactory assurances from us that extending the offer to holders of ADSs does not require registration of any securities under the Securities Act before making the option available to holders of ADSs. We are under no obligation to file a registration statement with respect to any such rights or securities or to endeavor to cause such a registration statement to be declared effective. Moreover, we may not be able to establish an exemption from registration under the Securities Act. Accordingly, ADS holders may be unable to participate in our rights offerings or to elect to receive dividends in shares and may experience dilution in their holdings. In addition, if the depositary is unable to sell rights that are not exercised or not distributed or if the sale is not lawful or reasonably practicable, it will allow the rights to lapse, in which case you will receive no value for these rights.

You may not be able to exercise your right to vote the ordinary shares underlying your ADSs.

Holders of ADSs may exercise voting rights with respect to the ordinary shares represented by the ADSs only in accordance with the provisions of the deposit agreement. The deposit agreement provides that, upon receipt of notice of any meeting of holders of our ordinary shares, the depositary will fix a record date for the determination of ADS holders who shall be entitled to give instructions for the exercise of voting rights. Upon timely receipt of notice from us, if we so request, the depositary shall distribute to the holders as of the record date (i) the notice of the meeting or solicitation of consent or proxy sent by us and (ii) a statement as to the manner in which instructions may be given by the holders.

You may instruct the depositary of your ADSs to vote the ordinary shares underlying your ADSs. Otherwise, you will not be able to exercise your right to vote, unless you withdraw the ordinary shares underlying the ADSs you hold. However, you may not know about the meeting far enough in advance to withdraw those ordinary shares. If we ask for your instructions, the depositary, upon timely notice from us, will notify you of the upcoming vote and arrange to deliver our voting materials to you. We cannot guarantee you that you will receive the voting materials in time to ensure that you can instruct the depositary to vote your ordinary shares or to withdraw your ordinary shares so that you can vote them yourself. If the depositary does not receive timely voting instructions from you, it may give a proxy to a person designated by us to vote the ordinary shares underlying your ADSs. In addition, the depositary and its agents are not responsible for failing to carry out voting instructions or for the manner of carrying out voting instructions. This means that you may not be able to exercise your right to vote, and there may be nothing you can do if the ordinary shares underlying your ADSs are not voted as you requested.

You may be subject to limitations on the transfer of your ADSs and the withdrawal of the underlying ordinary shares.

Your ADSs are transferable on the books of the depositary. However, the depositary may close its books at any time or from time to time when it deems expedient in connection with the performance of its duties. The depositary may refuse to deliver, transfer or register transfers of your ADSs generally when our books or the books of the depositary are closed, or at any time if we or the depositary think it is advisable to do so because of any requirement of law, government or governmental body, or under any provision of the deposit agreement, or for any other reason subject to your right to cancel your ADSs and withdraw the underlying ordinary shares. Temporary delays in the cancellation of your ADSs and withdrawal of the underlying ordinary shares may arise because the depositary has closed its transfer books or we have closed our transfer books, the transfer of ordinary shares is blocked to permit voting at a shareholders' meeting or we are paying a dividend on our ordinary shares. In addition, you may not be able to cancel your ADSs and withdraw the underlying ordinary shares when you owe money for fees, taxes and similar charges and when it is necessary to prohibit withdrawals in order to comply with any laws or governmental regulations that apply to ADSs or to the withdrawal of ordinary shares or other deposited securities.

As a foreign private issuer, we are exempt from a number of rules under the U.S. securities laws and are permitted to file less information with the SEC than a U.S. company.

We are a foreign private issuer, as defined in the SEC's rules and regulations and, consequently, we are not subject to all of the disclosure requirements applicable to public companies organized within the United States. For example, we are exempt from certain rules under the Exchange Act that regulate disclosure obligations and procedural requirements related to the solicitation of proxies, consents or authorizations applicable to a security registered under the Exchange Act, including the U.S. proxy rules under Section 14 of the Exchange Act. In addition, our Executive Board and Supervisory Board members are exempt from the reporting and "short-swing" profit recovery provisions of Section 16 of the Exchange Act and related rules with respect to their purchases and sales of our securities. Moreover, while we currently make annual and semi-annual filings with respect to our listing on Euronext Paris and file financial reports on an annual and semi-annual basis, we are not required to file periodic reports and financial statements with the SEC as frequently or as promptly as U.S. public companies and are not required to file quarterly reports on Form 10-Q or current reports on Form 8-K under the Exchange Act. In addition, foreign private issuers are not required to file their annual report on Form 20-F until four months after the end of each fiscal year. Accordingly, there is and will be less publicly available information concerning our company than there would be if we were not a foreign private issuer.

As a foreign private issuer, we are permitted to adopt certain home country practices in relation to corporate governance matters that differ significantly from Nasdaq corporate governance listing standards and these practices may afford less protection to shareholders than they would enjoy if we complied fully with Nasdaq corporate governance listing standards.

As a foreign private issuer listed on Nasdaq, we are subject to their corporate governance listing standards. However, Nasdaq rules permit foreign private issuers to follow the corporate governance practices of their home country. Some corporate governance practices in France may differ significantly from Nasdaq corporate governance listing standards. For example, neither the corporate laws of France nor our bylaws require a majority of our Supervisory Board members to be independent and although the corporate governance code to which we currently refer (the AFEP/MEDEF code) recommends that, in a widely-held company like ours, a majority of the Supervisory Board members be independent (as construed under such code), this code only applies on a "comply-or-explain" basis and we may in the future either decide not to apply this recommendation or change the corporate code to which we refer. Furthermore, we include non-independent members of the Supervisory Board as members of our compensation and nomination committee, and our independent Supervisory Board members do not necessarily hold regularly scheduled meetings at which only independent members of the Supervisory Board are present. Currently, we intend to follow home country practice to the maximum extent possible. Therefore, our shareholders may be afforded less protection than they otherwise would have under corporate governance listing standards applicable to U.S. domestic issuers. For an overview of our corporate governance practices, see "Item 16G.—Corporate Governance."

We are an "emerging growth company" under the JOBS Act and are be able to avail ourselves of reduced disclosure requirements applicable to emerging growth companies, which can make our ordinary shares ADSs less attractive to investors.

We are an "emerging growth company," as defined in the JOBS Act, and we intend to take advantage of certain exemptions from various reporting requirements that are applicable to other public companies that are not "emerging growth companies," including not being required to comply with the auditor attestation requirements of Section 404(b) of the Sarbanes-Oxley Act, and exemptions from the requirements of holding a nonbinding advisory vote on executive compensation and shareholder approval of any golden parachute payments not previously approved. In addition, Section 107 of the JOBS Act also provides that an emerging growth company can take advantage of the extended transition period provided in Section 7(a)(2)(B) of the Securities Act, for complying with new or revised accounting standards. We will not take advantage of the extended transition period provided under Section 7(a)(2)(B) of the Securities Act for complying with new or revised accounting standards.

We cannot predict if investors will find the ordinary shares or ADSs less attractive because we may rely on these exemptions. If some investors find the ordinary shares or ADSs less attractive as a result, there may be a less active trading market for the ordinary shares or ADSs and the price of the ordinary shares or ADSs may be more volatile. We may take advantage of these exemptions until such time that we are no longer an emerging growth company. We would cease to be an emerging growth company upon the earliest to occur of (1) the last day of the fiscal year in which we have more than $1.07 billion in annual revenue; (2) the date we qualify as a "large accelerated filer" with at least $700 million of equity securities held by non-affiliates; (3) the issuance, in any three year period, by our company of more than $1.0 billion in non-convertible debt securities held by non-affiliates; and (4) the last day of the fiscal year ending after the fifth anniversary of our initial public offering of the ADSs.

We may lose our foreign private issuer status in the future, which could result in significant additional cost and expense.

While we currently qualify as a foreign private issuer, the determination of foreign private issuer status is made annually on the last business day of an issuer's most recently completed second fiscal quarter and, accordingly, our next determination will be made on June 30, 2020. In the future, we would lose our foreign private issuer status if we to fail to meet the requirements necessary to maintain our foreign private issuer status as of the relevant determination date. For example, if more than 50% of our securities are held by U.S. residents and more than 50% of the members of our Executive Board or Supervisory Board are residents or citizens of the United States, we could lose our foreign private issuer status.

The regulatory and compliance costs to us under U.S. securities laws as a U.S. domestic issuer may be significantly more than costs we incur as a foreign private issuer. If we are not a foreign private issuer, we will be required to file periodic reports and registration statements on U.S. domestic issuer forms with the SEC, which are more detailed and extensive in certain respects than the forms available to a foreign private issuer. We would be required under current SEC rules to prepare our financial statements in accordance with U.S. generally accepted accounting principles, or U.S. GAAP, rather than IFRS, and modify certain of our policies to comply with corporate governance practices required of U.S. domestic issuers. Such conversion of our financial statements to U.S. GAAP would involve significant time and cost. In addition, we may lose our ability to rely upon exemptions from certain corporate governance requirements on U.S. stock exchanges that are available to foreign private issuers such as the ones described above and exemptions from procedural requirements related to the solicitation of proxies.

If we are a passive foreign investment company, there could be adverse U.S. federal income tax consequences to U.S. holders.

Based on our analysis of our income, assets, activities and market capitalization for our taxable year ended December 31, 2018, we believe that we were not a passive foreign investment company, or PFIC, for the taxable year ended December 31, 2019. However, there can be no assurance that we will not be a PFIC in the current year or for any future taxable year. Under the Code, a non-U.S. company will be a PFIC for any taxable year in which (1) 75% or more of its gross income consists of passive income or (2) 50% or more of the average quarterly value of its assets consists of assets that produce, or are held for the production of, passive income. For purposes of these tests, passive income includes dividends, interest, gains from the sale or exchange of investment property and certain rents and royalties. In addition, for purposes of the above calculations, a non-U.S. corporation that directly or indirectly owns at least 25% by value of the shares of another corporation is treated as if it held its proportionate share of the assets and received directly its proportionate share of the income of such other corporation. If we are a PFIC for any taxable year during which a U.S. holder (as defined below under "Item 10E.—Taxation – Material U.S. Federal Income Tax") holds our ordinary shares or ADSs, we will continue to be treated as a PFIC with respect to such U.S. holder in all succeeding years during which the U.S. holder owns the ordinary shares or ADSs, regardless of whether we continue to meet the PFIC test described above, unless the U.S. holder makes a specified election once we cease to be a PFIC. If we are a PFIC for any taxable year during which a U.S. holder holds our ordinary shares or ADSs, the U.S. holder may be subject to adverse tax consequences regardless of whether we continue to qualify as a PFIC, including ineligibility for any preferred tax rates on capital gains or on actual or deemed dividends, interest charges on certain taxes treated as deferred, and additional reporting requirements. For further discussion of the PFIC rules and the adverse U.S. income tax consequences in the event we are classified as a PFIC, see the section of this Annual Report titled "Item 10E.—Taxation– Material U.S. Federal Income Tax Considerations."

If a United States person is treated as owning at least 10% of our ordinary shares, such holder may be subject to adverse U.S. federal income tax consequences.

If a U.S. holder is treated as owning, directly, indirectly or constructively, at least 10% of the value or voting power of our ordinary shares or ADSs, such U.S. holder may be treated as a "United States shareholder" with respect to each "controlled foreign corporation" in our group, if any. Our group currently includes one U.S. subsidiary and, therefore, under current law our current non-U.S. subsidiary and any future newly formed or acquired non-U.S. subsidiaries will be treated as controlled foreign corporations, regardless of whether we are treated as a controlled foreign corporation. A United States shareholder of a controlled foreign corporation may be required to annually report and include in its U.S. taxable income its pro rata share of "Subpart F income," "global intangible low-taxed income" and investments in U.S. property by controlled foreign corporations, regardless of whether we make any distributions. An individual that is a United States shareholder with respect to a controlled foreign corporation generally would not be allowed certain tax deductions or foreign tax credits that would be allowed to a United States shareholder that is a U.S. corporation. Failure to comply with controlled foreign corporation reporting obligations may subject a United States shareholder to significant monetary penalties. We cannot provide any assurances that we will furnish to any United States shareholder information that may be necessary to comply with the reporting and tax paying obligations applicable under the controlled foreign corporation rules of the Code. U.S. holders should consult their tax advisors regarding the potential application of these rules to their investment in our ordinary shares or ADSs.

Item 4. Information on the Company.

A. History and Development of the Company.

Our legal name and commercial name is Innate Pharma S.A. We were incorporated under the laws of France on September 23, 1999 as a *société par actions simplifiée* and converted into a *société anonyme*, or S.A., on June 13, 2005. Our headquarters are located at 117, Avenue de Luminy, 13009 Marseille, France. In 2008, we incorporated our wholly-owned U.S. subsidiary, Innate Pharma Inc. In 2019, we incorporated our wholly-owned French subsidiary, Innate Pharma France S.A.S (registered under number SIREN 844 853 119).

We are registered at the Marseille Business and Company Registry (*Registre du commerce et des sociétés*) under the number SIREN 424 365 336 RCS Marseille. Our telephone number at our principal executive offices is +33 4 30 30 30 30. Our agent for service of process in the United States is Corporation Service Company located at 251 Little Falls Drive,
Wilmington, Delaware 19808, United States. Our website address is www.innate-pharma.com. The reference to our website is an inactive textual reference only and information contained in, or that can be accessed through, our website is not part of this Annual Report. The U.S. Securities and Exchange Commission maintains a website (www.sec.gov) that contains reports, proxy and information statements and other information regarding registrants, such as Innate, that file electronically with the SEC.

B. Business Overview.

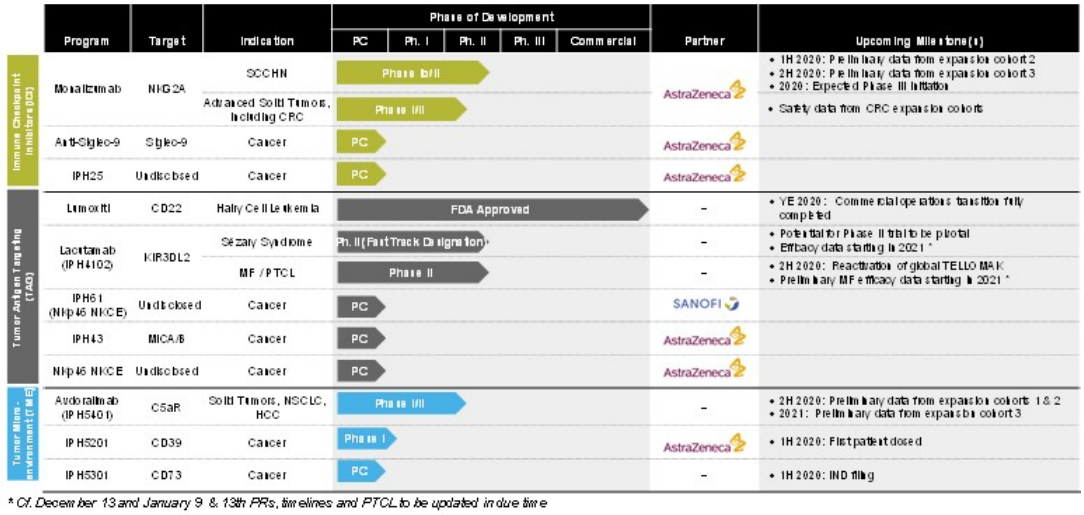
We are a biotechnology company focused on discovering, developing and commercializing first-in-class therapeutic antibodies designed to harness the immune system for the treatment of oncology indications with significant unmet medical need. We have extensive experience in research and development in immuno-oncology, having been pioneers in the understanding of natural killer cell, or NK cell, biology, and later expanding our expertise in the tumor microenvironment, tumor antigens and antibody engineering fields. We have built, internally and through our business development strategy, a broad and diversified portfolio including an approved product, four clinical product candidates and a robust preclinical pipeline. We have entered into collaborations with leaders in the biopharmaceutical industry, such as AstraZeneca and Sanofi, to leverage their development capabilities and expertise for some of our candidates, and we have received upfront and milestone payments and equity investments from our collaborations of an aggregate of approximately $565 million over the last ten years. We believe our product candidates and clinical development approach are differentiated from current immuno-oncology therapies and have the potential to significantly improve the clinical outcome for patients with cancer.

The immune system is the body's natural defense against invading organisms and pathogens and is comprised of two arms: the innate immune system and adaptive immune system. Recent immunotherapy developments have focused on generating a tumor antigen-specific T cell response and have led to an unprecedented change in the treatment paradigm of many solid tumor cancers. Despite these successes, the breadth and durability of the clinical benefit achieved has been limited to a subset of patients and tumor types. Our innovative approach to immuno-oncology aims to broaden and amplify anti-tumoral immune responses by leveraging both the adaptive and the innate immune systems.

The innate immune system is comprised of a variety of cells, including NK cells, which are involved in anti-cancer immunosurveillance through a variety of modalities. Activation of the innate immune system also helps trigger the adaptive immune system to elicit a response directed against specific antigens and can provide durable immune memory. Our scientific expertise, strategic collaborations and discovery engine are focused on harnessing the potential of the innate immune system across three pillars.



We are developing a pipeline of innovative immunotherapies that we believe have the potential to provide a significant clinical benefit to cancer patients. The following table summarizes our commercial, clinical and preclinical pipeline.



Cf. December 13 and January 9 & 13th PRs, timelines and PTCL to be updated in due time

"SCCHN" denotes Squamous Cell Carcinoma of the Head and Neck; "CRC" denotes Colorectal Cancer; "MF" denotes Mycosis Fungoides; "PTCL" denotes Peripheral T-cell Lymphomas; "NSCLC" denotes Non-Small Cell Lung Cancer; and "HCC" denotes Hepatocellular Carcinoma.

In addition to these product candidates, we have an active development pipeline with programs in the discovery and preclinical stages.

- **Broad spectrum immune checkpoint inhibitors**. We are targeting checkpoints expressed on NK cells and myeloid cells, rather than focusing solely on T cells, in order to increase the pool of anti-tumor effector cells and potentially mount a larger anti-tumor response. Our most advanced checkpoint inhibitor product candidate, monalizumab, is a dual checkpoint inhibitor designed to activate both tumor-infiltrating NK cells and CD8+ T cells, potentially resulting in increased effector functions and greater killing of tumor cells by the immune system. By activating NK cells, which are potent producers of cytokines, monalizumab may also favor dendritic cell maturation, which may in turn increase the generation of a T cell response against the tumor. We believe monalizumab has the potential to be a first-in-class treatment for various cancer indications, which we define as the ability to target a receptor that has not previously been targeted to treat cancer indications, given that no approved products or, to our knowledge, product candidates in clinical development by third parties target the NKG2A receptor.

We and AstraZeneca AB, or AstraZeneca, are currently evaluating monalizumab in an open-label Phase Ib/II clinical trial in combination with cetuximab, an epidermal growth factor receptor, or EGFR, inhibitor in patients with relapsed or metastatic squamous cell carcinoma of the head and neck, or R/M SCCHN. In addition to unleashing tumor-infiltrating NK and CD8+ T cells, the combination of cetuximab and monalizumab may activate NK cells through the recognition of cetuximab-coated tumor cells via the CD16 activating receptor. In 2018, we presented data from a first expansion cohort from this trial, including efficacy data and have since then expanded to two additional expansion cohorts. The second expansion cohort is evaluating the combination of monalizumab and cetuximab in patients previously treated with both chemotherapy and checkpoint inhibitors and the third expansion cohort is evaluating the combination of monalizumab, cetuximab and an anti-PD-L1 checkpoint inhibitor in IO-naïve patients.

Additional one-year survival data from the first expansion cohort was presented at the European Society for Medical Oncology, or ESMO, 2019 annual meeting, and we expect to present preliminary efficacy data from the second expansion cohort in the first half of 2020 and from the third expansion cohort in the second half of 2020. In September 2019, we announced that AstraZeneca will advance monalizumab into a Phase III randomized clinical trial evaluating monalizumab in combination with cetuximab in patients suffering from recurrent or metastatic SCCHN, and that we and AstraZeneca will co-fund the trial.

AstraZeneca is also evaluating monalizumab in a Phase I/II clinical trial in combination with durvalumab, an anti-PD-L1 immune checkpoint inhibitor, in patients with advanced solid tumors, including colorectal cancer, or CRC.

We are also exploring the possibility of developing an antibody designed to reduce the effects of Siglec-9 receptors, expressed on NK cells and myeloid cells, for the treatment of cancer.

- **Tumor antigen targeting**. We are developing antibodies that target tumor antigens in the form of (i) antibody-drug conjugates, or ADCs, (ii) antibody-dependent cellular cytotoxicity, or ADCCs, inducing antibodies and (iii) antibody-based multi-specific NK cell engagers, or NKCEs.

- **ADCs**. One approach is to directly kill tumor cells using either an ADC, such as with our IPH43 program, or an immunotoxin, such as with our commercial-stage product Lumoxiti. Lumoxiti is a marketed, first-in-class CD22-directed immunotoxin, which was approved by the FDA under priority review in September 2018 for the treatment of adult patients with relapsed or refractory, or R/R, hairy cell leukemia, or HCL, who have received at least two prior systemic therapies, including treatment with a purine nucleoside analog, or PNA. Lumoxiti is the first FDA-approved treatment for HCL in over 20 years. IPH43 is as an ADC targeting MICA/B that we are developing for the treatment of oncology indications.

- **ADCCs**. Another approach is to develop antibodies that activate cells of the innate immune system, such as NK cells, in order to induce ADCC. Our most advanced product candidate utilizing this approach is lacutamab (IPH4102), an antibody targeting KIR3DL2, a receptor not expressed on healthy tissues except on a subset of NK cells and T cells. We believe that lacutamab has the potential to be a first-in-class treatment for various cancer indications, given that no approved products or, to our knowledge, product candidates in clinical development by third parties target KIR3DL2. We are developing lacutamab for the treatment of various forms of T cell lymphomas, or TCL, including cutaneous T cell lymphoma, or CTCL, and peripheral T cell lymphoma, or PTCL. Mycosis fungoides, or MF, is the most common form of CTCL, and Sézary syndrome is an aggressive form of CTCL. In January 2019, the FDA granted lacutamab Fast Track designation for the treatment of adults with R/R, Sézary syndrome who have received at least two prior systemic therapies. Lacutamab has also been granted orphan drug designation in the European Union and in the United States for the treatment of CTCL. In May 2019, we initiated a Phase II clinical trial evaluating lacutamab in different subtypes of TCL. We expect first preliminary efficacy data for Sézary and MF cohorts starting in 2021.

- **Antibody-based multi-specific NKCEs**. We are also developing a pipeline of multi-specific NKCEs that engage an activating checkpoint, NKp46, on NK cells, in order to direct NK cells to the tumor. We believe this innovative approach may allow for immuno-oncology treatments with a more favorable safety profile than T cell engagers.

- **Suppressive factors of the TME**. We are developing product candidates that target suppressive pathways of the TME in order to relieve the immunosuppression of the innate and adaptive immune responses. We are developing avdoralimab, an anti-C5aR antibody that disrupts the complement pathway. In January 2018, we entered into a non-exclusive clinical trial collaboration with AstraZeneca for avdoralimab. As part of this collaboration, we are conducting a Phase I/II clinical trial to evaluate the safety and efficacy of avdoralimab in combination with durvalumab as a treatment for patients with solid tumors, including NSCLC and HCC. We reported preliminary data from this dose-escalation clinical trial in the second half of 2019. In addition, we are developing product candidates that disrupt the adenosine pathway, including IPH5201, an anti-CD39 antibody, and IPH5301, an anti-CD73 antibody. In October 2018, we entered into a collaboration and option agreement for IPH5201 with AstraZeneca. In March 2020, the first patient was dosed in the Phase I clinical trial evaluating IPH5201 in monotherapy and in combination with durvalumab (anti-PD-L1) and with or without oleclumab (anti-CD-73 monoclonal antibody). We expect to file an IND for IPH5301 in the first half of 2020.

Our collaborations allow us to leverage the expertise and resources of large pharmaceutical companies and research institutions with the goal of accelerating the development of several of our product candidates while providing financing to expand the development of our proprietary product candidates. Over the last ten years we have received an aggregate of approximately $565 million in upfront and milestone payments and equity investments from our collaborations. Under our existing collaboration agreements and any license agreements that become effective upon the exercise by our collaborators of options to license future product candidates, we may be eligible to receive an aggregate of approximately $5.5 billion in future contingent payments, which includes $100 million we expect to receive upon dosing of the first patient in the first Phase III clinical trial for monalizumab. AstraZeneca is expected to commence a Phase III clinical trial of monalizumab in combination with cetuximab in 2020. With respect to the programs for which we have an existing collaboration or similar agreement, future contingent payments are dependent upon our achievement of specified development and sales milestones. With respect to the programs for which our collaborators have been granted an option, future contingent payments are dependent upon our collaborators exercising such options, which would result in up-front option exercise fees, and upon our achievement of specified development and sales milestones in those particular programs. The aggregate $5.5 billion in future contingent payments assumes that our collaborators exercise all of the options we have granted to them and that we achieve all related development, clinical, regulatory and sales milestones. In April 2015, we entered into a collaboration with AstraZeneca relating to monalizumab, and in October 2018, AstraZeneca expanded this collaboration to gain full oncology rights for monalizumab and options to acquire development rights to IPH5201 and four of our other preclinical programs. Concurrently, we acquired U.S. and EU commercial rights to Lumoxiti, and AstraZeneca acquired a 9.8% equity stake in our company. We have also entered into a collaboration agreement with Sanofi Aventis Recherche & Développement, or Sanofi, which includes two programs based on our multi-specific, NKCE technology.

Our Strategy

Our goal is to harness the immune system for the treatment of conditions with serious unmet medical needs in oncology. By leveraging our extensive experience in immuno-oncology research and development, we strive to continue to internally discover, externally identify and develop a broad and diversified portfolio of first and best-in class immunotherapies across various therapeutic modalities. The key elements of our strategy include:

- **Deliver our clinical programs and improve patient outcomes in indications with high unmet medical need by building on our scientific discoveries.**
    - Complete our ongoing clinical trial of monalizumab for the treatment of SCCHN, which, together with the data from the CRC clinical trial, will inform further development and the potential path to market.
    - Execute the clinical development of our wholly owned product candidate, lacutamab, for the treatment of patients with Sézary syndrome, MF and PTCL.
    - Progress the clinical development of our wholly owned product candidate, avdoralimab, for the treatment of patients with cancer and explore its potential to treat inflammation.
    - Advance our pipeline of other proprietary product candidates, including IPH5301.
- **Build a commercial stage oncology-focused biotechnology company.**

- Build a commercial infrastructure for Lumoxiti in the United States and, if approved, in the European Union.
- Leverage our commercial infrastructure for future approved products in order to build a hemato-oncology focused commercial franchise.
- Retain optionality to co-promote product candidates in strategic regions for select partnered assets.

- **Continue to invest in our proprietary and partnered portfolio by leveraging our strong financial position and revenue from our existing collaborations.**
  - Maximize the value of our partnered product candidates under existing collaborations and any license agreements that become effective upon the exercise by our collaborators of options to license future product candidates, under which we may be eligible to receive up to an aggregate of approximately $5.5 billion in future contingent payments, including up-front option exercise fees and payments upon the achievement of specified development and sales milestones.
  - Continue to explore opportunities to accelerate the development of our proprietary pipeline programs through additional collaborations.
  - Combine our disciplined business development strategy with our immuno-oncology research and development capabilities to further expand our product portfolio.
  - Expand our pipeline of proprietary product candidates that target novel pathways in immuno-oncology using our internal development engine.

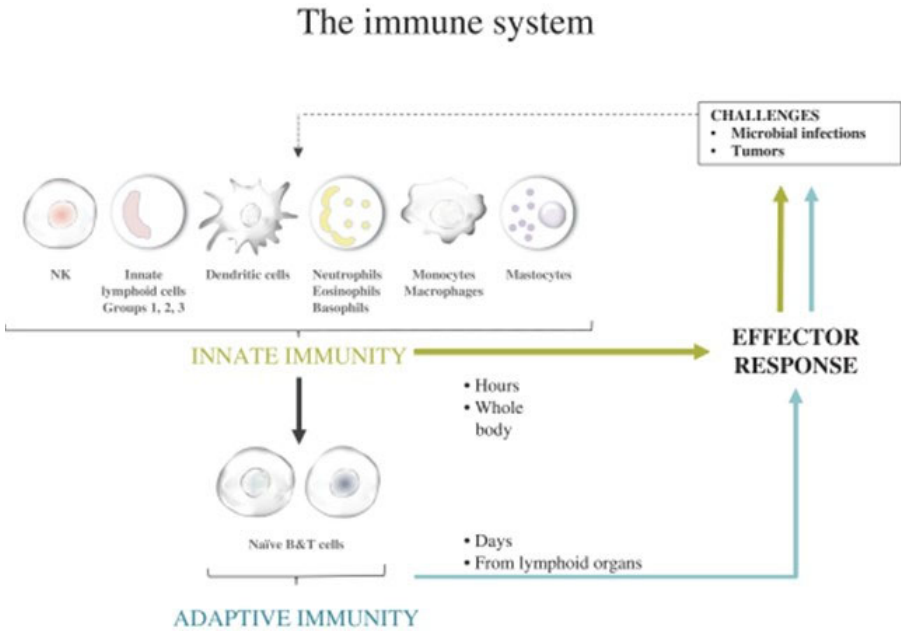
Activating Innate Immunity: Harnessing the Power of Immunotherapy to Treat Cancer

The Innate Immune System: Gatekeeper of the Adaptive Immune System

The immune system is the body's defense against invading organisms and pathogens and is comprised of two arms: the innate immune system and adaptive immune system.

The innate immune system represents the first barrier of immune defense because it reacts almost immediately against threats and serves as a catalyst to mobilize other components of the immune system. The innate immune system functions to identify, attack and kill pathogens or cancer cells, produce cytokines and activate the complement cascade and the adaptive immune system through antigen presentation. These functions involve a variety of cells, including NK cells, dendritic cells, monocytes, macrophages and neutrophils. These cells then launch adaptive immune responses while also mounting their own effector responses. Throughout the body, cells of the innate immune system play a critical role in the immunosurveillance and detection of the formation of cancer cells.

Once activated, the adaptive immune system responds with large numbers of effector cells directed against specific antigens and can provide durable immune memory. An adaptive immune response is highly specific to particular antigens expressed by pathogens or cancer cells, but it requires time to develop in a process known as priming. Key components of the adaptive immune system include antibodies, which are produced by B cells and that bind to antigens and mark them for destruction by other immune cells, and T cells, which recognize antigens on diseased cells and then attack and eliminate them. The adaptive immune response is targeted and potent and has the potential to provide a long-lasting immune memory.



The graphic above shows the interaction of the cells in the innate immune system and adaptive immune system in the presence of microbial infections and tumors. The various cells in the innate immune system rapidly launch their own effector response to fight the infection or tumor while also activating the B cells and T cells in the adaptive immune system. Once activated, the adaptive immune system launches a slower but more targeted effector response against the infection or tumor.

Key Elements to Modulating the Activity of Immune Cells to Treat Cancer

Cells implicated in innate and adaptive immunity can have different impacts on the treatment of cancer. While cytotoxic CD8+ T cells and NK cells help eliminate tumors, subsets of T cells, such as regulatory T cells, and subsets of myeloid cells, such as myeloid-derived suppressor cells (MDSCs), can be harmful to the host by contributing to an immunosuppressive environment and promoting tumor growth.

Immune cell activity is controlled by many activating and inhibitory factors, including activating receptors and inhibitory receptors, called checkpoints, which are expressed at the surface of these cells. PD-1, LAG-3, TIGIT and NKG2A are examples of inhibitory checkpoints while OX-40, CD137, NKG2D and NKp46 are examples of activating checkpoints. When engaged, the inhibitory checkpoints can impair anti-tumor immunity of adaptive and innate immune cells such as CD8+ T cells or NK cells, thereby contributing to tumor escape from immune control. Inhibitory checkpoints are potential therapeutic targets for restoring anti-cancer immunosurveillance.

The Role of the Innate Immune System as a Modality for Cancer Therapies with Significant Potential

Cancer has historically been treated with surgery, radiation therapy, chemotherapy, targeted therapy, hormone therapy or a combination of these treatments that are directed at the tumor itself. More recently, advances in the understanding of the immune system's role in cancer have led to immunotherapy becoming an important therapeutic modality, shifting the therapeutic target from the tumor to the host and focusing on the immune system and the TME in order to reactivate its immunosurveillance against cancer.

Cancer immunotherapy began with treatments that nonspecifically activated the immune system, such as IL-2 and IFNα cytokines therapies, which had limited efficacy, significant toxicity or both. More recent immunotherapy developments have instead focused on the generation of a tumor antigen-specific T cell response, in particular by modulating the activity of inhibitory receptors expressed by T cells. This modulation can limit T cells expansion, such as with anti-CTLA-4 therapy, or limit their effector properties, such as with anti-PD-1 or anti-PD-L1 therapies. The therapeutic targeting of inhibitory receptors controlling T cell function has led to an unprecedented change in the treatment paradigm of many cancers in solid tumors, such as melanoma, non-small cell lung cancer and renal cell carcinoma, and in hematopoietic malignancies, such as Hodgkin lymphoma. Despite these successes, the breadth and durability of clinical benefit achieved has been limited to a subset of patients and tumor types.

The onset, maintenance and development of long-lasting, protective T cell responses are dependent on innate immune cells and NK cells in particular.

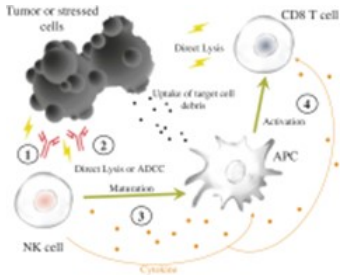
Harnessing Innate Immunity in Cancer: NK Cells as a Key Player in the Anti-Tumor Immune Response

NK cells are part of the innate immune system and represent a significant fraction of the total number of cytotoxic cells in the body. They are active in many hematological and solid tumors and play a key role in the initiation of the T cell response.

Checkpoints expressed on NK cells include inhibitory cell surface receptors, such as NKG2A, and activating NK cell receptors, such as NKp46. NKp46 is the most specific NK cell marker identified to date across organs and species. Other receptors, such as NKG2A, are more prevalent in certain subsets of NK cells, including NK cells infiltrating the tumor, and are also present on tumor infiltrating CD8+ T cells.

NK cells are involved in the anti-cancer immunosurveillance through a variety of direct and indirect effects. The figure below provides an illustration of anti-cancer functions of NK cells.

①	NK cells are able to directly and selectively kill cells undergoing stress caused by a cancerous transformation or pathogen infection, a process called natural cytotoxicity.
②	NK cells can also kill target cells when they are coated by antibodies in a process called antibody-dependent cellular cytotoxicity (ADCC).
③ ④	NK cells are also potent producers of cytokines, which are soluble molecules that recruit and activate an adaptive immune response by T cells through dendritic or other antigen-presenting cells, which in turn may enable the generation of immune memory against tumor cells.



By providing the initial catalyst for the multilayered immune response, the activation of the innate immune system through the targeting of NK cells could potentially result in an enhanced anti-tumoral T cell response.

The Tumor and its Host: The Immune System and the Tumor Microenvironment

In recent years, the pursuit of understanding the resistance to immune checkpoint inhibitors has led to an increased focus on the TME, which plays an important role in the inhibition of both the innate and adaptive immune system. The TME contains a complex interplay of immunosuppressive biological pathways, cells and other components surrounding the tumor that often act together to profoundly suppress the body's anticancer immune response, thereby allowing tumors to evade the immune system. More specifically, the TME can inhibit immune responses through the following means:

- controlling oxygen availability to cells, resulting in hypoxia;
- producing or degrading key metabolites regulating cell survival or activation, such as PGE2, adenosine, tryptophan and L-Arginine;
- producing immunosuppressive cytokines, such as TGF-ß; and
- recruiting suppressive cells such as MDSCs and regulatory T cells.

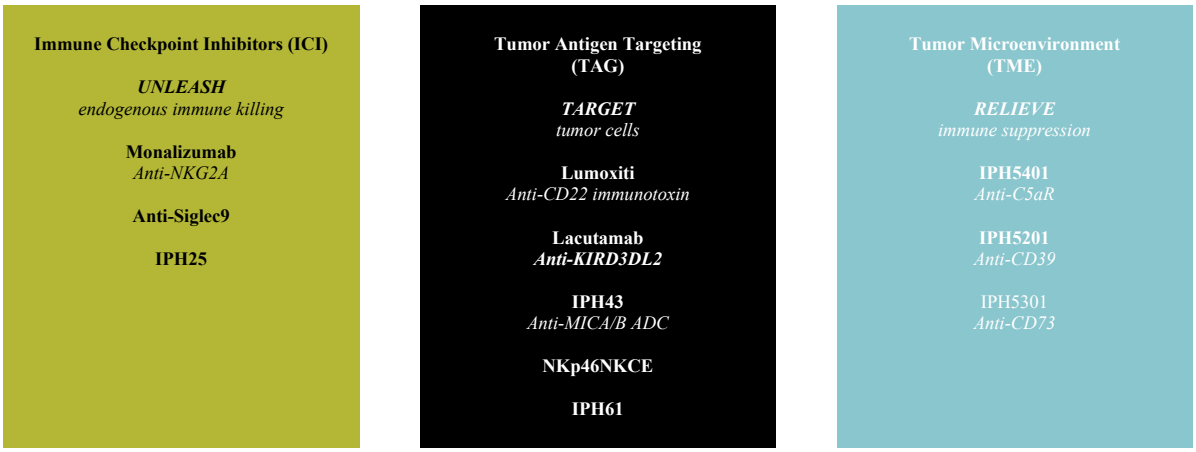
Our preclinical data has shown that targeting the TME and neutralizing its immunosuppressive, cancer-promoting effects could play a key role in the fight against cancer in combination with other immunotherapies.

Our Differentiated Approach: Three Pillars to Harness the Potential of the Innate Immune System

Anti-tumor immune response results from complex interactions between many different cells, including innate immune cells, adaptive immune cells and cancer cells. While T cells, particularly CD8+ T cells, are critical to many protective anti-tumor immune responses, they do not act autonomously and require the activation of innate immune cells to achieve full potential. More specifically, T cells expand upon the presentation of antigens by activated dendritic cells, a process that can be enhanced by the activation of NK cells through the production of development factors, chemokines or cytokines. In addition, innate immune cells can also have anti-tumor activity independent of their impact on T cells and other adaptive immune cells, including for example, the cytotoxic activity of NK cells.

Our scientific expertise, strategic collaborations and discovery engine allow us to harness the potential of the innate immune system across three pillars:

- **Broad spectrum immune checkpoint inhibitors**. We are targeting checkpoints expressed on several immune system cell types including NK cells and myeloid cells, rather than focusing solely on T cells, in order to increase the pool of anti-tumor effector cells and potentially mount a larger anti-tumor response.
- **Tumor antigen targeting**. We are developing antibodies designed to target tumor antigens, in either ADCC-inducing or ADC formats, and unique antibody-based multi-specific NKCEs, with the goal of combining the direct effect of tumor cell killing with the indirect priming and amplification of the T cell response by releasing tumor antigens and mobilizing innate immune cells such as NK cells.
- **Suppressive factors of the TME**. We are developing product candidates that relieve the immunosuppression of the innate and adaptive immune responses.



Our pipeline is balanced between these three pillars and each pillar is designed to harness the potential of the innate immune system. More specifically, for each of these pillars, we are advancing the following innovative approaches:

The targeting of inhibitory checkpoints includes the generation of broad-spectrum immune checkpoint inhibitors, such as monalizumab, that have been designed to unleash several immune cell types such as NK cells and CD8+ T cells. By unleashing both types of cells, broad spectrum immune checkpoint inhibitors may provide a more effective anti-tumor response when combined with other therapies.

One of the greatest advances in immuno-oncology has been the development of antibodies that target T cell checkpoints, most notably the CTLA-4 and PD-1/PD-L1 pathways. These treatments have shown an ability to activate T cells, shrink tumors and improve patient survival in a broad range of tumors. In 2011, Yervoy (ipilimumab, anti-CTLA4) became the first checkpoint inhibitor approved by the FDA, followed by Opdivo (nivolumab, anti-PD-1) in 2014 and Keytruda (pembrolizumab, anti-PD-1) in 2015. Other recently approved checkpoint inhibitors include Tecentriq (atezolizumab, anti-PD-L1), Bavencio (avelumab, anti-PD-L1), Imfinzi (durvalumab, anti-PD-L1) and Libtayo (cemiplimab, anti-PD-1). However, the breadth and durability of clinical benefit achieved has been limited to a subset of patients and tumor types.

We are developing broad spectrum checkpoint inhibitors targeting inhibitory checkpoints expressed on several cell types in order to potentially increase the breadth and quality of anti-tumor response. Our most advanced checkpoint inhibitor product candidate, monalizumab, is a potentially first-in-class, dual checkpoint inhibitor designed to activate both tumor-infiltrating NK cells and CD8+ T cells, potentially resulting in increased effector functions and greater killing of the tumor by the immune system. Our preclinical data provide evidence for this dual mechanism of action, the potential of this approach to induce long-lasting anti-tumoral immunity when combined with PD-(L)1 blockers and the ability to increase the activity of ADCC inducing tumor-targeting antibodies such as cetuximab. Our preclinical checkpoint inhibitor programs include a program targeting Siglec-9 receptors, which is expressed on tumor-infiltrating T cells, NK cells and innate myeloid cells. We also plan to continue to discover and explore the potential of developing other novel broad spectrum checkpoint inhibitors.

Targeting tumor antigens, including innovative first-in-class antibody-derived drug candidates such as NKCEs, to harness the anti-tumor activity of NK cells.

Antigen-targeting antibody development is highly dependent upon several factors, including the pattern of expression of the target and the intended mechanism of action. For example, to be effective through ADCC, antibodies should be used in an immunocompetent setting, whereas to be effective by disrupting a signal, antibodies should target a driver of the oncogenic process. We are targeting tumor antigens that are generally highly-expressed in tumor tissues but poorly-expressed in healthy tissues in order to develop product candidates through three approaches:

- The first approach is to directly kill tumor cells using either an ADC, such as with our IPH43 program or an immunotoxin, such as our commercial-stage product Lumoxiti. This approach is particularly well suited when the tumor bed is not sufficiently infiltrated by immune cells.

- The second approach is to develop antibodies that activate cells of the innate immune system, such as NK cells, that favor an immune-mediated mechanism of action. Our most advanced product candidate that utilizes this approach is lacutamab, a potentially first-in-class antibody targeting KIR3DL2. Lacutamab seeks to induce tumor killing through ADCC, and we are developing lacutamab for the treatment of various forms of TCL, such as CTCL, including its aggressive subtype, Sézary syndrome, and PTCL.

- The third approach is to develop multi-specific antibodies that leverage an activating checkpoint, NKp46. Our multi-specific antibodies co-engage both NKp46, with or without CD16, and the tumor antigen. This approach has the potential to more effectively mobilize NK cells because, in the TME of many solid tumors, CD16, the receptor mediating the ADCC of antibodies, can be downregulated on NK cells and whereas NKp46 expression is conserved on tumor-infiltrating NK cells. We are currently pursuing this innovative approach for two undisclosed targets with Sanofi and for one undisclosed target with AstraZeneca. We believe that bridging innate effector cells with the tumor antigen through a multi-specific molecule has the potential to overcome limitations of current strategies focused on artificially redirecting T cells towards the tumors, either with chimeric antigen receptor (CAR) T cells or T cell engagers. Although these current strategies have had significant success in certain hematologic malignancy indications, they are often associated with serious adverse events including cytokine release syndrome and neurologic complications. Data from our preclinical studies suggest that NKCEs are not associated with inflammatory cytokine release and exhibit anti-tumoral activity in solid tumor mouse models, providing a rationale to investigate the impact of NKCE in patients beyond hematologic malignancies.

Targeting the immunosuppressive TME to render it more immuno-competent through the disruption of the adenosine pathway, such as with IPH5201, an anti-CD39, and with IPH5301, an anti-CD73, and the complement pathway, such as with avdoralimab, an anti-C5aR.

We are also focusing our development on the role of the TME in suppressing anti-tumoral immunity. The TME can inhibit both innate and adaptive immune responses by producing or degrading key metabolites or by recruiting suppressive cells, or both. Adenosine is one of the components of the TME that most broadly affects immune response. It is produced by the sequential degradation of extracellular adenosine triphosphate, or ATP, by two enzymes: first CD39, which degrades the ATP into adenosine monophosphate, or AMP, and then CD73, which impairs the AMP into adenosine. For this reason, this pathway has attracted significant development efforts that have been focused primarily on the downstream part of the adenosine degradation cascade, CD73 and the adenosine receptors. We are developing a potentially best-in-class anti-CD73 antibody, and have also focused on the upstream part of the cascade, CD39, in order to block the production of immunosuppressive adenosine and increase the pool of immuno-stimulatory extracellular ATP. We believe this approach is also potentially mechanistically synergistic with many therapies, particularly with our checkpoint inhibitor and tumor-targeting product candidates and programs.

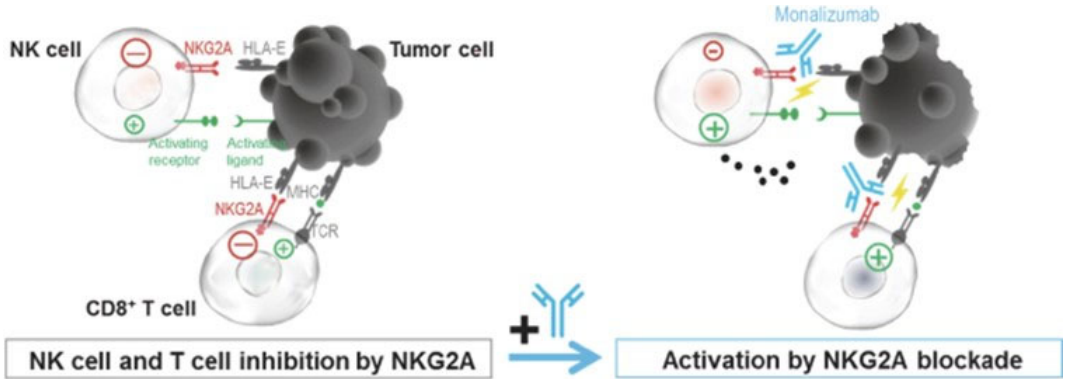
One of the most abundant cell populations within the TME is the myeloid cell subset. Increasing evidence shows that MDSCs accumulate in most individuals with cancer, where they promote tumor progression, inhibit anti-tumor immunity and are an obstacle to many cancer immunotherapies. Additionally, data from mouse models suggests that chronic inflammation and complement pathway activation eventually promotes an immuno-suppressive TME through MDSCs that impair anti-tumor T cell response and chemotherapy efficacy. In particular, one of the complement proteins, referred to as C5a, can be produced at the tumor bed where it attracts and activates MDSCs. Our anti-C5aR program, designed to block the migration and activation of MDSCs, is an opportunity to test a differentiated approach targeting this cell population in cancer. In inflammation, the role of the C5a/C5aR pathway is well established and other companies are currently exploring the efficacy of blockers in several rare, inflammatory diseases. Other neutrophil-driven more frequent diseases such as sepsis, acute lung injury, ischemia-reperfusion injury and asthma, offer the possibility of exploring a scientifically validated pathway in these conditions.

Our Product Pipeline

Monalizumab, a Dual Checkpoint Inhibitor Targeting T Cells and NK Cells

Overview and Mechanism of Action

We are developing monalizumab, a humanized IgG4 monoclonal antibody targeting NKG2A, in collaboration with AstraZeneca. Monalizumab is being investigated for the treatment of SCCHN, CRC and other tumor types. NKG2A is an inhibitory receptor that is expressed on a subset of peripheral and tumor-infiltrating NK cells and tumor-infiltrating cytotoxic CD8+ T cells. Monalizumab acts to block the binding of NKG2A to its ligand, HLA-E, which is overexpressed in many tumors and is often associated with a poor prognosis. Monalizumab enables NK cells and CD8+ T cells to kill cancer cells despite expression of HLA-E, thereby promoting effector T cell responses in combination with an anti-PD-(L)1 antibody and enhancing NK cell effector functions and ADCC. The following illustration provides an overview of monalizumab's mechanism of action:



As depicted above, in the absence of a blockade by monalizumab, the inhibitory receptor NKG2A recognizes its ligand, HLA-E, on the tumor cell. This recognition inhibits or diminishes the activity of the NK cell and CD8+ T cell against the tumor cell because the inhibitory signal from the NKG2A receptor counterbalances the signal of the activating receptors, shown in green in the illustration above. When NKG2A is blocked from recognizing its ligand by monalizumab, the signal from the activating receptors can prevail and thereby trigger the NK cell and CD8+ T cell to eliminate the cancerous cells. Activation of NK cells at the tumor site appears to initiate the sequence of immune events that allows tumors to be detected and killed by CD8+ T cells through a combination of direct cytotoxicity and the promotion of adaptive responses by inducing recruitment of dendritic cells that present tumor antigens via MHC-I on the surface of those cells.

Development Strategy and Opportunity

The expression of HLA-E in several cancer types suggests that it plays a key role in suppressing or inhibiting an immune response to the tumor, thereby allowing tumor progression. HLA-E is expressed in 70-90% of patients with SCCHN, CRC, cancers of the ovary, endometrium, cervix and lung, and various types of leukemia and lymphoma, as well as in up to 50% of all cases of melanoma and esophageal cancers. We are evaluating monalizumab in clinical trials in collaboration with AstraZeneca in multiple advanced solid tumors. Currently, the most advanced clinical programs are for the treatment of SCCHN and CRC.

SCCHN accounts for approximately 4% of all cancers in the United States. The American Cancer Society estimates that in 2020, over 65,500 Americans will develop head and neck cancer and over 14,500 will die from the disease. The survival rate in patients with SCCHN varies greatly depending on the stage of the cancer at diagnosis. Among patients with more advanced disease (stages III and IV), up to 50% develop locoregional relapses and/or distant metastases. Once this occurs, the five-year survival rate drops significantly. Cetuximab (marketed as Erbitux), an EGFR inhibitor, and anti-PD-1 checkpoint inhibitors, including nivolumab (marketed as Opdivo) and pembrolizumab (marketed as Keytruda), have been approved by the FDA for the treatment of SCCHN in the second line setting. However, many patients continue to fail to respond to these treatments and patients with SCCHN who have received prior immuno-oncology treatments have few treatment options and represent a group with a significant unmet medical need.

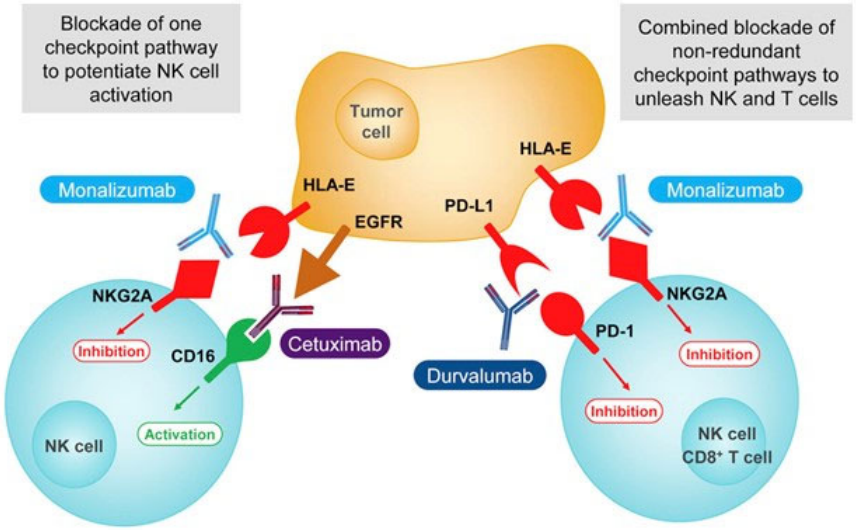
CRC is the third most common cancer in men and the second most common cancer in women globally. The American Cancer Society estimates that in 2020, over 148,000 Americans will develop CRC and over 53,000 will die from the disease. The five-year survival rate varies greatly depending on the stage of the cancer: for localized colorectal cancer, the five-year survival rate is as high as 90%, but if the cancer has metastasized, the five-year survival rate drops to less than 15%. Patients with metastatic CRC typically receive multi-agent chemotherapy with or without antiangiogenic therapy. Approximately 50% of CRC patients have a mutation of the KRAS oncogene. Patients without this mutation typically receive an EGFR inhibitor. With these regimens, median overall survival reaches 30 months, but the five-year survival rate is less than 15%. If these treatments fail, patients may receive third and later lines of treatment, such as regorafenib (marketed as Stivarga) and the trifluridine/tipiracil combination (marketed as Lonsurf). While both of these drugs have been approved by the FDA, their response rate is less than 5% and overall survival was observed to be longer than placebo by less than two months. More substantial activity has been reported for checkpoint inhibitors in patients with the microsatellite instable, or MSI, subtype of CRC, referred to as MSI-CRC. However, the MSI subtype comprises only 5-15% of all CRC cases. Among the 85-95% of CRC patients with the microsatellite stable, or MSS, subtype of CRC, referred to as MSS-CRC, patients in the third and later lines of treatment represent a significant unmet medical need.

We are primarily focused on investigating monalizumab in combination with other approved anti-cancer agents, including:

- **Cetuximab**, an antibody directed against EGFR, is used for the treatment of metastatic CRC and SCCHN. In preclinical models, cetuximab has been observed to bind to EGFR on tumor cells and thereby trigger ADCC by NK cells. However, the efficacy of ADCC is inhibited by NKG2A engagement with HLA-E. Our preclinical data support our hypothesis that monalizumab, by blocking the binding of NKG2A to HLA-E, could enhance the therapeutic activity of cetuximab.

- **Durvalumab** is an antibody directed against PD-L1. PD-L1 and HLA-E are both up-regulated on many cancer cells, and they have both been observed to suppress tumor immune response and contribute to tumor progression. Our preclinical data support our hypothesis that a monalizumab and durvalumab combination therapy may result in a greater anti-tumor immune response than durvalumab alone by blocking both the PD-1/PD-L1 and the NKG2A/HLA-E inhibitory pathways.

The specificity of the combination of cetuximab and monalizumab is produced by the dual targeting of both activating receptors and inhibitory receptors. Immune checkpoint inhibitors unleash lymphocytes by blocking inhibitory receptors and rely on endogenous activating receptors expressed on these lymphocytes to mediate the attack of the tumor cells. In contrast, we believe the combination of cetuximab and monalizumab will not only unleash NK cells by blocking the inhibitory function of NKG2A, but also trigger NK cell cytotoxicity via the recognition of cetuximab-coated tumor cells through the CD16 receptor. The following illustration depicts the way in which monalizumab, in combination with cetuximab or durvalumab, is designed to result in greater anti-tumor activity.



The rationale for these combinations is further supported by the favorable tolerability profile of monalizumab that we observed in preclinical studies and earlier clinical trials, suggesting that monalizumab is generally not expected to negatively impact the safety profile of the combination partner drugs.

The safety of monalizumab was investigated by Novo Nordisk in two Phase I trials in patients with rheumatoid arthritis and one Phase I/II dose-ranging monotherapy trial in advanced, heavily pretreated ovarian cancer patients. Although short in duration and in a different patient population, the rheumatoid arthritis trial provided valuable dose escalation data that we were able to leverage in order to accelerate development of monalizumab in oncology indications. In a dose-ranging trial performed by NCIC in patients with ovarian cancer, 18 patients were randomized to three monalizumab treatments groups: 1 mg/kg, 4 mg/kg and 10 mg/kg. Monalizumab was well tolerated in each of the three groups with no dose limiting toxicities, or DLTs, and no serious adverse events, or SAEs, reported. The most frequent adverse events, or AEs, were headache, fatigue, dry mouth, nausea/vomiting, hot flashes and arthromyalgia. In this trial, the only AEs equal or above grade 3 were two cases of fatigue, three cases of nausea/vomiting and one case of dehydration. There was no observed dose relationship between AEs and dosage of monalizumab.

Clinical Development of Monalizumab

Below is a summary of the ongoing clinical trials that we or our collaborator, AstraZeneca, are conducting, as well as investigator-sponsored trials evaluating monalizumab.

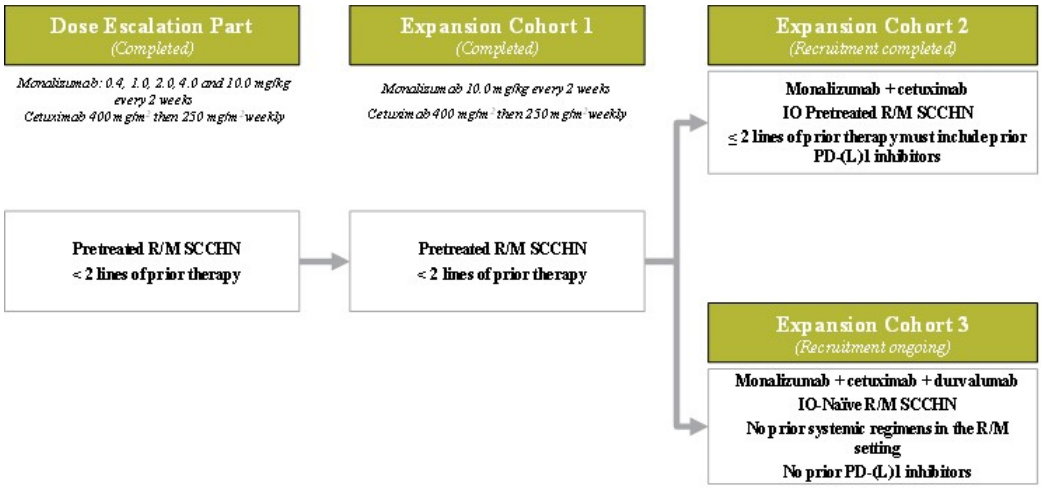
Trial	Status	Sponsor	Number of Patients Receiving Monalizumab	Indication(s)
Phase Ib/II clinical trial in combination with cetuximab	Ongoing	Innate Pharma	up to 140	R/M SCCHN
Phase I/II clinical trial in combination with durvalumab	Ongoing	AstraZeneca	up to 381	Advanced Solid Tumors, including CRC
Phase II clinical trial in combination with durvalumab	Ongoing	AstraZeneca	up to 60	Unresectable, Stage III NSCLC
Phase II clinical trial in combination with durvalumab	Ongoing	AstraZeneca	up to 20	Resectable, Early-Stage NSCLC

Phase II clinical trial in combination with mFOLFOX6 and durvalumab	Not yet recruiting	AstraZeneca	Up to 40	MSS-CRC stage II or III post-surgery
PIONeeR Phase II clinical trial in combination with durvalumab	Not yet recruiting	Marseille Public University Hospital System	up to 30	NSCLC with PD-1 Resistance
Phase II clinical trial in monotherapy and in combination with durvalumab	Ongoing	European Organisation for Research and Treatment of Cancer	up to 74	R/M SCCHN
Phase II trial in combination with trastuzumab	Not yet recruiting	The Netherlands Cancer Institute	Up to 38	Metastatic or locally incurable HER2-positive breast cancer
Phase I clinical trial	Ongoing	Innate Pharma and Institut Paoli-Calmettes	up to 18	Post-Allogenic Stem Cell Transplantation

Under our collaboration agreement with AstraZeneca, we are eligible to receive a $100 million milestone payment upon dosing of the first patient in the first Phase III clinical trial for monalizumab. AstraZeneca has advised us that it expects to commence the Phase III clinical trial of monalizumab in combination with cetuximab in 2020.

Phase Ib/II Clinical Trial in Relapsed/Metastatic SCCHN (in combination with cetuximab)

We and AstraZeneca are currently evaluating monalizumab in an open-label, Phase Ib/II clinical trial in combination with cetuximab in patients with R/M SCCHN. The trial is currently being conducted at five sites in the United States pursuant to an investigational new drug application, or IND, that was accepted by the FDA in August 2015, and in nine sites in France, where it was approved by the Agence Nationale de la Sécurité du Médicament et des Produits de Santé, or ANSM, in September 2015. The trial is expected to enroll up to 140 patients. The following graphic shows the trial design:



In the Phase Ib dose-escalation portion of the clinical trial, 17 patients with R/M SCCHN were evaluated across five dose levels of monalizumab (0.4, 1.0, 2.0, 4.0 and 10.0 mg/kg), administered every two weeks, in combination with cetuximab, administered intravenously with an initial dose of 400 mg/m2 and subsequent doses of 250 mg/m2. For the Phase Ib dose-escalation portion of the trial, the primary endpoint was to assess the occurrence of DLTs in order to determine the recommended dose level of monalizumab for the Phase II portion of the trial. The secondary endpoint was objective response rate, which is measured as the rate of patients who had a complete or partial response according to RECIST 1.1, a widely used guideline to measure anti-tumor response in oncology. The response categories defined under RECIST 1.1 are summarized in the table below.

Response category	Definition according to RECIST 1.1
Definitions of measurable and non-measurable disease; numbers and site of target disease	Measurable lesions are 10 mm or more in long diameter (15 mm for nodal lesions); maximum of 5 lesions (2 per organ). All other disease considered non-target (must be 10 mm or longer in short axis for nodal disease).
CR, PR or SD	Cannot have met criteria for PD prior to CR, PR or SD.
Confirmation of CR, PR	Only required for non-randomized trials.
Confirmation of SD	Not required.
New lesions	Results in PD. Recorded but not measured.
Confirmation of PD	Not required (unless equivocal).

CR = complete response; PR = partial response; SD = stable disease; PD = progressive disease

Seventeen patients were enrolled in the dose escalation portion of the Phase Ib trial. Two patients were not evaluable for DLTs as they withdrew from the trial within three weeks of first treatment for reasons other than DLTs. In the 15 evaluable patients, no DLTs, infusion-related reactions or immune-related disorders were observed, and no discontinuations from the trial attributable to treatment-related AEs or treatment-related deaths occurred. The combination was reported to be well tolerated with no AEs beyond those observed with monalizumab or cetuximab administered as monotherapies. The most common treatment-related AEs were asthenia/fatigue (24%) and headache (18%). All AEs related to treatment with monalizumab were grade 1 or 2 except for one case of grade 3 fatigue experienced by a patient in the 0.4 mg/kg treatment group. Based on the results observed in the Phase Ib dose- escalation portion of the trial, the recommended Phase II dose of monalizumab, in combination with cetuximab, was established as 10 mg/kg, administered intravenously every two weeks.

The primary endpoint for the Phase II portion of the trial is objective response rate, which is measured as the rate of patients who had a complete or partial response according to RECIST 1.1. Secondary endpoints for the Phase II portion of the trial include duration of response, progression-free survival and overall survival. The Phase II portion of the trial is comprised of three expansion cohorts:

- Expansion Cohort 1, which enrolled 40 patients, evaluated the combination of monalizumab and cetuximab in patients with R/M SCCHN who had been previously treated with chemotherapy alone or chemotherapy followed by checkpoint inhibitors;
- Expansion Cohort 2, which enrolled 40 patients and is evaluating the combination of monalizumab and cetuximab in patients with R/M SCCHN who have received a maximum of two prior systemic regimens in the R/M setting and with prior exposure to a PD-(L)1 inhibitor (who we refer to as IO-pretreated patients); and
- Expansion Cohort 3, which is expected to enroll up to 40 patients, began recruiting in April 2019 and is evaluating the combination of monalizumab, cetuximab and durvalumab in IO-naïve patients with R/M SCCHN.

Preliminary clinical efficacy data from the first expansion cohort was presented at the American Association for Cancer Research, or AACR, 2018 annual meeting and at the ESMO 2018 annual meeting. Further subset analyses were presented at the 2018 annual meeting of the Society for Immunotherapy of Cancer and updated one-year survival data was presented at the ESMO 2019 annual meeting. As of April 30, 2019 a total of 40 patients with R/M SCCHN were evaluable for safety. Thirty-nine patients were evaluable for efficacy, while one patient was not evaluable for efficacy because of fatal tumor progression.

The following tables summarize the efficacy results as of April 30, 2019.

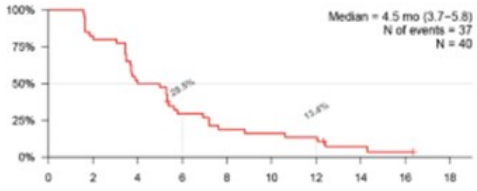
Best overall response	**All Patients n=40, n (%)**	**IO-Naïve Patients (n=22)**	**IO-Pretreated Patients (n=18)**
Complete Response	1 (2.5%)	1 (4.5%)	0 (0.0%)
Partial Response	10 (25.0%)	7 (31.8%)	3 (16.7%)
Stable Disease	22 (55.0%)	10 (45.5%)	12 (66.7%)
Progressive Disease	7[(1)] (17.5%)	4[(1)] (18.2%)	3 (16.7%)

(1) Includes one patient who died from progressive disease before first evaluation.

Outcome Measure	All Patients (n=40)	IO-Naïve Patients (n=22)	IO-Pretreated Patients (n=18)
Overall Response Rate	27.5%	36.4%	16.7%
Median Progression-Free Survival	4.5 months	3.9 months	5.1 months
Median Overall Survival	8.5 months	7.8 months	14.1 months
Disease Control Rate at 24 Weeks	37.5%	36.0%	39.0%
Median Time to Response	1.6 months	1.7 months	1.6 months
Median Duration of Response	5.6 months	5.3 months	5.6 months

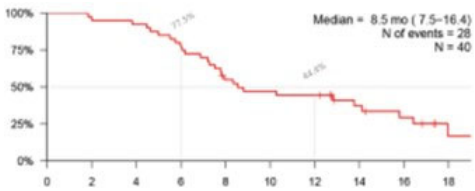
Progression-Free Survival and Overall Survival

Progression-Free Survival



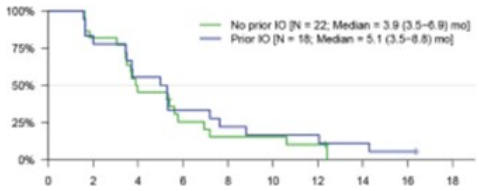
Months

Overall Survival



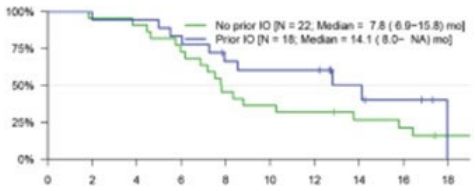
Months

Progression-Free Survival



Months

Overall Survival



Months

Although preliminary, the activity of the monalizumab and cetuximab combination appears to occur across Human Papillomavirus, or HPV, status, tumor burden and PD-(L)1 expression. We believe our preliminary results of the monalizumab and cetuximab combination are encouraging when viewed in light of the clinical results of currently approved treatment options for R/M SCCHN:

- Cetuximab was approved by the FDA for patients previously treated with platinum-based chemotherapy on the basis of a single-arm Phase II clinical trial in which patients treated with cetuximab achieved an overall response rate of 12.6%, median time to progression of 2.3 months and overall survival of 5.8 months.

- Pembrolizumab was approved by the FDA for the treatment of patients previously treated with platinum-based chemotherapy on the basis of a single-arm Phase II clinical trial (KEYNOTE-012) in which patients treated with pembrolizumab achieved an overall response rate of 16.0% and median overall survival of 8.4 months. The median follow-up time was 8.9 months. Among the 28 responding patients, the median duration of response had not been reached (range: 2.4+ to 27.7+ months), with 23 patients having responses of six months or longer.

- Nivolumab was approved by the FDA for the treatment of patients previously treated with platinum-based chemotherapy on the basis of a randomized, active-controlled, open-label clinical trial (CHECKMATE-141). Patients were randomized to receive nivolumab or the investigator's choice of cetuximab, methotrexate or docetaxel. Patients treated with nivolumab achieved an overall response rate of 13.3%. Median overall survival was 7.5 and 5.1 months in the nivolumab and investigator's choice arms, respectively.

Although we believe the preliminary results of this trial are promising, no definitive conclusions regarding safety or effectiveness can be drawn from historical comparisons between this trial and those of the approved drugs discussed above due to the development stage of monalizumab, differences in trial designs and other factors.

Of the 40 patients evaluable for safety in the first expansion cohort of our Phase II trial as of April 30, 2019, all experienced one or more treatment-emergent adverse events, or TEAEs; half of the patients experienced grade 3 or 4 TEAEs. Thirty (75%) patients experienced TEAEs deemed to be related to treatment with monalizumab, and of these, eight (20%) patients experienced grade 3 or 4 related TEAEs. Of the 40 evaluable patients, 16 (40%) patients experienced SAEs and 12 (30%) experienced grade 3 or 4 SAEs. Of these patients, three (8%) experienced SAEs deemed to be related to treatment with monalizumab (all grade 3 or 4). These SAEs consisted of colitis, interstitial lung disease and hypophosphatemia. Only one patient discontinued treatment due to an AE. Cetuximab monotherapy is associated with significant toxicity. In the pivotal clinical trial of cetuximab in SCCHN, AEs were reported for 99% of the patients and SAEs, mostly grade 3 or 4, were reported in 46% of the 47 patients. The most common cetuximab-related AEs were rash, acne and asthenia. In our trial investigating the monalizumab and cetuximab combination, there has been no indication to date that the addition of monalizumab has a negative impact on the tolerability of cetuximab or vice-versa, consistent with the favorable tolerability profile of monotherapy observed in prior preclinical studies and clinical trials to date.

We expect to report preliminary data from the second cohort expansion in the first half of 2020. We believe that data from the second cohort expansion testing monalizumab in combination with cetuximab in patients having been treated by a previous line of PD-(L)1 will inform the next steps of the development of the combination. We estimate that there are approximately 15,000 patients that have received at least two prior lines of treatment in the United States, Europe, Japan and China. We also believe that there will be a paradigm shift in the frequency and stage of use for anti-PD-(L)1 treatments, which we believe will be utilized more frequently in earlier lines of treatment.

The third expansion cohort was initiated in April 2019 and will provide initial data in IO-naïve patients. We expect to have preliminary data for the third expansion cohort in the second half of 2020. We believe these data will inform the design of potential future clinical trials in early settings, such as the first line or locally advanced setting. We estimate that in the United States, Europe, Japan and China, there are approximately 65,000 and 40,000 patients in the first line and locally advanced settings, respectively.

On September 26, 2019, we announced that AstraZeneca will advance monalizumab into a Phase III randomized clinical trial evaluating monalizumab in combination with cetuximab in patients suffering from R/M SCCHN, and that we and AstraZeneca will co-fund the clinical trial. The initiation of the clinical trial is expected in 2020, subject to regulatory and compliance approvals.

Phase I/II Clinical Trial in Solid Tumors, including Colorectal Cancer (in combination with durvalumab)

AstraZeneca is evaluating monalizumab in a Phase I/II, multi-center, single-arm, 3+3 dose-escalation and cohort expansion clinical trial in combination with durvalumab in up to 381 adults with advanced solid tumor malignancies, including CRC. This trial, which commenced in February 2016, is being conducted at 28 sites in the United States pursuant to an IND that was accepted by the FDA in January 2016, as well as over 40 sites in Australia, Belgium, Brazil, Canada, France, Hungary, Italy, South Korea, New Zealand, Spain and the United Kingdom. The primary endpoint of the trial is safety, with anti-tumor efficacy being a key secondary endpoint. Other secondary endpoints include response duration, progression-free survival, overall survival, pharmacokinetics, pharmacodynamics, and immunogenicity of a monalizumab and durvalumab combination.

In June 2018, at the annual meeting of the American Society of Clinical Oncology, or ASCO, the trial investigators presented clinical data showing preliminary anti-tumor activity in patients with R/M MSS-CRC, a population historically unresponsive to PD-(L)1 blockade. At the most recent measurement date in April of 2018, 40 patients were evaluable for safety and 39 were evaluable for efficacy. Thirty-five (88%) patients had two or more prior lines of therapy. The key efficacy data from this Phase I/II clinical trial are summarized in the table below.

Efficacy parameter	**Number of patients (%)**
Total number of patients	39 (100%)
Complete response	0 (0%)
Partial response	3 (8%)
Stable disease	11 (28%)
Progression	22 (56%)
Not evaluable	3 (8%)
Overall response rate (95% Confidence interval)	3 (8%) (2-22)
Disease control rate at 16 weeks (95% Confidence interval)	12 (31%) (17-48)

Efficacy parameter	Weeks (range)
Median duration of response	16.1 weeks (15.9-not estimable)

Clinical results of the currently approved treatment options for R/M MSS-CRC, regorafenib and trifluridine, are as follows:

- Regorafenib (marketed as Stivarga) was approved by the FDA for the treatment of patients who have been previously treated with chemotherapy, an anti-vascular endothelial growth factor, or VEGF, therapy and, if KRAS wild type, an anti-EGFR therapy, based on a randomized, placebo-controlled Phase III clinical trial. In this trial, patients with metastatic CRC who were treated with regorafenib achieved an overall response rate of 1%. Median overall survival was 6.4 months in the regorafenib group versus 5.0 months in the placebo group. Progression-free survival was 2.0 months in the regorafenib group versus 1.7 months in the placebo group, and 41% of patients in the regorafenib group achieved disease control compared to 15% in the placebo group.

- Trifluridine/tipiracil combination (marketed as Lonsurf) was approved by the FDA for the treatment of patients who have been previously treated with the same prior treatments as regorafenib, based on a randomized, placebo-controlled Phase III clinical trial. Patients treated with trifluridine/tipiracil combination achieved an overall response rate of 1.6%. Median overall survival was 7.2 months in the trifluridine/tipiracil combination group versus 5.2 months in the placebo group. Progression-free survival was 2.0 months in the trifluridine/tipiracil combination group compared to 1.7 months in the placebo group.

These data indicate that there remains a significant medical need for metastatic CRC in the third or later line setting with response rates to available treatments of less than 5% and median overall survival only minimally exceeding that seen with placebo.

The safety results of the monalizumab and durvalumab combination from this trial have been consistent with the monotherapy profiles of each agent. Dose-escalation was completed with no DLTs and the maximum tolerated dose was not reached. No fatal AEs or AEs leading to treatment discontinuation were reported. In the MSS-CRC expansion cohort, the most common treatment-related AEs included arthralgia (7.5%), increased levels of alkaline phosphatase, or AST (7.5%), hypothyroidism (7.5%), pruritus (7.5%) and rash (7.5%). Grade 3 or 4 AEs that occurred in three patients were limited to one case each of sepsis (grade 4) and increased lipase (grade 3), that both were resolved, and increased AST (grade 3).

Based in part on the clinical trial results observed to date, AstraZeneca has decided to pursue additional expansion cohorts to assess the safety and efficacy of monalizumab in combination with durvalumab in first and third line settings in treating metastatic CRC. These additional expansion cohorts are ongoing.

At the ESMO 2019 annual meeting, data were presented from a dose-exploration cohort assessing the safety and efficacy of durvalumab and monalizumab in combination with standard of care chemotherapy (bevacizumab and modified folinic acid, fluorouracil and oxaliplatin, or mFOLFOX6) as a first-line therapy for advanced and metastatic MSS-CRC. Eligible patients with MSS-CRC had at least one lesion measurable by RECIST 1.1, adequate coagulation and organ function and no prior systemic therapy. Patients received 1500 mg of durvalumab intravenously every four weeks, 750 mg of monalizumab every two weeks, mFOLFOX6 every two weeks, and 5 mg/kg of bevacizumab every two weeks. Treatment continued until unacceptable toxicity or confirmed progressive disease was observed, or due to patient withdrawal for other reasons. Chemotherapy dose modifications were allowed according to standard of care practices, except during the dose-limiting toxicity evaluation period. The primary objective was to assess the safety and tolerability of the combination therapy; secondary endpoints included anti-tumor activity.

As of July 29, 2019, 18 patients were enrolled in the dose-exploration expansion cohort. The combination of monalizumab, durvalumab, standard of care chemotherapy and bevacizumab had no DLTs and a safety profile as a first-line therapy for advanced and metastatic MSS-CRC that was similar to that of the standard of care alone. Of the 18 patients in the clinical trial, 17 patients were evaluable for response.

Best overall response	**Response-evaluable population (n=17)**
Complete Response	0 (0%)
Partial Response	7 (41.2%)
Stable Disease	8 (47.1%)
Unconfirmed Partial Response	2 (11.8%)
Progressive Disease	2 (11.8%)
Complete Response + Partial Response, confirmed and unconfirmed	9 (52.9%)
Outcome Measure	
Overall Response Rate	7 (41.2%)
Disease control rate at 24 weeks	11 (64.7%)
Median time to response	15.4 weeks
Median duration of response	not reached

TEAEs relating to monalizumab occurred in 14 patients (77.8%), with the most common TEAEs being fatigue (27.8%) and increased aspartate aminotransferase (16.7%). One patient had a grade 3 AE (embolism), a TEAE that was also considered to be related to chemotherapy and bevacizumab treatment.

Durvalumab-related TEAEs occurred in 15 patients (83.3%), most commonly fatigue (27.8%), increased amylase (22.2%) and increased lipase (22.2%). No patients had SAEs that were determined to be durvalumab-related.

All patients had chemotherapy-related TEAEs, most commonly fatigue (55.6%), nausea (55.6%) and peripheral neuropathy (50.0%). Two patients (11.1%) had chemotherapy-related, grade 3 SAEs, which were comprised of embolism and febrile neutropenia.

Bevacizumab-related AEs occurred in 10 patients (55.6%), and were most commonly epistaxis (16.7%), fatigue (16.7%), increased lipase (11.1%) and rash (11.1%). Two patients (11.1%) had bevacizumab-related, grade 3 SAEs, which were comprised of embolism and febrile neutropenia.

In January 2020, AstraZeneca presented updated data as of August 26, 2019 at the Gastrointestinal Cancer Symposium (ASCO GI). Such data was identical as the data presented above.

We expect AstraZeneca will use clinical trial data observed to date to inform the design of potential future clinical trials in CRC.

Additional Exploratory Clinical Trials

Monalizumab is also being evaluated by us, AstraZeneca and investigator sponsors in several exploratory trials:

- AstraZeneca's two clinical trials in NSCLC. AstraZeneca is conducting two separate Phase II clinical trials assessing the efficacy and safety of durvalumab monotherapy as compared to durvalumab in combination with various novel agents, including monalizumab, in NSCLC. The first trial is expected to enroll up 60 patients with unresectable, stage III NSCLC and the second trial is expected to enroll 20 patients with resectable NSCLC. The primary endpoint of the first trial is objective response rate at 16 weeks according to RECIST 1.1, and secondary endpoints include incidence of AEs, duration of response, disease control and progression-free survival. The primary endpoint of the second trial is major pathological response rate and key secondary endpoints include safety and pathological complete response rate. These trials began in January 2019 and are being conducted in the United States, Canada, France, Hong Kong, Italy, Poland, Portugal, Spain, Switzerland and Taiwan.

- AstraZeneca's clinical trial in MSS-CRC (Columbia 2). AstraZeneca is conducting a Phase II clinical trial assessing the efficacy and safety of standard-of-care adjuvant mFOLFOX6 chemotherapy alone or in combination with novel oncology therapies, including monalizumab. The study will be conducted in subjects who have undergone radical surgical resection for Stage II or III MSS-CRC, are eligible for mFOLFOX6 adjuvant therapy, and are confirmed as circulating tumor DNA (ctDNA) positive post-surgery. The primary endpoint of the trial is ctDNA clearance, which is defined as the change from ctDNA positive status at baseline to ctDNA negative post baseline (6 months). Key secondary endpoints include incidence of AEs, disease free survival, disease free survival at 12 months, overall survival and pharmacokinetics and immunogenicity. We expect the trial to start at the end of April 2020 and to be conducted in the United States, Australia, Canada, France, the Republic of Korea, Spain and Taiwan.

- The PIONeeR clinical trial, a Phase II clinical trial sponsored by Marseille Public University Hospital System. The purpose of this trial is to assess how to overcome resistance to immune checkpoint inhibitor monotherapies with experimental precision immunotherapies combined with durvalumab in third or fourth line treatment, in patients with advanced NSCLC. The PIONeeR trial includes multiple trial arms, each testing a different therapy in combination with durvalumab. In the monalizumab arm, up to 30 patients will receive durvalumab in combination with 750 mg of monalizumab every four weeks. The 12-week disease control rate is the primary endpoint, and there are multiple key secondary endpoints including overall response rate, progression-free survival, overall survival and duration of response. The trial is being conducted in France.

- Phase I clinical trial evaluating monalizumab as a single agent in patients with hematological malignancies in a post-transplantation setting sponsored by Institut Paoli-Calmettes. The objective of this trial is to identify the maximum tolerated dose, if any, and to select a recommended Phase II dose in this particular population. The trial will enroll up to 18 patients and will include patients who have received allogenic hematopoietic stem cell transplantation. Four sequential cohorts of patients will receive a single escalating dose of monalizumab 75 to 100 days after stem cell transplantation. The primary endpoint is the occurrence ratio of DLTs within four weeks of treatment. Secondary endpoints include incidence of acute and chronic graft-versus-host disease, probabilities of non-relapse mortality, cumulative incidence of relapse, probability of disease-free survival and probability of overall survival, each measured at one year after administration of monalizumab. This trial began in December 2016 and is being conducted in France.

- Phase II clinical trial evaluating monalizumab in patients with R/M SCCHN sponsored by the European Organisation for Research and Treatment for Cancer. The objective of this trial is to evaluate biomarker-based treatment of patients with R/M SCCHN. The trial groups patients into different biomarker-driven cohorts, each receiving a different study drug. Monalizumab will be evaluated in a single arm Phase II cohort of approximately 40 patients who are anti-PD-(L)1 naïve or resistant. The primary endpoints of the trial are progression-free survival at 16 weeks and objective response rate at six months. Secondary endpoints include progression-free survival, response duration, overall survival and toxicity, each measured at 54 months after first patient in, as well as objective response rate measured at 48 months after first patient in. The trial began in March 2017 and is being conducted in Belgium, France, Italy and the United Kingdom. Preliminary clinical trial results were presented at the 2019 ESMO annual meeting, which showed that monalizumab had limited activity as a monotherapy for the 26 evaluable patients with R/M SCCHN, and it did not meet its primary endpoint as a monotherapy, with an overall response rate of 0%, stable disease in 23% of patients and a median overall survival of 6.7 months. The expansion cohort evaluating monalizumab in combination therapy is ongoing.

- Phase II clinical trial evaluating monalizumab and trastuzumab in patients with metastatic or locally incurable HER2-positive breast cancer (MIMOSA) sponsored by The Netherlands Cancer Institute. The objective of this explorative trial is to assess the efficacy of the combination in patients with high stromal tumor-infiltrating lymphocytes (sTILs) or low sTILs in two separate cohorts (higher or equal to 5% versus lower than 5%). The primary endpoint is response rate according to RECIST 1.1. Secondary endpoints include clinical benefits (patients with complete response, partial response or stable disease for more than 24 weeks according to RECIST1.1), PFS, OS and toxicity (DLT will be monitored since the combination has never been used in trials before).

Lumoxiti, a First-in-Class, Marketed Product In-Licensed from AstraZeneca for the Treatment of Hairy Cell Leukemia

Lumoxiti (moxetumomab pasudotox-tdfk) is a marketed, first-in-class CD22-directed cytotoxin for the treatment of HCL which was approved by the FDA under priority review in September 2018 as a treatment for adult patients with R/R HCL who have received at least two prior systemic therapies, including treatment with a purine nucleoside analog, or PNA. Lumoxiti has been granted orphan drug designation by the FDA for the treatment of HCL.

HCL is a rare, chronic and slow-growing leukemia in which the bone marrow over-produces abnormal B cell lymphocytes. Untreated, HCL can result in serious conditions, including infections, bleeding, anemia and potentially may lead to death. Approximately 1,000 people are diagnosed with HCL in the United States each year. HCL accounts for up to 3% of all adult leukemias. While many patients initially respond to treatment, approximately 30-40% will relapse within five to ten years after their first treatment.

PNAs, such as cladribine and pentostatin, are the established first line treatments for patients with HCL. Up to 90% of the patients treated with PNAs achieve a complete remission. However, PNAs are associated with AEs linked to myelosuppression, which is a condition in which bone marrow activity is decreased, resulting in fewer red blood cells, and immunosuppression. Most patients who relapse more than two years after their initial treatments receive a second course of PNAs with a similar overall response rate to initial therapy but with a shorter duration. Patients who relapse earlier often receive PNAs combined with rituximab. When a patient relapses a second time, reaching the third line setting, PNAs are less effective, with a significantly lower response rate and shortened duration of response. The third and later line setting, which we estimate comprises approximately 380 patients in the United States on an annual basis, represents a significant medical challenge, with no established standard of care and very few treatment options available. The National Comprehensive Cancer Network, or NCCN, guidelines for HCL, updated in January 2019, recommend that patients who are third line or later in treatment be considered for Lumoxiti or participate in clinical trials of vemurafenib, with or without rituxan, or ibrutinib. Vemurafenib and ibrutinib have shown limited activity. The third and later line setting represents a significant medical challenge, with no established standard of care and very few treatment options available. To date, Lumoxiti is the only approved drug in the United States for those patients in third line or later treatment.

The approval of Lumoxiti was based on data from the open-label ‘1053’ trial, which was a single-arm, multi-center Phase III clinical trial assessing the efficacy, safety, immunogenicity and pharmacokinetics of Lumoxiti monotherapy in patients with R/R HCL who had received at least two prior therapies, including one PNA. The trial enrolled 80 patients and was conducted at 34 sites in 14 countries. The primary endpoint was durable complete response, defined as complete response with hematologic remission (blood count normalization) for more than 180 days. Secondary endpoints included overall response rate, relapse-free survival, progression-free survival, time to response, safety, pharmacokinetics and immunogenic potential. In this trial, of the patients treated with Lumoxiti, 75% achieved an overall response, 30% had a durable complete response and 34% achieved a complete response with no minimal residual disease. The following table summarizes initial efficacy results of the trial at the primary readout:

Efficacy measure	Result %, (95% CI)
Durable complete response rate[a,b]	30% (20, 41)
Overall response rate[c]	75% (64, 84)
Complete response rate[d]	41% (30, 53)
Partial response rate[e]	34% (24, 45)
Hematologic remission rate[b]	80%

a Durable complete response is defined as patients who achieved complete response with hematologic remission for a duration of more than 180 days

b Hematologic remission is defined as hemoglobin > 11g/dL, neutrophils > 1500/mm3, platelets > 100,000/mm3 without transfusions or growth factor for at least 4 weeks

c Overall response rate is defined as best overall response of complete response or partial response

d Complete response is defined as clearing of the bone marrow of hairy cells by routine hematoxylin and eosin stain, radiologic resolution of pre-existing lymphadenopathy and/or organomegaly, and hematologic remission

e Partial response is defined as ≥ 50% decrease or normalization (< 500/mm3) in peripheral blood lymphocyte count, reduction of pre-existing lymphadenopathy and/or organomegaly, and hematologic remission

In this trial, Lumoxiti had an acceptable tolerability profile, with low rates of treatment-related AEs leading to discontinuation. Grade 3 and 4 capillary leak syndrome and hemolytic uremic syndrome were seen in 5% and 2.5% of the patients, respectively. These AEs were reported to be manageable and reversible with close monitoring and best supportive care. The final analysis of this trial has been presented at the ASH meeting in 2019, showing that 29 patients (36%) with relapsed or refractory hairy cell leukemia achieved durable complete response with Lumoxiti, compared to the primary analysis in which 24 patients (30%) achieved durable complete response. The following table summarizes final efficacy results of the trial:

Efficacy measure	Result %, (95% CI)
Durable CR (CR with HR > 180 days)[a,b]	36.3% (25.8, 47.8)
CR with HR ≥ 360 days[b,c]	32.5% (22.4, 43.9)
CR rate[d]	41.3% (30.4, 52.8)
CR with MRD-negative status[d,e]	33.8% (23.6, 45.2)
Partial Response Rate[f]	33.8%
Hematologic Remission Rate[d]	80.0%
Median duration of CR	62.8 months (0.0+ to 62.8)
Median Progression-Free Survival	41.5 months (range 0.0+ to 71.7)

a Durable complete response is defined as patients who achieved complete response with hematologic remission for a duration of more than 180 days

b Hematologic remission is defined as hemoglobin > 11g/dL, neutrophils > 1500/mm3, platelets > 100,000/mm3 without transfusions or growth factor for at least 4 weeks

c Durable complete response is defined as patients who achieved complete response with hematologic remission for a duration of more than 360 days

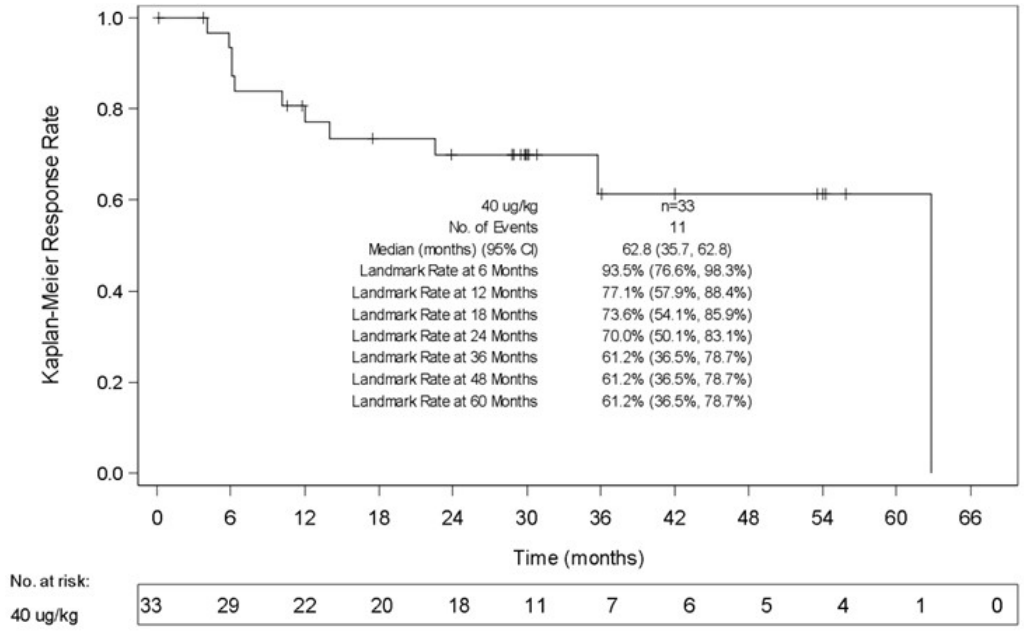
d Complete response is defined as clearing of the bone marrow of hairy cells by routine hematoxylin and eosin stain, radiologic resolution of pre-existing lymphadenopathy and/or organomegaly, and hematologic remission

e Minimal residual disease (MRD) is a term used to describe the small number of cancer cells in the body after cancer treatment. An MRD positive test result means that disease was still detected after treatment. An MRD negative result means that no disease was detected after treatment. The MRD status was independently assessed in bone marrow biopsy specimens using immunohistochemistry.

f Partial response is defined as ≥ 50% decrease or normalization (< 500/mm3) in peripheral blood lymphocyte count, reduction of pre-existing lymphadenopathy and/or organomegaly, and haematologic remission

The final analysis confirms the acceptable tolerability of Lumoxiti, with low rates of treatment-related AEs leading to discontinuation. The final analysis did not identify any new serious AEs or change in hemolytic uremic syndrome or capillary leak syndrome. Consistent with the primary analysis, the most frequent AEs were peripheral edema (39%), nausea (35%), fatigue (34%), headache (33%), and pyrexia (31%). Grade 3 and 4 capillary leak syndrome and hemolytic uremic syndrome were seen in 2.5% and 7.5% of the patients, respectively. These AEs were reported to be manageable and reversible with close monitoring and best supportive care.

Duration of complete response assessed by Blinded Independent Central Review



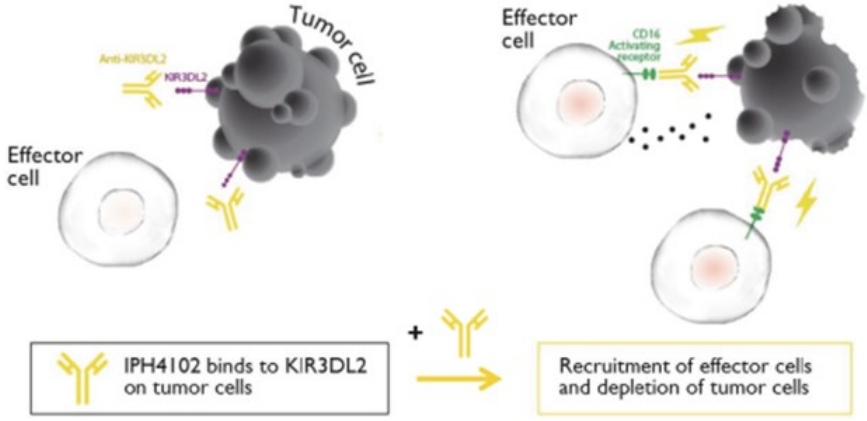
We in-licensed commercial rights to Lumoxiti in the United States and European Union from AstraZeneca in 2018. As part of our agreement with AstraZeneca, we have a collaborative and staged transition for the Lumoxiti program. Since the end of the fourth quarter of 2019, we have become the primary commercial entity promoting Lumoxiti, having transitioned all sales and medical affairs activities, including medical science liaisons and sales representatives, from AstraZeneca to us. We plan to leverage the commercial infrastructure that we are developing for Lumoxiti to commercialize our other product candidates targeting rare cancers, including lacutamab in Sézary syndrome, MF and PTCL, if approved.

In January 2020, we announced that the European Medicines Agency (EMA) has accepted the Marketing Authorization Application (MAA) submission for Lumoxiti, for the treatment of patients R/R HCL who have received at least two prior systemic therapies, including treatment with a purine nucleoside analog.

Lacutamab (IPH4102), a Tumor Targeting Anti-KIR3DL2 Antibody

Overview and Mechanism of Action

We are developing our wholly owned product candidate lacutamab for the treatment of certain subtypes of TCLs, including CTCL and PTCL. Lacutamab is designed to bind to the KIR3DL2 receptor and to kill cancer cells by ADCC, as illustrated in the following figure.



KIR3DL2 is a receptor of the KIR family. In our preclinical studies, we have observed that KIR3DL2 is not expressed on healthy tissues, except on a subset of NK cells and T cells. In addition, KIR3DL2 is expressed in T-cell lymphoma. In particular, 65% of CTCL patients express KIR3DL2 and KIR3DL2 is also expressed in approximately 50% of patients with MF, the most common type of CTCL. This frequency increases to 85% for the most aggressive CTCL subtypes, including Sézary syndrome. KIR3DL2 is also expressed by approximately 50% of patients with PTCL.

In January 2019, the FDA granted lacutamab Fast Track Designation for the treatment of adults with R/R Sézary syndrome who have received at least two prior systemic therapies. Lacutamab has also been granted orphan drug designation in the European Union and in the United States for the treatment of CTCL. In May 2019, we initiated a Phase II clinical trial evaluating lacutamab in different subtypes of TCL.

Cutaneous T Cell Lymphoma

CTCL is a heterogeneous group of non-Hodgkin's lymphomas that are characterized by the abnormal accumulation of malignant T cells, primarily in the skin. CTCL accounts for approximately 4% of all non-Hodgkin's lymphomas and has a median age at diagnosis of 55 to 65 years. There are approximately 6,000 new CTCL cases diagnosed per year in Europe and the United States combined. The most common type of CTCL is mycosis fungoides, or MF, accounting for approximately half of all CTCLs. Sézary syndrome, characterized by the presence of lymphoma cells in the blood, is a CTCL subtype with a particularly poor prognosis. The following table outlines the most common CTCL types, their frequency as a percentage of all cases of CTCL, and prognosis.

CTCL Type	Frequency (%)	5-year disease-specific survival (%)
Mycosis fungoides	39	88
Primary cutaneous CD30+ lympho-proliferative disorders	20	95-99
Primary cutaneous CD4+ small/medium T-cell lymphoproliferative disorder	6	100
Mycosis fungoides variants	5	75
Sézary syndrome	2	36

Patients with advanced CTCL have a poor prognosis with few therapeutic options and no standard of care. Treatment generally includes skin-directed therapies, such as topical corticosteroids, and systemic treatments, such as steroid drugs and interferon, for patients with more advanced disease or for whom skin-directed therapies failed.

Two new drugs have recently been approved for the treatment of CTCL:

- Brentuximab vedotin (marketed as Adcetris), has been approved by the FDA for treatment of patients with primary cutaneous anaplastic large cell lymphoma, or pcALCL, or CD30-expressing MF who have received prior systemic therapy. In Europe, brentuximab vedotin is indicated for the treatment of adult patients with R/R CD30+ CTCL who require systemic therapy. The response rate to brentuximab vedotin was 67% compared to 20% in the control group (physician's choice of either methotrexate or bexarotene) and the median progression-free survival was 16.7 months compared to 3.5 months for the control group. Brentuximab vedotin was associated with a 45% risk of peripheral neuropathy, which led to treatment discontinuation in 12% of the patients and inclusion of a boxed warning on the label. Brentuximab vedotin is not approved in Sézary syndrome.

- Mogamulizumab, marketed as Poteligeo, has been approved by the FDA and the EMA for the treatment of adult patients with R/R MF or Sézary syndrome after at least one prior systemic therapy. The response rate to mogamulizumab was 28%, compared to 5% in the control group (vorinostat), and the median progression-free survival was 7.6 months compared to 3.1 months for the control group. The most common AEs were rash, infusion-related reactions, fatigue, diarrhea, upper respiratory tract infection and musculoskeletal pain.

Although these new treatments represent progress in the treatment of CTCL, they are still associated with the safety and efficacy limitations observed in their respective clinical trials. Further, even with these options, the vast majority of these treated patients eventually relapse and overall survival remains poor.

Peripheral T-Cell Lymphoma

PTCL is a diverse group of aggressive non-Hodgkin's lymphomas that develop from mature T cells and NK cells. PTCL arises in the lymphoid tissues outside of the bone marrow, such as in the lymph nodes, spleen, gastrointestinal tract and skin. The various PTCL types, their frequency as a percentage of all TCL cases, and prognosis are shown in the following table.

PTCL Type	Frequency (%) Europe & U.S.	5-year overall survival (%)
PTCL not otherwise specified	34	32
Angioimmunoblastic	16-28	32
Anaplastic large cell lymphoma, or ALCL, ALK positive	6-16	70
Anaplastic large cell lymphoma, ALK negative	8-9	49

Irrespective of the specific regimen used (single agent chemotherapy or combination chemotherapy including GemOx), patients with R/R PTCL typically experience a poor outcome, with a median progression-free survival and overall survival of 3.1 months and 5.5 months, respectively.

Multi-agent chemotherapy is the recommended first line treatment for the majority of patients with PTCL. Brentuximab vedotin is approved in combination with first line chemotherapy for patients with CD30-positive PTCL. For patients who are eligible, subsequent stem cell transplantation is a potentially curative option but it is limited to a minority of patients. Despite these treatments, a high proportion of patients need second line therapy. Belinostat (marketed as Beleodaq), pralatrexate (marketed as Folotyn) and romidepsin (marketed as Istodax) have each been approved by the FDA in this setting, but efficacy is generally limited. In the respective non-randomized clinical registration trials, the response rate to belinostat, pralatrexate and romidepsin were each less than 30%, and the median duration of response was approximately 10 months for belinostat and pralatrexate. None of these treatments have been approved by the EMA.

In fact, despite these approvals, current treatment guidelines recommend participation in a clinical trial as a preferred option for patients with relapsed PTCL after first line. If clinical trials are not available, a chemotherapy combination of gemcitabine and oxaliplatin, or GemOx, is listed as one of the preferred treatment combinations. Several studies have been published on the role of GemOx in patients with relapsed lymphoma and it is one of the most widely used regimens for this patient population in the United States, Europe and Asia.

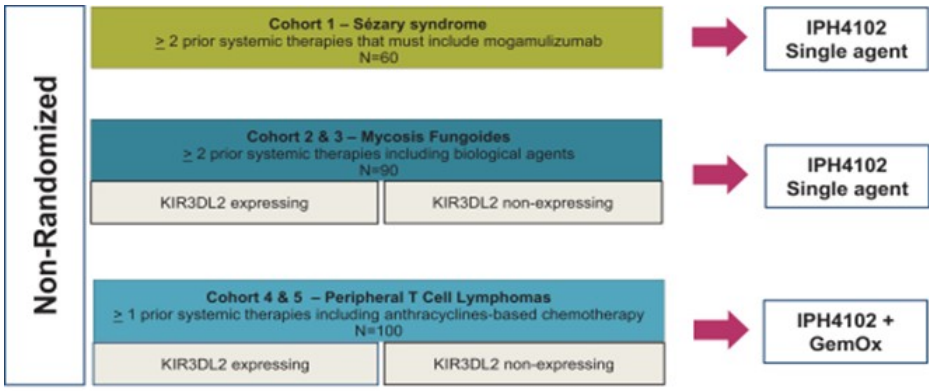
Clinical Development of lacutamab

Below is a summary of our ongoing clinical trials of lacutamab.

Trial	Status	Sponsor	Number of Patients in Trial	Indication(s)
Phase II clinical trial (TELLOMAK)	Ongoing	Innate Pharma	up to 250	Sézary syndrome, MF and PTCL
Phase I clinical trial	Recruitment completed, initial data reported and follow-up ongoing	Innate Pharma	44	CTCL (including 35 patients with Sézary syndrome)

Phase II Clinical Trial (TELLOMAK)

In May 2019, we initiated a global, open-label, multi-cohort Phase II clinical trial, known as TELLOMAK. This clinical trial is being conducted at more than 10 sites in the United States, pursuant to an IND accepted by the FDA in January 2019, and at 11 sites in France, pursuant to approval by ANSM in February 2019, and in Germany, Italy and the United Kingdom. In this trial, we are evaluating lacutamab alone and in combination with GemOx in patients with advanced TCL. We expect to recruit up to 250 patients, with lacutamab evaluated as a single agent in approximately 60 patients with Sézary syndrome who have received at least two prior treatments, including mogamulizumab, as a single agent in approximately 90 patients with MF who have received at least two prior systemic therapies, and as combination with standard chemotherapy (GemOx) in approximately 100 patients with PTCL who have received at least one prior treatment. The MF and PTCL arms will be comprised of two cohorts each, testing lacutamab in KIR3DL2 expressing and non-expressing patients. These cohorts will follow a Simon 2-stage design that will terminate if treatment is considered futile. The following graphic depicts the trial design:



Tellomak: T-cell lymphoma anti-KIR3DL2 therapy

The primary endpoint of the trial is objective response rate, measured using the 2011 Olsen criteria for CTCL or the Lugano criteria for PTCL, respectively. Key secondary measures include incidence of treatment-emergent AEs, the effect of skin disease on quality of life as measured by the Skindex29 questionnaire, pruritus as measured by the Visual Analog Scale, progression-free survival and overall survival. The results of the dedicated Sézary syndrome cohort may support a future BLA submission to the FDA.

In November 2019, Impletio Wirkstoffabfüllung GmbH (formerly known as Rentschler Fill Solutions GmbH), the subcontractor in charge of the fill-and-finish manufacturing operations of lacutamab unilaterally decided to withdraw the certificates of conformance of all clinical batches produced at their facilities, including the lacutamab batch used for the TELLOMAK Phase II clinical trial assessing lacutamab in multiple indications. Impletio Wirkstoffabfüllung GmbH decided to withdraw the certificates of conformance even though the compliance of its manufacturing site with GMP has been confirmed by two on-site inspections performed by a local regulator before and after we began to work with them. Impletio Wirkstoffabfüllung GmbH also filed for bankruptcy.

Since November 2019, we have been in ongoing discussions with US and European national regulatory authorities regarding GMP deficiencies at our manufacturing subcontractor site that managed the fill and finish operations of the lacutamab clinical vials for TELLOMAK. As of today:

- France and the U.K.: We have reactivated the TELLOMAK trial in Sézary syndrome and MF in France and in the U.K., following authorization by the respective national authorities. Since standard of care options are available to patients with PTCL, we have decided not to enroll further patients in the trial until a new batch conforming with GMP is available. However, currently enrolled patients from all cohorts can continue treatment in the trial.

- US, Spain, Germany, and Italy: TELLOMAK remains on partial clinical hold in the U.S., in addition to Spain and Germany, based on feedback from the respective regulatory authorities. This means that currently enrolled patients can continue treatment in the trial. However, no new patients can enroll in the trial until a new batch conforming with GMP is available. The clinical trial has been suspended in Italy.

There was no safety issues related to the trial medication. This is consistent with the review conducted by the Independent Data Monitoring Committee (IDMC), which concluded there were no safety issues related to lacutamab, and the product appeared to be well-tolerated among current patients enrolled in the trial. We are working on the transfer of the lacutamab fill and finish manufacturing operations to new CMOs. We anticipate that a new clinical batch conforming with GMP should be available in the second half of 2020. We will continue to work with the U.S. Food and Drug Administration and other European national regulatory agencies to get the trial fully reactivated as. In addition, we are evaluating other options for PTCL and will provide a further update in due time. We expect first preliminary efficacy data for Sézary and MF cohorts starting in 2021.

Phase I Clinical Trial

In November 2015, we began a Phase I dose-escalating and cohort expansion clinical trial to evaluate lacutamab for the treatment of advanced CTCL. The trial enrolled 44 patients, including 35 patients with Sézary syndrome. The primary objective of the trial was to evaluate lacutamab safety, and to identify DLTs and the maximum tolerated dose. Data from this trial were presented at the 2018 meeting of the American Society of Hematology. We reported clinical activity in the subgroup of 35 Sézary syndrome patients, including an observed overall response rate of 42.9%, median duration of response of 13.8 months, median progression-free survival of 11.7 months and that approximately 90% of patients experienced improved quality of life. The overall response rate appeared to be higher (53.6%) in the 28 patients with no histologic evidence of large cell transformation. Clinical activity was associated with a substantial improvement in quality of life as assessed by the Skindex29 and Pruritus Visual Analog Scale scores. Lacutamab was generally well tolerated. The most common AEs were peripheral edema (29%), asthenia (26%) and fatigue (23%), all of which were grade 1 or 2. Possibly treatment-related, grade 3 or above adverse events were observed in four patients (11%) and only three patients (9%) stopped treatment as a result of an adverse event. One patient stopped treatment because of peripheral neuropathy, one patient stopped treatment because of general malaise and one patient stopped treatment because of several adverse events, including renal injury, respiratory failure, dysphagia and sepsis.

Recent preclinical data presented in June 2019 further support the rationale of evaluating the potential of lacutamab in larger subsets of patients with TCL. The findings demonstrate that KIR3DL2 is expressed in multiple subtypes of PTCL and that the incubation of TCL cell lines with a combination chemotherapy regimen consisting of gemcitabine and oxaliplatin, or GemOx, enhanced KIR3DL2 expression. Moreover, we observed that the combination of lacutamab and GemOx improved anti-tumor activity against a KIR3DL2-positive T-cell line in vitro.

Additionally, we believe this preclinical data supports the potential expansion of the lacutamab development program into Adult T-cell leukemia/lymphoma, or ATLL, which is mostly prevalent in Asia, particularly in Japan. The data demonstrates that KIR3DL2 expression is mainly associated with the ATLL acute subtype, a subtype that is the most frequent and associated with the poorest prognosis.

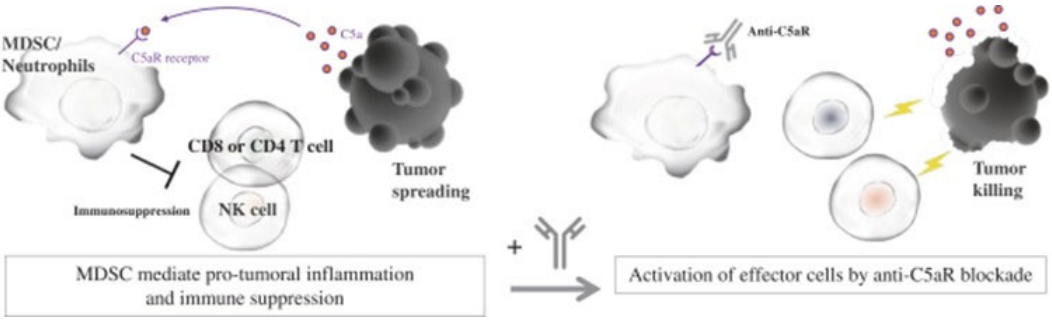
Avdoralimab (IPH5401), an Anti-C5aR Antibody Acting on Immunosuppressive Cells in the Tumor Microenvironment

Overview and Mechanism of Action

Our most advanced antibody targeting the tumor microenvironment is avdoralimab, which is designed to bind to and block the C5a receptor, or C5aR, a receptor that is expressed on MDSCs and neutrophils. Part of the innate immune system, these types of cells promote tumor growth by secreting inflammatory and angiogenic factors that promote blood vessel growth, potently suppress T cells and NK cells and hamper the activities of PD-1 checkpoint inhibitors. C5a, a factor in the complement cascade, is often overexpressed in tumors, where it attracts and activates MDSCs and neutrophils in the tumor microenvironment, promoting an immunosuppressive environment at the tumor bed. The table below shows the percentage of IO-resistant NSCLC patients with more than four times higher expression of C5 and C5aR1 than NSCLC patients that have not received prior IO treatment.

% of NSCLC patients with > 4-fold higher expression compared to IO-nalve patients (RNAseq)	**IO-Resistant (never responded)**	**IO-Secondary resistant (responded then progressed)**
C5 expression	6/24 (25%)	9/22 (40.9%)
C5aR expression	4/24 (16.7%)	7/22 (31.8%)

The image below depicts the mechanism of action of avdoralimab. Avdoralimab (IPH5401) is designed to bind to C5aR, thereby blocking its ability to bind to C5a. This blocking allows the CD8+ or CD4 T cells and NK cells, which would otherwise be suppressed by MDSC and neutrophils, to target and kill the tumor.



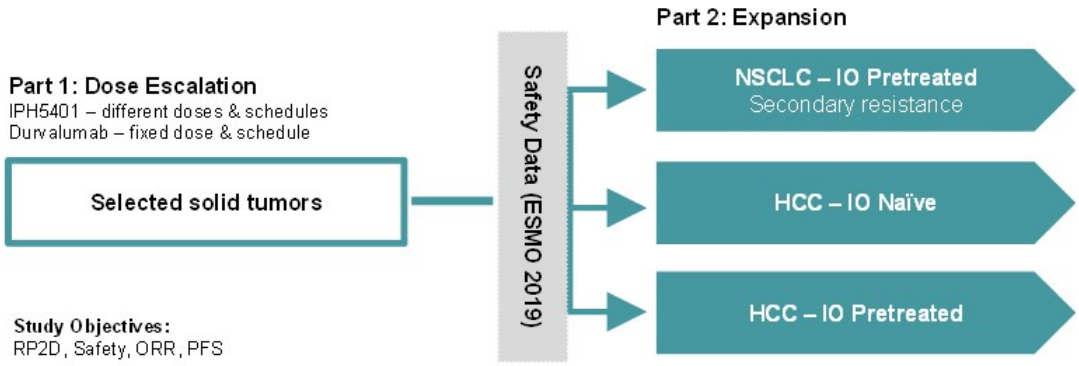
Our preclinical studies support development of avdoralimab in combination with PD-1 checkpoint inhibitors or other immunotherapies in cancer.

Clinical Development of avdoralimab

Trial	Status	Sponsor	Number of Patients	Indication(s)
Phase I/II clinical trial (STELLAR-001)	Ongoing	Innate Pharma	up to 140	Solid Tumors, NSCLC, HCC

In January 2018, we entered into a non-exclusive clinical trial collaboration with AstraZeneca with respect to avdoralimab. As part of this collaboration, we are conducting a multi-center, open label, dose-escalation and dose-expansion Phase I/II clinical trial (STELLAR-001) to evaluate the safety and efficacy of avdoralimab in combination with durvalumab, an anti-PD-L1 immune checkpoint inhibitor, as a treatment for patients with solid tumors, including non-small-cell lung carcinoma, or NSCLC, with secondary resistance to prior immuno-oncology treatment and IO-naïve hepatocellular carcinoma, or HCC. The trial is being conducted at two sites in the United States pursuant to an IND accepted by the FDA in May 2018 and at two sites in France pursuant to approval by ANSM. The first patient in this clinical trial was enrolled in September 2018. During the third quarter of 2019, the Company has decided to add an additional cohort testing avdoralimab in combination with durvalumab in IO-pretreated HCC patients, subject to regulatory approval. We expect to enroll up to 140 patients in total.

This trial consists of a dose-escalation part and three expansion cohorts. In the dose-escalation part, patients receive avdoralimab) in combination with 1,500 mg of durvalumab every 4 weeks. The first expansion cohort will evaluate the avdoralimab) and durvalumab combination in patients with NSCLC who are IO-pretreated; the second expansion cohort will evaluate the avdoralimab and durvalumab combination in patients with HCC who are IO-naïve; and the third expansion cohort will evaluate avdoralimab in combination with durvalumab in IO-pretreated HCC patients. The primary endpoints of this trial are assessment of DLTs for up to six weeks after treatment and AEs from screening through up to 30 days after the last dose of trial medication. Secondary endpoints include objective response rate according to RECIST 1.1, duration of response and progression-free survival. The graphic below depicts the trial design:



We reported preliminary safety data from this clinical trial at the 2019 ESMO annual meeting in the second half of 2019. This data evaluated 14 patients across four dose levels. Of these patients, six had NSCLC, five had HCC, two had urothelial carcinoma, or UCC, and one had renal cell carcinoma, or RCC.

In our STELLAR-001 clinical trial we observed that the combination of avdoralimab and durvalumab was well tolerated, and no DLTs were observed in the trial. Additionally, no dose relationship was observed regarding safety during the clinical trial. Finally, pharmacodynamic analyses confirmed full saturation of the C5a receptors at all dose levels and provided the basis for dose selection for the expansion cohorts. Early activity signals were also observed in HCC and NSCLC patients, including one confirmed partial response in an HCC patient with prior progression after nivolumab and one prolonged stable disease (40 weeks) in a NSCLC patient with prior progression after nivolumab.

	NSCLC	HCC	UCC	RCC	Total
Partial Response	0	1	0	0	1
Stable disease	3	1	0	1	5
Progression	2	3	1	0	6
NE(1)	1	0	1	0	2

(1) No post-baseline tumor evaluation.

As of August 26, 2019, one patient death due to tumor progression was reported but no treatment-related deaths were observed in this clinical trial. Treatment was discontinued due to tumor progression in 11 patients and due to a TEAE (pneumonitis) in one patient. Additionally, 84 AEs were reported among the 14 patients treated, of which 11 were grade 3 or 4 AEs and 20 were non-severe, grade 1 or 2 AEs. One SAE, exacerbation of chronic obstructive pulmonary disease, considered not to be related to avdoralimab) and durvalumab, was reported. Finally, five grade 1 or 2 AEs were reported as relating to avdoralimab treatment, which included fatigue, white blood cell count decrease, headache and dry mouth. There were no severe TEAEs relating to avdoralimab and no dose relationship was observed.

We are initiating an expansion cohort to evaluate avdoralimab in combination with durvalumab in IO-pretreated NSCLC patients and another expansion cohort to evaluate in combination with durvalumab in IO-naïve HCC patients. Based in part on our preliminary data, we have initiated a third expansion cohort in IO-pretreated HCC patients in the first half of 2020. Pursuant to our agreement, we and AstraZeneca are sharing the costs of this clinical trial on a 50/50 basis.

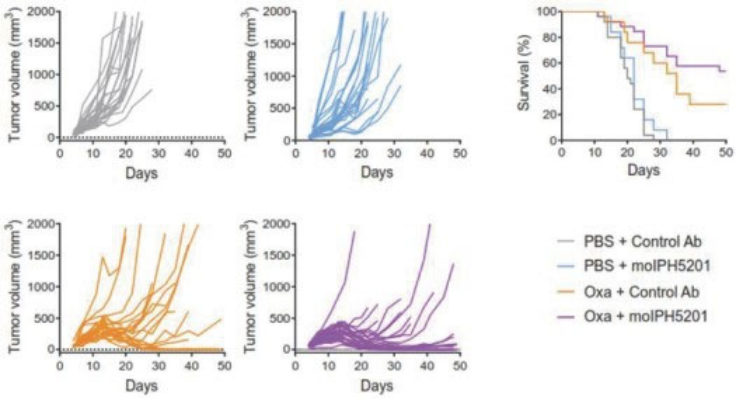
Avdoralimab for the Treatment of Inflammation

The complement system consists of a network of more than 50 different plasma and membrane associated proteins. It is a part of the innate immune system and plays a key role in host defense against pathogens as well as in tissue homeostasis. The anaphylatoxin C5a is formed upon cleavage of C5 during the process of complement activation. C5a is the most potent chemoattractant and induces recruitment and activation of different immune cells to inflamed tissue, among which are neutrophils, eosinophils, monocytes, basophils, and mast cells. In addition, release of C5a increases blood vessel permeability, chemokine release from neutrophils, and expression of adhesion molecules on endothelial cells. All of these processes facilitate further immune cell recruitment into inflamed tissue and local inflammation. Unsuitable activation of the complement cascade and production of C5a are associated with inflammatory conditions including several types of vasculitis, systemic lupus erythematous, rheumatoid arthritis, ischemia/reperfusion injury, hydradenitis suppurativa, psoriasis, acne, and urticaria.

IPH5201, an Anti-CD39 Antibody Targeting the Immunosuppressive Adenosine Pathway

We are developing a CD39-blocking monoclonal antibody known as IPH5201. In preclinical models using both primary human cells and tumor mouse models, we observed that the blockade of CD39 could stimulate anti-tumor immunity across a wide range of tumors by preventing the production of adenosine and by promoting the accumulation of extracellular adenosine triphosphate, or ATP, in the tumor microenvironment. CD39 is a membrane-bound extracellular enzyme that is expressed on the surface of regulatory T cells, B cells, myeloid cells and endothelial cells, and is upregulated on immune cells in tumor tissue. CD39 inhibits the immune system by degrading ATP into adenosine monophosphate, or AMP, that is then further degraded into adenosine by CD73. Within the tumor microenvironment, ATP promotes immune-cell mediated killing of cancer cells, and accumulation of ATP is beneficial for enhancing anti-tumor immune responses. However, ATP degradation and adenosine accumulation causes immune suppression and dysregulation of immune cells, which results in the spreading of tumors. By promoting the accumulation of immune-stimulating ATP, and preventing the production of immune-suppressive adenosine, we believe that the blockade of CD39 may stimulate anti-tumor activity across a wide range of tumors.

This rationale is supported by our preclinical data for IPH5201 in mouse tumor models and by the analysis of anti-tumor immune responses in tumor-challenged CD39 knock-out mice. In this model, significant tumor responses were observed in response to treatment with PD-1 inhibitors and ADCC-inducing antibodies, as well as with immunogenic chemotherapy, compared to responses to these agents in wild-type mice. The following images show the results of human CD39 knock-in mouse tumor model. The four graphs on the left show changes in tumor volume over time depending on the type of treatment group, which included a control group (gray), an IPH5201 (mouse version) group (blue), an oxaliplatin group (orange) and an oxaliplatin and IPH5201 combination group (purple). The diagram below outlines survival among these four treatment groups.



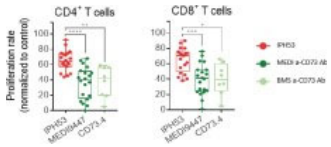
Other preclinical data showed that, in human tumors, CD39 is strongly upregulated on the tumor infiltrating lymphocytes, or TILS, which could contribute to immunosuppression. In in vitro preclinical models with human immune cells, IPH5201 restored T cell proliferation by blocking ATP-degradation into adenosine. Additionally, IPH5201 enhanced ATP-mediated dendritic cell activation in preclinical models, resulting in T-cell proliferation.

These data were presented at the AACR 2018 annual meeting and were published in May 2019. In 2019, an IND was successfully submitted for IPH5201. A Phase I first-in-human, multicenter, open-label, dose-escalation study evaluating IPH5201 in monotherapy and in combination with durvalumab (anti-PD-L1) with or without oleclumab (anti-CD73) in advanced solid tumors commenced in the first half of 2020 and is being conducted by AstraZeneca. Following the dosing of the first patient on March 9, 2020 in the IPH5201 Phase I clinical trial, AstraZeneca made a $5 million milestone payment to Innate under the companies' October 2018 multi-product oncology development collaboration. Innate will make a €2.7 million milestone payment to Orega Biotech SAS pursuant to Innate's exclusive licensing agreement. AstraZeneca decided to temporarily pause enrollment of the Phase I clinical trial evaluating IPH5201, an anti-CD39 blocking monoclonal antibody, in adult patients with advanced solid tumors, due to the COVID-19 pandemic.

IPH5301, an Anti-CD73 Antibody Targeting the Immunosuppressive Adenosine Pathway

We are developing a CD73 blocking antibody for immuno-oncology known as IPH5301. CD73 plays a significant role in promoting immunosuppression through the pathway degrading ADP into adenosine. CD73 blockade promotes anti-tumor immunity by reducing adenosine accumulation. We have generated a panel of novel anti-CD73 antibodies and, in the first half of 2018, selected a lead product candidate from this program, IPH5301, due to a combination of parameters including affinity for CD73, inhibition of CD73 enzymatic activity and its chemistry, manufacturing and control profile. We presented preclinical data further supporting the rationale of developing IPH5301, including in combination with IPH5201, at the AACR 2018 annual meeting. These data were also published in May 2019. IPH5301 has been observed to have a differentiated and superior activity compared to benchmark antibodies that are currently in clinical development.

IPH5301 is more potent in restoring CD4+ and CD8+ T cell proliferation in an ATP-suppression assay, than the most advanced clinical candidates.



We plan to file an IND for IPH5301 in the first half of 2020.

Additional Preclinical Programs

We have a robust pipeline of additional preclinical product candidates across our three development pillars. Within our preclinical pipeline, four programs are being developed under an option agreement with AstraZeneca including IPH43, an anti-MICA/B anti-body conjugate, the anti-Siglec-9 anti-body program, and two other programs with undisclosed targets: a multi-specific NKp46 NKCE program and IPH25, a checkpoint inhibitor. Another NKCE program, IPH61, is being developed in collaboration with Sanofi.

IPH43: Anti-MICA/B Antibody and Tumor Targeting Antibody Program

We are developing IPH43 as an antibody-drug conjugate targeting MICA/B for the treatment of oncology indications. MICA/B molecules bind to the NKG2D activating receptor and are specifically expressed on several highly prevalent solid tumors types including in the breast, colon and lung. We believe an antibody that kills MICA/B-expressing tumor cells could potentially treat these cancers by eliminating tumor cells. Because MICA/B molecules are highly polymorphic and therefore frequently subject to genetic variation, we have generated a series of high affinity antibodies recognizing equivalently the most frequent genetic variants of MICA/B. We chose to target MICA/B using an ADC format because it allows the elimination of tumor cells in the condition in which the tumor is not infiltrated by immune cells, known as an immune desert. This program is in preclinical development.

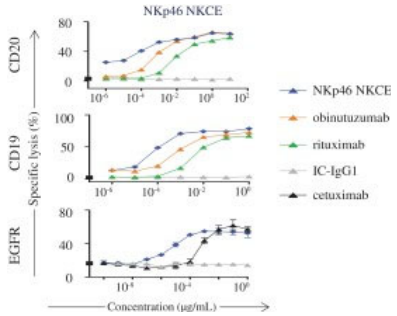
Anti-Siglec-9 – Checkpoint Inhibitor Program

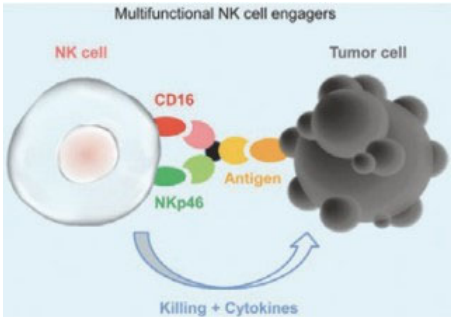
We are exploring the possibility of developing an antibody designed to reduce the effects of the Siglec-9 receptor for the treatment of cancer. Siglec-9 is an inhibitory checkpoint that is expressed on a broad range of immune cells, including NK cells and myeloid cells such as dendritic cells, monocytes and neutrophils. Siglec-9 can interact with sialic acids expressed by tumors, leading to a reduced immune cell function that allows tumors to proliferate. In our preclinical studies, we observed that antibodies designed to block Siglec-9's interaction with its ligands enhanced NK cell cytotoxicity. We have also observed in our preclinical studies that Siglec-9 is highly expressed on monocytes and dendritic cells and upregulated on T cells in cancer patients, suggesting a potential additional role as an inhibitory checkpoint agent. This program is in preclinical development.

NKp46 NK Cell Engagers

Multispecific monoclonal antibodies, or multispecifics, are antibody-derived formats that can simultaneously bind to two or more different types of molecules. A number of studies of bispecific antibodies are currently underway, such as those assessing the safety and efficacy of bispecific T cell engagers, such as BiTEs, which engage T cells via the antigen receptor on one-side of the bispecific T cell engager, and a tumor antigen on the other side of the BiTE. These molecules have demonstrated the ability to reduce or slow the growth of tumors in cancer patients, but also carry a significant toxicity risk. This toxicity risk occurs by engaging all T cells, irrespective of their specificity and development status, potentially leading to an overt production of cytokines by these T cells, referred to as a cytokine storm. In parallel, bispecific killer cell engagers, or BiKEs, that engage CD16 receptors found on NK cells, and trispecific killer cell engagers, or TriKEs, that engage CD16 receptors and contain IL-15, a cytokine that promotes NK cell activation and survival, have also been developed to target antigens expressed on solid tumors. BiKEs and TriKEs can be effective both in vitro and in vivo preclinical models. These multifunctional molecules that engage NK cells could reduce the risks associated with toxicity, as NK cell counts only represent approximately 10% of T cell counts, thereby potentially limiting the likelihood of inducing a cytokine storm. However, it remains unclear whether these multifunctional CD16 engager antibodies can activate NK cells in solid tumors since they often express low levels of CD16.

We have developed trifunctional NKCEs to co-engage NKp46 and CD16 on NK cells together with a tumor antigen. In our preclinical studies, we observed that NKp46 NKCEs have stronger anti-tumor activity as compared to preclinical findings from other approved anti-tumor therapeutic antibodies, such as rituximab, Fc-enhanced obinutuzumab and cetuximab. Additionally, preclinical results indicate that trifunctional NKCEs promoting NKp46 and CD16 receptors simultaneously with the same molecule are more potent than a mixture of bispecific reagents activating NKP46 and CD16 separately, and can efficiently promote NK cell mediated tumor cell lysis without inducing potentially toxic off-target effects. We believe these results support the clinical development of NKCEs for cancer immunotherapy, as a complement to existing immuno-oncology approaches. The following images depict the mechanism of action of these multifunctional NK cell engagers and our preclinical results.





IPH61 is an NKp46 NKCE developed as part of our research collaboration and licensing agreement with Sanofi for the generation and evaluation of up to two NKp46 NKCEs, using Sanofi's technology and tumor targets and our NK cell engager technology. Under the terms of the agreement, Sanofi is responsible for the development, manufacturing and commercialization of products resulting from the research collaboration. We are eligible to receive payments of up to €400.0 million primarily upon the achievement of development and commercial milestone as well as royalties ranging from a mid to high single-digit percentage on net sales.

IPH25 - Checkpoint Inhibitor Program

We are conducting preclinical studies to explore the possibility of developing an antibody designed to block an undisclosed receptor for the treatment of cancer. The target for IPH25 is an inhibitory checkpoint that is expressed on a broad range of immune cells, including NK cells, CD8+ T cells, B cells and mononuclear myeloid cells such as dendritic cells and monocytes. The target's receptor has been observed on various tumor types and on tumor-infiltrating immune cells such as tumor-promoting M2 macrophages and it is mostly associated with poor disease outcome. In preclinical models, blocking antibodies directed against the IPH25 target reversed immune suppression, promoted an antitumor immune response and enhanced the potency of other cancer therapies.

Competition

The biotechnology and pharmaceutical industry, and notably the cancer field, is characterized by rapidly advancing technologies, products protected by intellectual property rights and intense competition and is subject to significant and rapid changes as researchers learn more about diseases and develop new technologies and treatments. While we believe that our technology, knowledge, experience, collaborations and scientific resources provide us with competitive advantages, we face potential competition from many different sources, including major pharmaceutical, specialty pharmaceutical and biotechnology companies, academic institutions and governmental agencies and public and private research institutions. Any approved product that we commercialize will compete with existing therapies and new therapies that may become available in the future.

There are a large number of companies developing or marketing treatments for cancer, including many major pharmaceutical and biotechnology companies. Many of our competitors have significantly greater experience, personnel and resources as it relates to research, drug development, manufacturing and marketing. In particular, large pharmaceutical laboratories have substantially more experience than we do in conducting clinical trials and obtaining regulatory authorizations. Mergers and acquisitions in the pharmaceutical, biotechnology and diagnostic industries may result in even more resources being concentrated among a smaller number of our competitors. Smaller or early-stage companies may also prove to be significant competitors, particularly through collaborative arrangements with large and established companies. These competitors are also likely to compete with us to recruit and retain top qualified scientific and management personnel, acquire rights for promising product candidates and technologies, establish clinical trial sites and patient registration for clinical trials, acquire technologies complementary to, or necessary for, our programs and enter into collaborations with potential partners who have access to innovative technologies.

Our commercial opportunity could be reduced or eliminated if our competitors develop and commercialize products that are more effective, have a better safety profile, are more convenient, have a broader label, have more robust intellectual property protection or are less expensive than any products that we may develop. Our competitors also may obtain regulatory approval for their products more rapidly than we may obtain approval for ours, which could result in our competitors establishing a strong market position before we are able to enter the market. In addition, our competitors could be more efficient in manufacturing or more effective in marketing their own products than we or our partners may be in the future.

With respect to our lead product candidate, monalizumab, a novel dual-targeting checkpoint inhibitor, there are several pharmaceutical companies marketing and developing treatments for either SCCHN or MSS-CRC. For SCCHN, Erbitux (cetuximab), marketed by Eli Lilly, and checkpoint inhibitors Opdivo (nivolumab) and Keytruda (pembrolizumab), marketed by Bristol-Myers Squibb and Merck, respectively, have all been approved in the second line setting. For CRC, Stivarga (regorafenib), marketed by Bayer, and Lonsurf (trifluridine/tipiracil), marketed by Taiho Oncology, are both approved in the third line or later setting.

With respect to Lumoxiti, our marketed product for the treatment of HCL, there is currently no established standard of care and very few treatment options available in the third line and later setting. The National Comprehensive Cancer Network, or NCCN, guidelines for HCL, updated in January 2019, recommend that patients who are third line or later in treatment be considered for Lumoxiti as well as participation in clinical trials of vemurafenib, with or without rituximab, or ibrutinib. Vemurafenib, rituximab and ibrutinib have not been approved by the FDA for the treatment of HCL.

With respect to lacutamab, our monoclonal antibody product candidate targeting KIR3DL2, we are aware of several pharmaceutical companies marketing and developing products for the treatment of patients with CTCL, including MF and Sézary syndrome, and PTCL. Two new drugs have been recently approved by the FDA for CTCL: Adcetris (brentuximab vedotin), marketed by Seattle Genetics and approved in combination with chemotherapy for treatment of patients with primary cutaneous anaplastic large cell lymphoma (pcALCL) or CD30-expressing MF who have received prior systemic therapy, and Poteligeo (mogamulizumab), marketed by Kyowa Kirin and approved for the treatment of adult patients with R/R MF or Sézary syndrome after at least one prior systemic therapy. Zolinza (vorinostat) is the only drug approved by the FDA for CTCL patients after two prior failures. In the second line setting of PTCL, Beleodaq (belinostat), Folotyn (pralatrexate) and Istodax (romidepsin) have all been approved by the FDA; however, none of these treatments have been approved by the EMA.

There are also several pharmaceutical and biotechnology companies that are focused on the tumor microenvironment, including the complement and the adenosine pathways. The C5a and C5aR pathways have attracted efforts mainly in inflammation, but we are aware of some companies targeting C5a or C5aR in the oncology settings as well, such as MorphoSys AG and InflaRx N.V. Many companies are active in the adenosine pathway, targeting CD73, CD39 or the adenosine receptors. For example, Bristol-Myers Squibb and AstraZeneca each have anti-CD73 product candidates in clinical development, and several other biotechnology companies are active in the adenosine pathway area, including Tizona Therapeutics, Inc., AbbVie Inc., Corvus Pharmaceuticals, Inc., Arcus Biosciences, Inc. and Surface Oncology, Inc.

NK cells have been increasingly researched and we are aware of many companies addressing NK cells through different approaches such as cell therapies (Fate Therapeutics, Inc., NantKwest, Inc.) and multispecifics (Affimed N.V., Dragonfly Therapeutics, Inc.)

Intellectual Property

Our commercial success depends in part on obtaining and maintaining patent, trade secret and other intellectual property and proprietary protection of our technology, current and future products and product candidates and methods used to develop and manufacture them. We cannot be sure that patents will be granted with respect to any of our pending patent applications or to any patent applications filed by us in the future, nor can we be sure that any of our existing patents or any patents that may be granted to us in the future will be sufficient to protect our technology or will not be challenged, invalidated or circumvented. Our success also depends on our ability to operate our business without infringing, misappropriating or otherwise violating any patents and other intellectual property or proprietary rights of third parties.

We rely, in some circumstances, on trade secrets to protect our technology. However, trade secrets can be difficult to protect. We seek to protect our trade secrets, in part, by confidentiality agreements with our employees, consultants, scientific advisors and contractors. These agreements may not provide meaningful protection or may be breached, and we may not have an adequate remedy for any such breach. We also seek to preserve the integrity and confidentiality of our data and trade secrets by maintaining physical security of our premises and physical and electronic security of our information technology systems. Notwithstanding these measures, these agreements and systems may be breached, and we may not have adequate remedies for any such breach. In addition, our trade secrets may otherwise become known or be independently discovered by competitors, or misused by any collaborator to whom we disclose such information. Despite any measures taken to protect our intellectual property, unauthorized parties may attempt to copy aspects of our products or drug candidates or obtain or use information that we regard as proprietary. As a result, we may be unable to meaningfully protect our trade secrets and proprietary information. To the extent that our employees, consultants, contractors or partners use intellectual property owned by others in their work for us, disputes may arise as to the rights in related or resulting know-how and inventions. For more information regarding the risks related to intellectual property, please see “Risk Factors—Risks Related to Intellectual Property Rights.”

Patents

We file patent applications to protect our product candidates, technical processes and the processes used to prepare our product candidates, the compounds or molecules contained in these product candidates and medical treatment methods. We also license rights to patents owned by third parties, academic partners or other companies in our field.

Moxetumomab pasudotox-tdfk (Lumoxiti)

As of December 31, 2019, the principal intellectual property rights related to Lumoxiti are in-licensed from AstraZeneca and include U.S. Patent No. 10,072,083, which is directed to the composition of matter of Lumoxiti, and its counterpart European patent EP 2 613 857 B1, which is directed to the manufacture of Lumoxiti. These patents have a statutory expiration date in 2031, not including patent term adjustment or any potential patent term extension.

Monalizumab/IPH22

As of December 31, 2019, the principal intellectual property rights related to monalizumab are in-licensed from Novo Nordisk A/S and include U.S. Patent Nos. 8,206,709 and 8,901,283, European patents EP 2 038 306 B1 and EP 2 426 150 B1 and counterpart patents in certain other countries. These patents are directed to the composition of matter of monalizumab and have a statutory expiration date in 2027, not including patent term adjustment or any potential patent term extension.

Lacutamab/Anti-KIR3DL2

As of December 31, 2019, the principal intellectual property rights related to lacutamab are wholly owned by us and include U.S. Patent No. 10,280,222, European patent EP 3 116 908 B1 and counterpart patent applications in certain other countries. These patents and patent applications are directed to the composition of matter of lacutamab, and such patents have, and any patents that issue from such applications would have, a statutory expiration date in 2035, not including patent term adjustment or any potential patent term extension.

Avdoralimab/Anti-C5aR

As of December 31, 2019, the principal intellectual property rights related to avdoralimab are in-licensed from Novo Nordisk A/S and include U.S. Patent Nos. 8,613,926, 8,846,045 and 10,323,097, European patent EP 2 718 322 B1 and counterpart patents and patent applications in certain other countries. These patents and patent applications are directed to the composition of matter of avdoralimab, and such patents have, and any patents that issue from such applications would have, a statutory expiration date in 2032, not including patent term adjustment or any potential patent term extension.

IPH5201/Anti-CD39

As of December 31, 2019, the principal intellectual property rights related to IPH5201 are wholly owned by us and include one U.S. non-provisional patent application, one international Patent Cooperation Treaty patent application, and other patent applications in certain other countries. If a patent directed to IPH5201 issues from such U.S. patent application, it would have a statutory expiration date in 2039, not including patent term adjustment or any potential patent term extension.

The term of individual patents depends upon the legal term of patents in the countries in which they are obtained. In most countries, including the United States, the patent term is 20 years from the earliest claimed filing date of a non-provisional patent application or its foreign equivalent in the applicable country. In the United States, a patent's term may, in certain cases, be lengthened by patent term adjustment, which compensates a patentee for administrative delays by the USPTO in examining and granting a patent, or may be shortened if a patent is terminally disclaimed over a commonly owned patent or a patent naming a common inventor and having an earlier expiration date. In the United States, a patent may also be eligible for limited patent term extension under the Drug Price Competition and Patent Term Restoration Act of 1984, or Hatch-Waxman Amendments. The Hatch-Waxman Amendments permit a patent extension term of up to five years as compensation for patent term lost during the FDA regulatory review process. A patent term extension cannot extend the remaining term of a patent beyond a total of 14 years from the date of product approval, only one patent applicable to each regulatory review period may be extended and only those claims covering the approved drug, a method for using it, or a method for manufacturing it may be extended.

Trademarks

We own the mark INNATE PHARMA in the United States, Australia and Europe (EU community trademark), and INNATE in Europe (EU community trademark) as well as the mark LUMOXITI and a figurative mark associated with the Lumoxiti product in the United States, Europe (EU community trademark) and other countries throughout the world.

Regulation

Research and development work, preclinical tests, clinical studies, facilities, and the manufacture and sale of our products are and will continue to be subject to the complex legislative and regulatory provisions implemented by the various public authorities in Europe, the United States and other countries. The EMA, FDA and the various national regulatory authorities impose considerable constraints on the development, manufacture and sale of products that we develop and clinical trials we conduct. In case of non-compliance with these regulations, the regulatory authorities may impose fines, seize or remove products from the market or even partially or totally suspend their production. They may also revoke previously granted marketing authorizations, reject authorization applications. These regulatory constraints are important in considering whether an active ingredient can ultimately become a drug, as well as for recognizing the time and investments necessary for such development.

Although there are differences from one country to another, the development of therapeutic products for human use is subject to similar procedures and must comply with the same types of regulations in all ICH countries (countries part of the International Council for Harmonisation of Technical Requirements for Registration of Pharmaceuticals for Human Use). In order to obtain marketing authorization for a product, proof of its efficacy and safety should be provided by the applicant, along with detailed information on its composition and manufacturing process. This entails significant pharmaceutical and preclinical developments, clinical trials and laboratory tests. The development of a new drug from fundamental research to marketing comprises five steps: (i) research, (ii) preclinical trials, (iii) clinical trials in humans, (iv) marketing authorization and (v) marketing.

Preclinical studies

Preclinical studies include laboratory evaluation of the purity and stability of the manufactured substance or active pharmaceutical ingredient and the formulated product, as well as in vitro and animal studies to assess the safety and activity of the product candidate for initial testing in humans and to establish a rationale for therapeutic use. The conduct of preclinical studies is subject to federal regulations and requirements, including Good Laboratory Practices (GLP) regulations. The results of the preclinical tests, together with manufacturing information, analytical data, any available clinical data or literature and plans for clinical studies, among other things, are submitted to the applicable regulatory agency in connection with the application to begin human testing. Some long-term preclinical testing, such as animal tests of reproductive adverse events and carcinogenicity, and long-term toxicity studies, may continue after submission of the application.

Regulation of clinical trials

In humans, clinical trials are usually carried out in three phases that are generally sequential, but under unique circumstances phases of trials can overlap or even be skipped, following a specific review and determination by regulatory agencies. Clinical trials are sometimes necessary after marketing authorization to explain certain side-effects, investigate a specific pharmacological effect, obtain more accurate or additional data. Additional trials are also commonly conducted to explore new indications. Regulatory authorization is needed to carry out clinical trials. The regulatory authorities may block, suspend or require significant modifications to the clinical study protocols submitted by companies seeking to test products.

Clinical trial authorization in the European Union

The current regulation relating to clinical trials is governed by European Directive 2001/20/EC of April 4, 2001 on clinical trials, which has been transposed into national legislation by all European Union Member States.

The 2001 Directive cited above has been revised and replaced by the Clinical Trials Regulation EU No. 536/2014 of April 16, 2014, which aims at harmonizing and streamlining the clinical trials authorization process. The Clinical Trial Regulation EU No. 536/2014 of April 16, 2014 entered into force on June 16, 2014. However, the regulation will not become applicable until the publicly available EU database and EU portal are fully functional and have been confirmed through an independent audit. The new regulation will become applicable six months after the European Commission publishes notice of this confirmation. Due to technical difficulties with the development of the IT systems, the portal's go-live date had to be postponed and therefore the Clinical Trials Regulation are expected to come into application in the course of 2022. It will apply to interventional clinical trials on medicinal products and to clinical trials authorized under the current 2001 Directive still ongoing three years after the Clinical Trial Regulation has come into operation.

The Clinical Trial Regulation will allow better consistency throughout EU Member States:

- Single submission of the clinical trial application dossier through the EU Portal (Article 5) including a common part assessed jointly by all participating EU Member States, and a national part covering the ethical and operational aspects of the trial assessed by each EU Member State independently.

- A clinical trial authorization will be issued in the form of a single decision by each EU Member State concerned (Article 4).

The Clinical Trials Regulation will apply in the Member States without the requirement for separate implementing legislation by each Member State, but some of the existing laws of the Member States applicable at a national level will continue to apply.

This new regulation will also increase transparency of authorized clinical trials in the European Union: the European Union database will serve as the source of public information, without prejudice of personal data protection, commercially confidential information protection, and protection of confidential communication between Member State and trial supervision between Member States. Public information will include clinical trial authorization information, protocol data, and a summary of the results 12 months after the end of the trial (or six months in case of pediatric clinical trials).

Clinical trial authorization in the United States

In the United States, an Investigational New Drug application, or IND, must be submitted to the FDA and accepted before clinical trials can start on humans. An IND is an exemption from the Federal Food, Drug, and Cosmetic Act, or FDCA, that allows an unapproved product candidate to be shipped in interstate commerce for use in an investigational clinical trial and a request for FDA authorization to administer an investigational product to humans. This application contains early research data as well as the pharmaceutical dossier, preclinical and clinical data (if any) and includes the clinical protocol. If there is no objection from the FDA, the IND application becomes valid 30 days after it is received by the FDA. This waiting period is designed to allow the FDA to review the IND to determine whether human research subjects will be exposed to unreasonable health risks. At any time during or subsequent to this 30-day period, the FDA may request the suspension of clinical trials, whether such trials are planned or in progress, and request additional information. This temporary suspension continues until the FDA receives the information it has requested.

In addition to the foregoing IND requirements, an independent institutional review board, or IRB, representing each institution participating in the clinical trial must review and approve the plan for any clinical trial before it commences at that institution, and the IRB must conduct continuing review and reapprove the study at least annually. The IRB must review and approve, among other things, the study protocol and informed consent information to be provided to study subjects. An IRB must operate in compliance with FDA regulations. An IRB can suspend or terminate approval of a clinical trial at its institution, or an institution it represents, if the clinical trial is not being conducted in accordance with the IRB's requirements or if the product candidate has been associated with unexpected serious harm to patients.

The FDA's primary objectives in reviewing an IND are to assure the safety and rights of patients and to help assure that the quality of the investigation will be adequate to permit an evaluation of the biological product's safety, purity and potency. The decision to terminate development of an investigational biological product may be made by either a health authority body such as the FDA, an IRB or ethics committee, or by us for various reasons. Additionally, some trials are overseen by an independent group of qualified experts organized by the trial sponsor, known as a data safety monitoring board or committee. This group provides authorization for whether or not a trial may move forward at designated check points based on access that only the group maintains to available data from the study. Suspension or termination of development during any phase of clinical trials can occur if it is determined that the participants or patients are being exposed to an unacceptable health risk. Other reasons for suspension or termination may be made by us based on evolving business objectives and/or competitive climate.

Good clinical practices (GCP)

In most countries, clinical trials must comply with the cGCP standards as defined by the International Council for Harmonization of Technical Requirements for Registration of Pharmaceuticals for Human Use, or ICH. Directive 2005/28/EC dated April 8, 2005 adopted the cGCP principles in the context of strengthening the regulatory structure specified by Directive 2001/20/EC. The competent authority designated in each Member Country to authorize clinical trials must take into consideration, among other factors, the scientific value of the study, the safety of the participants and the possible responsibility of the clinical site.

Conducting clinical trials

Clinical trials must be carried out in compliance with complex regulations throughout the various phases of the process, based on the principle of informed consent by the patient to whom the products will be administered.

Clinical trial phases

Clinical trials may be conducted in the United States, in Europe or in other parts of the world as long as such trials have been approved by health authorities and ethics committees in each country where the trial is conducted. There are three well-established and internationally-recognized clinical phases: Phase I, II and III. This classification is used by the FDA and the EMA, as well as other regulatory agencies. Each of these clinical phases is described below.

- Phase I: The product candidate is initially introduced into healthy human subjects and tested for safety, dosage tolerance, absorption, metabolism, distribution and excretion. In the case of some products for severe or life-threatening diseases, such as cancer, especially when the product may be too inherently toxic to ethically administer to healthy volunteers, the initial human testing is often conducted in patients. Sponsors sometimes designate their Phase I trials as Phase Ia or Phase Ib. Phase Ib trials are typically aimed at confirming dosing, pharmacokinetics and safety in larger number of patients. Some Phase Ib studies evaluate biomarkers or surrogate markers that may be associated with efficacy in patients with specific types of diseases.

- Phase II: This phase involves clinical trials in a limited patient population to identify possible adverse effects and safety risks, to preliminarily evaluate the efficacy of the product for specific targeted diseases and to determine dosage tolerance and appropriate dosage.

- Phase III: Clinical trials are undertaken to further evaluate dosage, clinical efficacy and safety in an expanded patient population at geographically dispersed clinical study sites. These clinical trials, generally comparative, are intended to establish the overall risk-benefit ratio of the product candidate and provide, if appropriate, an adequate basis for product labeling.

Post-approval trials, sometimes referred to as Phase IV studies, may be conducted after initial marketing approval. These trials are used to gain additional experience from the treatment of patients in the intended therapeutic indication. In certain instances, the applicable regulator may mandate the performance of Phase IV clinical trials as a condition of approval.

In specific situations, certain phases of development can be merged or even skipped when clear signs of efficacy emerge in the early phases of development and the product candidate is designed for patients with major unmet medical needs. However, these deviations from the standard pattern of development must be discussed and approved by health authorities. Given the high unmet medical need for certain cancer patients, deviations from the typical phases of development are frequent in oncology and in particular, in the field of immunotherapy.

Disclosure of clinical trial information

Sponsors of clinical trials of FDA-regulated drugs are required to register and disclose certain clinical trial information, which is publicly available at www.clinicaltrials.gov. Information related to the product, patient population, phase of investigation, study sites and investigators, and other aspects of the clinical trial is then made public as part of the registration. Sponsors are also obligated to disclose the results of their clinical trials after completion. Disclosure of the results of these trials can be delayed until the new product or new indication being studied has been approved. Competitors may use this publicly available information to gain knowledge regarding the progress of development programs.

Regulations concerning marketing authorizations

In order to be marketed, a drug product must have regulatory authorization (known as approval of a New Drug Application, or NDA, or a Biologics License Application, or BLA, in the United States and a Marketing Authorization, or MA, in the European Union). The competent authorities are the FDA in the United States and the EMA in Europe. Companies apply for an NDA/BLA or an MA based on quality, safety and efficacy. In Europe, the United States and Japan, the dossier is a standard dossier referred to as a CTD, or Common Technical Document. The file relating to the NDA/MA describes the manufacturing of the active substance, the manufacturing of the final product and the clinical and non-clinical studies.

United States review and approval process for biological products

In the United States, the FDA approves complex biological products under the Public Health Service Act, or PHSA. In order to obtain approval to market a biological product in the United States, a marketing application must be submitted to the FDA that provides data establishing the safety, purity and potency of the proposed biological product for its intended indication. The application includes all relevant data available from pertinent preclinical and clinical trials, including negative or ambiguous results as well as positive findings, together with detailed information relating to the product's chemistry, manufacturing, controls and proposed labeling, among other things. Data can come from company-sponsored clinical trials intended to test the safety and effectiveness of a use of a product, or from a number of alternative sources, including studies initiated by investigators. To support marketing approval, the data submitted must be sufficient in quality and quantity to establish the safety, purity and potency of the biological product to the satisfaction of the FDA.

The BLA is thus a vehicle through which applicants formally propose that the FDA approve a new product for marketing and sale in the United States for one or more indications. Every new product candidate must be the subject of an approved BLA before it may be commercialized in the United States. Under federal law, the submission of most BLAs is subject to an application user fee and the sponsor of an approved BLA is also subject to annual program user fees. These fees are typically increased annually. Certain exceptions and waivers are available for some of these fees, such as an exception from the application fee for products with orphan designation and a waiver for certain small businesses, an exception from the establishment fee when the establishment does not engage in manufacturing the product during a particular fiscal year, and an exception from the product fee for a product that is the same as another product approved under an abbreviated pathway.

Following submission of a BLA, the FDA conducts a preliminary review of the application generally within 60 calendar days of its receipt and strives to inform the sponsor by the 74th day after the FDA's receipt of the submission to determine whether the application is sufficiently complete to permit substantive review. The FDA may request additional information rather than accept the application for filing. In this event, the application must be resubmitted with the additional information. The resubmitted application is also subject to review before the FDA accepts it for filing. Once the submission is accepted for filing, the FDA begins an in-depth substantive review. The FDA has agreed to specified performance goals in the review process of BLAs. Under that agreement, 90% of applications seeking approval of New Molecular Entities, or NMEs, are meant to be reviewed within ten months from the date on which FDA accepts the application for filing., and 90% of applications for NMEs that have been designated for "priority review" are meant to be reviewed within six months of the filing date. For applications seeking approval of products that are not NMEs, the ten-month and six-month review periods run from the date that FDA receives the application. The review process and the Prescription Drug User Fee Act goal date may be extended by the FDA for three additional months to consider new information or clarification provided by the applicant to address an outstanding deficiency identified by the FDA following the original submission.

Before approving an application, the FDA typically will inspect the facility or facilities where the product is or will be manufactured. These pre-approval inspections may cover all facilities associated with a BLA submission, including component manufacturing, finished product manufacturing, and control testing laboratories. The FDA will not approve an application unless it determines that the manufacturing processes and facilities are in compliance with cGMP requirements and adequate to assure consistent production of the product within required specifications. Additionally, before approving a BLA, the FDA will typically inspect one or more clinical sites to assure compliance with GCP. In addition, as a condition of approval, the FDA may require an applicant to develop a Risk Evaluation and Mitigation Strategy, or REMS. REMS use risk minimization strategies beyond the professional labeling to ensure that the benefits of the product outweigh the potential risks. To determine whether a REMS is needed, the FDA will consider the size of the population likely to use the product, seriousness of the disease, expected benefit of the product, expected duration of treatment, seriousness of known or potential adverse events, and whether the product is a new molecular entity.

The FDA may refer an application for a novel product to an advisory committee or explain why such referral was not made. Typically, an advisory committee is a panel of independent experts, including clinicians and other scientific experts, that reviews, evaluates and provides a recommendation as to whether the application should be approved and under what conditions. The FDA is not bound by the recommendations of an advisory committee, but it considers such recommendations carefully when making decisions.

On the basis of the FDA's evaluation of the application and accompanying information, including the results of the inspection of the manufacturing facilities, the FDA may issue an approval letter or a complete response letter. An approval letter authorizes commercial marketing of the product with specific prescribing information for specific indications. A complete response letter generally outlines the deficiencies in the submission and may require substantial additional testing or information in order for the FDA to reconsider the application. If and when those deficiencies have been addressed to the FDA's satisfaction in a resubmission of the BLA, the FDA will issue an approval letter. The FDA has committed to reviewing such resubmissions in two or six months depending on the type of information included. Even with submission of this additional information, the FDA ultimately may decide that the application does not satisfy the regulatory criteria for approval.

If the FDA approves a product, it may limit the approved indications for use for the product, require that contraindications, warnings or precautions be included in the product labeling, require that post-approval studies, including Phase 4 clinical trials, be conducted to further assess the product's safety after approval, require testing and surveillance programs to monitor the product after commercialization, or impose other conditions, including distribution restrictions or other risk management mechanisms, including Risk Evaluation and Mitigation Strategy (REMS), which can materially affect the potential market and profitability of the product. The FDA may prevent or limit further marketing of a product based on the results of post-marketing studies or surveillance programs.

Registration procedures in Europe

To access the European markets through community procedures, drug products must be submitted through the Centralized Procedure, the Mutual Recognition Procedure or the Decentralized Procedure. The process for doing this depends, among other things, on the nature of the medicinal product. Regulation (EC) No 726/2004 of the European Parliament and of the Council of March 31, 2004 provides for the Centralized Procedure. The Centralized Procedure results in a single marketing authorization (MA), granted by the European Commission that is valid across the European Economic Area or EEA (i.e., the European Union as well as Iceland, Liechtenstein and Norway). The Centralized Procedure is compulsory for human drugs that are: (i) derived from biotechnology processes, (ii) contain a new active substance indicated for the treatment of certain diseases, such as cancer, HIV/AIDS, diabetes, neurodegenerative diseases, autoimmune and other immune dysfunctions and viral diseases, (iii) officially designated orphan medicines and (iv) advanced-therapy medicines, such as gene therapy, somatic cell therapy or tissue-engineered medicines.

Under Article 3 of the Regulation (EC) No 726/2004, the Centralized Procedure is optional for any medicinal product not appearing in the Annex if: (1) the medicinal product contains a new active substance which, on the date of entry into force of this Regulation, was not authorized in the EU; or (2) the applicant shows that the medicinal product constitutes a significant therapeutic, scientific or technical innovation or that the granting of authorization in accordance with this Regulation is in the interests of patients or animal health at EU level.

Under the Centralized Procedure in the European Union, the European Medicines Agency, or EMA, shall ensure that the opinion of the Committee for Medicinal Products for Human Use, or CHMP, is given within 210 days (Article 6.3). This excludes so-called clock stops, during which additional written or oral information is to be provided by the applicant in response to questions asked by the Committee for Medicinal Products for Human Use, or CHMP (Article 7). At the end of the review period, the Committee for Medicinal Products for Human Use (CHMP) of the EMA provides its opinion through a scientific assessment report to the European Commission. The Commission may then adopt a final decision to grant an MA. Once granted, the MA is valid across all EEA countries for an initial period of five years. Since 2008, as a consequence of a European directive, a marketing authorization is now renewed only once, five years after the initial registration. The marketing authorization shall be then valid for an unlimited period, unless the Commission decides, on justified grounds, relating to pharmacovigilance, to proceed with one additional five-year renewal.

When an application is submitted for a MA in respect of medicinal products for human use which are of major interest from the point of view of public health and in particular from the viewpoint of therapeutic innovation, the applicant may request an accelerated assessment procedure. The request shall be duly substantiated. If the CHMP accepts the request, the time-limit laid down in Article 6(3), first subparagraph, shall be reduced to 150 days (Article 14(9)).

National MAs, issued by the competent authorities of the member states of the EEA, are also available; however these only cover their respective territory. National MAs may be applied for through the Mutual Recognition Procedure or Decentralized Procedure in order that multiple competent authorities in different member states of the EEA may each issue a national MA in their territory for the same product on the back of the same application. National MAs are only available for products not falling within the mandatory scope of the Centralized Procedure.

It is possible for a drug to be withdrawn from the market, upon the request of the health authorities, if a serious problem arises, in particular a safety-related problem. The marketing authorization is then cancelled. There can be various reasons for the withdrawal of drugs from the market, with the main reasons being public health, major undesirable side effects and non-compliance with manufacturing rules.

Non-standard registration procedures

Aside from the standard procedures of granting a BLA or a European MA, as described above, there are non-standard registration procedures that allow a shorter time-to-market for new medicines.

The following expedited approval programs are in place in the United States:

- The Accelerated Approval is a program that is intended to make promising products for life threatening diseases available on the market on the basis of preliminary evidence prior to formal demonstration of patient benefit. The FDA evaluation is performed on the basis of a surrogate marker (a measurement intended to substitute for the clinical measurement of interest) that is considered likely to predict patient benefit. A result of substitution or marker ("surrogate endpoint") is a result of laboratory or physical sign that is not in itself a direct measure of the patient's feelings, its functions or survival, but which allows to anticipate a therapeutic benefit. The approval that is granted may be considered as a provisional approval with a written commitment to complete clinical studies that formally demonstrate patient benefit. This procedure is equivalent to the "conditional approval" in Europe.

- The Priority Review is given to drugs that offer major advances in treatment, or provide a treatment where no adequate therapy exists. A Priority Review means that the time it takes FDA to review a new drug application is reduced to six months rather than 10 months. This procedure is equivalent to the "accelerated approval" in Europe.

- The Fast Track Program refers to a process for interacting with FDA to facilitate the development and expedite the review of new drugs that are intended to treat serious or life-threatening conditions and that demonstrate the potential to address unmet medical needs. The advantages of this process include scheduled meetings to seek FDA input into clinical development plans and to collect appropriate data that will be needed to support approval. Fast Track designation does not necessarily lead to a Priority Review or Accelerated Approval.

- The Breakthrough Therapy Designation is aimed at accelerating the development and examination of drugs which are intended to treat serious illnesses and where the preliminary clinical evidence indicates that the drug may exhibit a substantial improvement over the available therapies with regard to clinically significant criterion (criteria).

A drug which is given the designation "Breakthrough Therapy" can benefit from the following:

- All of the features of the designation "Fast Track";

- Intensive support on a program for the development of effective drugs, from Phase I onwards; and

- Organizational commitment involving "FDA senior managers."

If research or additional studies show that a product presents a risk when it is marketed, the FDA may require its immediate withdrawal. In addition, FDA may withdraw approval for placing on the market for other reasons, especially if the studies after approval are not made with due care.

In Europe, non-standard registration procedures under the Centralized Procedures are as follows:

- Conditional approval: valid only one year instead of five. It is granted only if the benefit / risk ratio is positive, that is if the product responds to unmet medical needs, and if the benefits to public health outweigh the risks associated with uncertainty because of an incomplete evaluation of the drug (for instance, because of clinical trials still ongoing at the time of the evaluation, or when additional clinical trials are needed). This temporary character may be renewed if an appropriate report to support this is provided by the sponsor. Once the pending studies are provided, it can become a "regular" marketing authorization.

- Approval under exceptional circumstances: a marketing authorization may be granted in exceptional cases, reviewed each year to reassess the risk-benefit balance when the initial dossier for assessment of the drug cannot contain all required data, when for instance the condition to be treated is rarely encountered.

- Accelerated approval: the evaluation process is accelerated (150 days instead of 210 days) when a drug is of major interest from the standpoint of public health.

Orphan drugs

Orphan drugs are drugs used for the prevention or treatment of deadly or serious rare conditions. In the United States, the 1983 Orphan Drug Act is intended to encourage the development of treatments for orphan diseases. The FDA grants the status of orphan drug to any drug aimed at treating diseases affecting fewer than 200,000 people a year in the United States, or more in cases in which there is no reasonable expectation that the cost of developing and making a product available in the United States for treatment of the disease or condition will be recovered from sales of the product. The Orphan Drug Act also provides the possibility of obtaining grants from the American government to cover clinical trials, tax credits to cover research costs, a possible exemption from application fees when filing for registration with the FDA, and a seven-year exclusivity if a marketing authorization is granted. If a product with orphan designation receives the first FDA approval for the disease or condition for which it has such designation or for a select indication or use within the rare disease or condition for which it was designated, the product generally will receive orphan drug exclusivity. Orphan drug exclusivity means that the FDA may not approve another sponsor's marketing application for the same drug for the same indication for seven years, except in certain limited circumstances. Orphan exclusivity does not block the approval of a different product for the same rare disease or condition, nor does it block the approval of the same product for different indications. If a biologic designated as an orphan drug ultimately receives marketing approval for an indication broader than what was designated in its orphan drug application, it may not be entitled to exclusivity. Orphan exclusivity will not bar approval of another product under certain circumstances, including if a subsequent product with the same biologic for the same indication is shown to be clinically superior to the approved product on the basis of greater efficacy or safety, or providing a major contribution to patient care, or if the company with orphan drug exclusivity is not able to meet market demand.

In Europe, equivalent legislation has been adopted to promote treatments for rare diseases (Regulation 141/2000/EC of December 16, 1999, as amended by Regulation 847/2000/EC of April 27, 2000). A medicinal product may be designated as orphan if: (a) it is intended for the diagnosis, prevention or treatment of a life-threatening or chronically debilitating condition affecting not more than five in 10,000 persons in the European Union when the application is made, or (b) that is intended for the diagnosis, prevention or treatment of a life-threatening, seriously debilitating or serious and chronic condition in the European Union and that without incentives it is unlikely that the marketing of the medicinal product in the European Union would generate sufficient return to justify the necessary investment.

For either of these conditions, the applicant must demonstrate that there exists no satisfactory method of diagnosis, prevention or treatment of the condition in question that has been authorized in the EU or, if such method exists, the medicinal product will be of significant benefit to those affected by that condition.

Medicinal products receiving orphan designation in the European Union can receive ten years of market exclusivity, during which time no similar medicinal product may be placed on the market for the same therapeutic indication. An orphan product can also obtain an additional two years of market exclusivity in the European Union for pediatric studies (in this case for orphan drugs no extension to any supplementary protection certificate can be granted, see further detail below). Orphan medicinal products are also eligible for financial incentives such as reduction of fees or fee waivers and scientific assistance for study proposals. (Articles 6 and 9 of the above-mentioned regulation). The application for orphan drug designation must be submitted before the application for marketing authorization (Article 5). The applicant will receive a fee reduction for the marketing authorization application if the orphan drug designation has been granted, but not if the designation is still pending at the time the marketing authorization is submitted. Orphan drug designation does not convey any advantage in, or shorten the duration of, the regulatory review and approval process.

If the product obtains orphan drug status, it is granted an exclusive 10-year marketing period during which no similar product may apply for a marketing authorization in the European Union for the same indication, as well as an exemption from regulatory fees and other advantages. The 10-year market exclusivity may be reduced to six years if, at the end of the fifth year, it is established that the product no longer meets the criteria for orphan designation, for example, if the product is sufficiently profitable not to justify maintenance of market exclusivity (Article 8). However, marketing authorization may be granted to a similar medicinal product for the same indication at any time if:

- the holder of the MA for the original orphan medicinal product has given its consent to the second applicant;
- the holder of the MA for the original orphan medicinal product cannot supply sufficient quantities of the orphan medicinal product; or

- the second applicant can establish in the application that its product, although similar to the orphan medicinal product already authorized, is safer, more effective or otherwise clinically superior.

Marketing authorization may also be granted to a similar medicinal product with the same orphan indication if the product is safer, more effective or otherwise clinically superior to the original orphan medicinal product. The period of market exclusivity may, in addition, be reduced to six years if it can be demonstrated on the basis of available evidence that the original orphan medicinal product is sufficiently profitable not to justify maintenance of market exclusivity.

Registration procedures outside of Europe and the United States

In addition to regulation in the United States and Europe, a variety of foreign regulations govern clinical trials, commercial sales and distribution of drugs. Pharmaceutical firms who wish to market their medicinal drugs outside the European Union and the United States must submit marketing authorization application to the national authorities of the concerned countries, such as the Pharmaceutical and Medical Device Agency, or PMDA in Japan. The approval process varies from jurisdiction to jurisdiction and the time to approval may be longer or shorter than that required by the FDA or European Commission.

Post-approval regulations

Post-approval regulation in the United States

Biologics manufactured or distributed pursuant to FDA approvals are subject to pervasive and continuing regulation by the FDA, including, among other things, requirements relating to recordkeeping, periodic reporting, product sampling and distribution, advertising and promotion and reporting of adverse experiences with the product. After approval, most changes to the approved product, such as adding new indications or other labeling claims, are subject to prior FDA review and approval. There also are continuing, annual user fee requirements for any marketed products and the establishments at which such products are manufactured, as well as new application fees for supplemental applications with clinical data.

In addition, manufacturers and other entities involved in the manufacture and distribution of approved products are required to register their establishments with the FDA and state agencies, and are subject to periodic unannounced inspections by the FDA and these state agencies for compliance with cGMP requirements. Changes to the manufacturing process are strictly regulated and often require prior FDA approval before being implemented. FDA regulations also require investigation and correction of any deviations from cGMP and impose reporting and documentation requirements upon the sponsor and any third-party manufacturers that the sponsor may decide to use.

Once an approval is granted, the FDA may withdraw the approval if compliance with regulatory requirements and standards is not maintained or if problems occur after the product reaches the market. Later discovery of previously unknown problems with a product, including adverse events of unanticipated severity or frequency, or with manufacturing processes, or failure to comply with regulatory requirements, may result in revisions to the approved labeling to add new safety information; imposition of post-market studies or clinical trials to assess new safety risks; or imposition of distribution or other restrictions under a REMS program. Other potential consequences include, among other things:

- restrictions on the marketing or manufacturing of the product, suspension of the approval, or complete withdrawal of the product from the market or product recalls;

- fines, warning letters or holds on post-approval clinical trials;
- refusal of the FDA to approve pending applications or supplements to approved BLAs, or suspension or revocation of product license approvals;
- product seizure or detention, or refusal to permit the import or export of products; and
- injunctions or the imposition of civil or criminal penalties.

In addition, the distribution of prescription pharmaceutical products is subject to the Prescription Drug Marketing Act, or PDMA, and its implementing regulations, as well as the Drug Supply Chain Security Act, or DSCA, which regulate the distribution and tracing of prescription drug samples at the federal level, and set minimum standards for the regulation of distributors by the states. The PDMA, its implementing regulations and state laws limit the distribution of prescription pharmaceutical product samples, and the DSCA imposes requirements to ensure accountability in distribution and to identify and remove counterfeit and other illegitimate products from the market.

The FDA strictly regulates marketing, labeling, advertising and promotion of products that are placed on the market. Products may be promoted only for the approved indications and in accordance with the provisions of the approved label. The FDA and other agencies actively enforce the laws and regulations prohibiting the promotion of off-label uses. Prescription products may be promoted only for the approved indications and in accordance with the provisions of the approved label. However, companies may also share truthful and not misleading information that is otherwise consistent with the labeling. A company that is found to have improperly promoted off-label uses may be subject to significant liability.

Patent term restoration and extension in the United States

A patent claiming a new biologic product may be eligible for a limited patent term extension under the Hatch-Waxman Act, which permits a patent restoration of up to five years for patent term lost during product development and the FDA regulatory review. The restoration period granted on a patent covering a product is typically one-half the time between the effective date a clinical investigation involving human beings is begun and the submission date of an application, plus the time between the submission date of an application and the ultimate approval date. Patent term extension cannot be used to extend the remaining term of a patent past a total of 14 years from the product's approval date. Only one patent applicable to an approved product is eligible for the extension, the application for the extension must be submitted prior to the expiration of the patent in question, and only those claims covering the approved drug, a method for using it, or a method for manufacturing it may be extended. A patent that covers multiple products for which approval is sought can only be extended in connection with one of the approvals. The USPTO reviews and approves the application for any patent term extension or restoration in consultation with the FDA. For more information regarding the risks related to patent term restoration and extension, please see "Risk Factors—Risks Related to Intellectual Property Rights—If we do not obtain protection under the Hatch-Waxman Amendments and similar non-U.S. legislation for extending the term of patents covering Lumoxiti and each of our product candidates, our business may be materially harmed."

Healthcare law and regulation in the United States

Healthcare providers and third-party payors play a primary role in the recommendation and prescription of biologic products that are granted marketing approval. Arrangements with providers, consultants, third-party payors and customers are subject to broadly applicable fraud and abuse, anti-kickback, false claims laws, transparency laws and patient data privacy laws and regulations and other healthcare laws and regulations that may constrain business and/or financial arrangements. Restrictions under applicable federal and state healthcare laws and regulations, include the following:

- the U.S. Anti-Kickback Statute, which prohibits, among other things, persons and entities from knowingly and willfully soliciting, offering, paying, receiving or providing remuneration, directly or indirectly, in cash or in kind, to induce or reward either the referral of an individual for, or the purchase, order or recommendation of, any good or service, for which payment may be made, in whole or in part, under a federal healthcare program such as Medicare and Medicaid;

- the U.S. civil and criminal false claims laws, including the civil False Claims Act, and civil monetary penalties laws, which prohibit individuals or entities from, among other things, knowingly presenting, or causing to be presented, to the federal government, claims for payment that are false, fictitious or fraudulent or knowingly making, using or causing to made or used a false record or statement to avoid, decrease or conceal an obligation to pay money to the federal government;

- the U.S. Health Insurance Portability and Accountability Act of 1996, or HIPAA, which created additional federal criminal laws that prohibit, among other things, knowingly and willfully executing, or attempting to execute, a scheme to defraud any healthcare benefit program or making false statements relating to healthcare matters;

- HIPAA, as amended by the Health Information Technology for Economic and Clinical Health Act, and their respective implementing regulations, including the Final Omnibus Rule published in January 2013, which impose obligations on covered entities and their business associates, including mandatory contractual terms, with respect to safeguarding the privacy, security and transmission of individually identifiable health information;

- the federal transparency requirements known as the federal Physician Payments Sunshine Act, under the Patient Protection and Affordable Care Act, as amended by the Health Care Education Reconciliation Act, or the ACA, which requires certain manufacturers of drugs, devices, biologics and medical supplies to report annually to the Centers for Medicare & Medicaid Services, or CMS, within the United States Department of Health and Human Services, information related to payments and other transfers of value made by that entity to physicians and teaching hospitals, as well as ownership and investment interests held by physicians and their immediate family members; and

- analogous state and foreign laws and regulations, such as state anti-kickback and false claims laws, which may apply to healthcare items or services that are reimbursed by non-governmental third-party payors, including private insurers.

Some state laws require pharmaceutical companies to comply with the pharmaceutical industry's voluntary compliance guidelines and the relevant compliance guidance promulgated by the federal government in addition to requiring manufacturers to report information related to payments to physicians and other health care providers or marketing expenditures. Certain state laws require the reporting of information relating to drug and biologic pricing; and some state and local laws require the registration of pharmaceutical sales representatives. State and foreign laws also govern the privacy and security of health information in some circumstances, many of which differ from each other in significant ways and often are not preempted by HIPAA, thus complicating compliance efforts.

Failure to comply with these laws or any other governmental regulations as applicable, could result in the imposition of significant civil, criminal and administrative penalties, damages, fines, disgorgement, imprisonment, possible exclusion from government funded healthcare programs, such as Medicare and Medicaid, additional integrity reporting requirements and oversight, as well as contractual damages, reputational harm, diminished profits and future earnings, and curtailment of operations.

Healthcare reform in the United States

A primary trend in the United States healthcare industry and elsewhere is cost containment. There have been a number of federal and state proposals during the last few years regarding the pricing of pharmaceutical and biopharmaceutical products, limiting coverage and reimbursement for biologics and other medical products, government control and other changes to the healthcare system in the United States.

By way of example, the United States and state governments continue to propose and pass legislation designed to reduce the cost of healthcare. In March 2010, the United States Congress enacted the ACA, which, among other things, includes changes to the coverage and payment for products under government health care programs. Among the provisions of the ACA of importance to potential product candidates are:

- an annual, nondeductible fee on any entity that manufactures or imports specified branded prescription biologic agents, apportioned among these entities according to their market share in certain government healthcare programs, although this fee would not apply to sales of certain products approved exclusively for orphan indications;

- expansion of eligibility criteria for Medicaid programs by, among other things, allowing states to offer Medicaid coverage to certain individuals with income at or below 133% of the federal poverty level, thereby potentially increasing a manufacturer's Medicaid rebate liability;

- expanded manufacturers' rebate liability under the Medicaid Drug Rebate Program by increasing the minimum rebate for both branded and generic products and revising the definition of "average manufacturer price," or AMP, for calculating and reporting Medicaid rebates on outpatient prescription product prices and extending rebate liability to prescriptions for individuals enrolled in Medicare Advantage plans;

- addressed a new methodology by which rebates owed by manufacturers under the Medicaid Drug Rebate Program are calculated for products that are inhaled, infused, instilled, implanted or injected;

- expanded the types of entities eligible for the 340B drug discount program;

- established the Medicare Part D coverage gap discount program by requiring manufacturers to now provide a 70% point-of-sale-discount off the negotiated price of applicable brand products to eligible beneficiaries during their coverage gap period as a condition for the manufacturers' outpatient products to be covered under Medicare Part D;

- a new Patient-Centered Outcomes Research Institute to oversee, identify priorities in, and conduct comparative clinical effectiveness research, along with funding for such research; and

- established the Center for Medicare and Medicaid Innovation within CMS to test innovative payment and service delivery models to lower Medicare and Medicaid spending, potentially including prescription product spending.

There have been judicial and Congressional challenges to certain aspects of the ACA, as well as recent efforts by the Trump administration to repeal and replace certain aspects of the ACA, and we expect such challenges to continue. Since January 2017, President Trump has signed two executive orders designed to delay the implementation of certain provisions of the ACA or otherwise circumvent some of the requirements for health insurance mandated by the ACA. Concurrently, Congress has considered legislation that would repeal or repeal and replace all or part of the ACA. While Congress has not passed comprehensive repeal legislation, two bills affecting the implementation of certain taxes under the ACA have been signed into law. The Tax Cuts and Jobs Act of 2017 includes a provision that repealed, effective January 1, 2019, the tax-based shared responsibility payment imposed by the ACA on certain individuals who fail to maintain qualifying health coverage for all or part of a year that is commonly referred to as the "individual mandate." In addition, the 2020 federal spending package permanently eliminated, effective January 1, 2020, the ACA-mandated "Cadillac" tax on high-cost employer-sponsored health coverage and medical device tax and, effective January 1, 2021, also eliminates the health insurer tax. In July and December 2018, CMS published final rules with respect to permitting further collections and payments to and from certain ACA qualified health plans and health insurance issuers under its risk adjustment program in response to the outcome of federal district court litigation regarding the method CMS uses to determine this risk adjustment. On December 14, 2018, a Texas U.S. District Court Judge ruled that the ACA is unconstitutional in its entirety because the "individual mandate" was repealed by the U.S. Congress as part of the Tax Cuts and Jobs Act of 2017 Additionally, on December 18, 2019, the U.S. Court of Appeals for the 5th Circuit upheld the District Court ruling that the individual mandate was unconstitutional and remanded the case back to the District Court to determine whether the remaining provisions of the ACA are invalid as well. It is unclear how this decision, subsequent appeals, and other efforts to repeal and replace the ACA will impact the ACA. We continue to evaluate how the ACA and recent efforts to limit the implementation of the ACA will impact our business.

Other legislative changes have been proposed and adopted in the United States since the ACA was enacted. For example, in August 2011, the Budget Control Act of 2011, among other things, created measures for spending reductions by Congress. A Joint Select Committee on Deficit Reduction, tasked with recommending a targeted deficit reduction of at least $1.2 trillion for the years 2012 through 2021, was unable to reach required goals, thereby triggering the legislation's automatic reduction to several government programs. This includes aggregate reductions of Medicare payments to providers of up to 2% per fiscal year, which went into effect in April 2013 and will remain in effect through 2027 unless additional Congressional action is taken. In January 2013, President Obama signed into law the American Taxpayer Relief Act of 2012, which, among other things, further reduced Medicare payments to several providers, including hospitals, imaging centers and cancer treatment centers, and increased the statute of limitations period for the government to recover overpayments to providers from three to five years.

Further, there has been increasing legislative and enforcement interest in the United States with respect to drug pricing practices. Specifically, there have been several recent U.S. Congressional inquiries and proposed and enacted federal and state legislation designed to, among other things, bring more transparency to drug pricing, review the relationship between pricing and manufacturer patient programs, reduce the cost of drugs under Medicare, and reform government program reimbursement methodologies for drugs. At the federal level, the Trump administration's budget proposal for fiscal year 2020 contains further drug price control measures that could be enacted during the budget process or in other future legislation. The Trump administration also released a "Blueprint", or plan, to lower drug prices and reduce out of pocket costs of drugs that contains additional proposals to increase manufacturer competition, increase the negotiating power of certain federal healthcare programs, incentivize manufacturers to lower the list price of their products and reduce the out of pocket costs of drug products paid by consumers. For example, in May 2019, CMS issued a final rule to allow Medicare Advantage Plans the option of using step therapy for Part B drugs beginning January 1, 2020. This final rule codified CMS's policy change that was effective January 1, 2019. While some measures may require additional authorization to become effective, the U.S. Congress and the Trump administration have each indicated that it will continue to seek new legislative and/or administrative measures to control drug costs. At the state level, legislatures are increasingly passing legislation and implementing regulations designed to control pharmaceutical and biological product pricing, including price or patient reimbursement constraints, discounts, restrictions on certain product access and marketing cost disclosure and transparency measures, and, in some cases, designed to encourage importation from other countries and bulk purchasing.

Pharmacovigilance system in Europe

The holder of a European MA must establish and maintain a pharmacovigilance system and appoint an individual qualified person for pharmacovigilance, or QPPV, who is responsible for oversight of that system. Key obligations include expedited reporting of suspected serious adverse reactions and submission of periodic safety update reports, or PSURs.

All new European MA applications must include a risk management plan, or RMP, describing the risk management system that the company will put in place and documenting measures to prevent or minimize the risks associated with the product. The regulatory authorities may also impose specific obligations as a condition of the MA. Such risk-minimization measures or post-authorization obligations may include additional safety monitoring, more frequent submission of PSURs, or the conduct of additional clinical trials or post-authorization safety studies. RMPs and PSURs are routinely available to third parties requesting access, subject to limited redactions.

Advertising regulation in Europe

All advertising and promotional activities for the product must be consistent with the approved summary of product characteristics, and therefore all off-label promotion is prohibited. Direct-to-consumer advertising of prescription medicines is also prohibited in the European Union. Although general requirements for advertising and promotion of medicinal products are established under European Union directives, the details are governed by regulations in each European Union Member State and can differ from one country to another.

If we fail to comply with applicable foreign regulatory requirements, we may be subject to, among other things, fines, suspension or withdrawal of regulatory approvals, product recalls, seizure of products, operating restrictions and criminal prosecution.

Pharmaceutical coverage, pricing and reimbursement

European Union

In the European Union, pricing and reimbursement schemes vary widely from country to country. Some countries provide that products may be marketed only after a reimbursement price has been agreed. Some countries may require the completion of additional studies that compare the cost-effectiveness of a particular product candidate to currently available therapies or so called health technology assessments, in order to obtain reimbursement or pricing approval. For example, the European Union provides options for its member states to restrict the range of products for which their national health insurance systems provide reimbursement and to control the prices of medicinal products for human use. European Union member states may approve a specific price for a product or it may instead adopt a system of direct or indirect controls on the profitability of the company placing the product on the market. Other member states allow companies to fix their own prices for products, but monitor and control prescription volumes and issue guidance to physicians to limit prescriptions. Recently, many countries in the European Union have increased the amount of discounts required on pharmaceuticals and these efforts could continue as countries attempt to manage healthcare expenditures, especially in light of the severe fiscal and debt crises experienced by many countries in the European Union. The downward pressure on health care costs in general, particularly prescription products, has become intense. As a result, increasingly high barriers are being erected to the entry of new products. Political, economic and regulatory developments may further complicate pricing negotiations, and pricing negotiations may continue after reimbursement has been obtained. Reference pricing used by various European Union member states, and parallel trade, i.e., arbitrage between low-priced and high-priced member states, can further reduce prices. There can be no assurance that any country that has price controls or reimbursement limitations for pharmaceutical products will allow favorable reimbursement and pricing arrangements for any products, if approved in those countries.

United States

In the United States, patients who are prescribed treatments for their conditions and providers performing the prescribed services generally rely on third-party payors to reimburse all or part of the associated healthcare costs. Significant uncertainty exists as to the coverage and reimbursement status of products approved by the FDA and other government authorities. Thus, even if a product candidate is approved, sales of the product will depend, in part, on the extent to which third-party payors, including government health programs in the United States such as Medicare and Medicaid, commercial health insurers and managed care organizations, provide coverage, and establish adequate reimbursement levels for, the product. The process for determining whether a payor will provide coverage for a product may be separate from the process for setting the price or reimbursement rate that the payor will pay for the product once coverage is approved. Third-party payors are increasingly challenging the prices charged, examining the medical necessity, and reviewing the cost-effectiveness of medical products and services and imposing controls to manage costs. Third-party payors may limit coverage to specific products on an approved list, also known as a formulary, which might not include all of the approved products for a particular indication.

In order to secure coverage and reimbursement for any product that might be approved for sale, a company may need to conduct expensive pharmacoeconomic studies in order to demonstrate the medical necessity and cost-effectiveness of the product, in addition to the costs required to obtain FDA or other comparable marketing approvals. Nonetheless, product candidates may not be considered medically necessary or cost effective. A decision by a third-party payor not to cover a product candidate could reduce physician utilization once the product is approved and have a material adverse effect on sales, results of operations and financial condition. Additionally, a payor's decision to provide coverage for a product does not imply that an adequate reimbursement rate will be approved. Further, one payor's determination to provide coverage for a product does not assure that other payors will also provide coverage and reimbursement for the product, and the level of coverage and reimbursement can differ significantly from payor to payor.

The containment of healthcare costs also has become a priority of federal, state and foreign governments and the prices of products have been a focus in this effort. Governments have shown significant interest in implementing cost-containment programs, including price controls, restrictions on reimbursement and requirements for substitution of generic products. Adoption of price controls and cost-containment measures, and adoption of more restrictive policies in jurisdictions with existing controls and measures, could further limit a company's revenue generated from the sale of any approved products. Coverage policies and third-party reimbursement rates may change at any time. Even if favorable coverage and reimbursement status is attained for one or more products for which a company or its collaborators receive marketing approval, less favorable coverage policies and reimbursement rates may be implemented in the future.

Anti-corruption, anti-kickback and transparency regulations

Arrangements with healthcare providers, physicians, third-party payors and customers can expose pharmaceutical manufactures to broadly applicable anti-bribery, fraud and abuse and other healthcare laws and regulations, which may constrain the business or financial arrangements and relationships through which such companies sell, market and distribute pharmaceutical products.

More specifically, each of the above-mentioned steps of the development of therapeutic products for human use is heavily regulated and therefore involves significant interaction with public officials which is likely to cause a risk of corruption or bribery. For instance, in many countries, hospitals are operated by the government, and doctors and other hospital employees are considered foreign officials. Certain payments to hospitals in connection with clinical trials and other work have been deemed to be improper payments to government officials and have led to enforcement actions. That is why business activity may be subject to anti-bribery or anti-corruption laws, regulations or rules of other countries in which we operate, including without limitation the Foreign Corrupt Practices Act, the U.K. Bribery Act or the French Sapin 2 Law.

All these statutes generally prohibit offering, promising, giving, or authorizing others to give anything of value, either directly or indirectly, to a government or a foreign government official or employees of public international organizations in order to influence official action, or otherwise obtain or retain business. The implementation of these statutes may also impose to develop internal compliance programs, procedures and guidelines to detect and report any suspicious activities and to mitigate any risks of noncompliance which may occur.

In addition, we may be subject to specific healthcare regulations, including, without limitation:

- the French "transparency" provisions, or "French Sunshine Act" (Articles L. 1453-1 and D. 1453-1 and seq. of the French Public Health Code or PHC), which contains provisions regarding transparency of fees received by some healthcare professionals from industries, i.e. companies manufacturing or marketing healthcare products (medicinal products, medical devices, etc.) in France. According to the provisions, these companies shall publicly disclose (on a specific public website available at www.entreprises-transparence.sante.gouv.fr) the advantages and fees paid to healthcare professionals amounting to €10 or above, as well as the agreements concluded with the latter, along with detailed information about each agreement (the precise subject matter of the agreement, the date of signature of the agreement, its end date, the total amount paid to the healthcare professional, etc.); and

- the French "anti-gift" provisions (Articles L.1453-3 to L.1453-12 PHC), setting out a general prohibition of payments and rewards from industries, i.e. companies manufacturing or marketing health products, to healthcare professionals, with limited exceptions and strictly defines the conditions under which such payments or awards are lawful.

Data protection rules

The Regulation 2016/679, known as the General Data Protection Regulation, or GDPR, that came into force on May 25, 2018, as well as EU Member State implementing legislations, apply to the collection and processing of personal data, including health-related information, by companies located in the EU, or in certain circumstances, by companies located outside of the EU and processing personal information of individuals located in the EU.

These laws impose strict obligations on the ability to process personal data, including health-related information, in particular in relation to their collection, use, disclosure and transfer.

Also, in certain countries, in particular France, the conduct of clinical trials is subject to compliance with specific provisions of the Act No.78-17 of January 6, 1978 on Information Technology, Data Files and Civil Liberties, as amended, and in particular Chapter IX relating to the processing of personal data in the health sector. These provisions require, among others, the filing of compliance undertakings with "standard methodologies" adopted by the French Data Protection Authority (the CNIL), or, if not complying, obtaining a specific authorization from the CNIL.

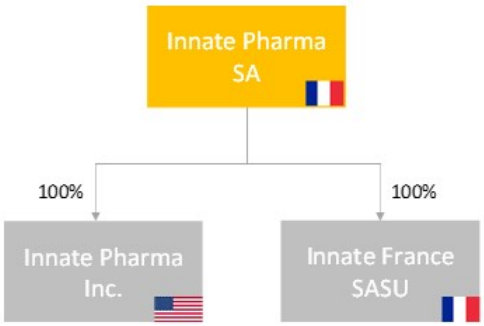
The most common standard methodologies are the following:

- Decision No. 2018-154 of May 3, 2018 concerning the approval of a standard methodology for processing personal data in the context of research in the field of health, which does not require the express consent of the person involved (methodology MR-003); and
- Decision No. 2018-153 of May 3, 2018 concerning the approval of a standard methodology for the processing of personal data carried out within the context of research in the field of clinical trials, which requires the express consent of the person involved (standard methodology MR-001).

In certain specific cases, entities processing health personal data may have to comply with article L1111-8 of the French Public Health Code which imposes certain certifications for the hosting service providers.

C. Organizational Structure.

The following diagram illustrates our corporate structure:



D. Property, Plants and Equipment.

Our corporate offices and laboratories are located in Luminy, near Marseille, France. In 2008, we signed a lease-financing agreement with SOGEBAIL, a subsidiary of Société Générale, for €6.6 million to finance the acquisition of our offices. The lease-financing agreement has a 12-year term. We have a purchase option for all of the buildings and land for the lump sum of €1 at the end of the term of the lease-financing agreement on June 9, 2020. In accordance with the terms of the lease-financing agreement, we exercised this buy-back option and will sign the deed of sale before notary. We believe that our existing facilities are adequate to meet our current needs and that suitable additional alternative facilities will be available in the future on commercially reasonable terms to meet our future needs.

Item 4A. Unresolved Staff Comments.

Not applicable.

Item 5. Operating and Financial Review and Prospects.

You should read the following discussion of our financial condition and results of operations in conjunction with the "Selected Consolidated Financial Data" and our consolidated financial statements and the related notes thereto included elsewhere in this Annual Report. In addition to historical information, the following discussion and analysis contains forward-looking statements that reflect our plans, estimates and beliefs. Our actual results and the timing of events could differ materially from those anticipated in the forward-looking statements. Factors that could cause or contribute to these differences include those discussed below and elsewhere in this Annual Report, particularly in sections titled "Item 3.D – Risk Factors" and "Special Note Regarding Forward-Looking Statements." Our audited consolidated financial statements as of and for the years ended December 31, 2017, 2018 and 2019 have been prepared in accordance with IFRS as issued by the IASB, which may differ in material respects from generally accepted accounting principles in other jurisdictions, including the United States.

Overview

We are a biotechnology company focused on discovering, developing and commercializing first-in-class therapeutic antibodies designed to harness the immune system for the treatment of oncology indications with significant unmet medical need. We have extensive experience in research and development in immuno-oncology, having been pioneers in the understanding of natural killer cell, or NK cell, biology, and later expanding our expertise in the tumor microenvironment, tumor antigens and antibody engineering fields. We have built, internally and through our business development strategy, a broad and diversified portfolio including an approved product, four clinical product candidates and a robust preclinical pipeline. We have entered into collaborations with leaders in the biopharmaceutical industry, such as AstraZeneca and Sanofi, to leverage their development capabilities and expertise for some of our candidates. We believe our product candidates and clinical development approach are differentiated from current immuno-oncology therapies and have the potential to significantly improve the clinical outcome for patients with cancer.

Since our inception, we have devoted substantially all of our financial resources to research and development efforts, including conducting preclinical studies and clinical trials of our product candidates, providing general and administrative support for our operations and protecting our intellectual property. Our marketed product, Lumoxiti, was approved by the U.S. Food and Drug Administration, or FDA, under priority review in September 2018 and was commercially launched by AstraZeneca AB, or AstraZeneca, in November 2018. We have not yet generated any material revenue from product sales. We have funded our operations to date primarily through private and public offerings of ordinary shares, payments from our collaborators and research tax credits.

As of December 31, 2019, we had €255.9 million in cash, cash equivalents, short-term investments and non-current financial assets. Since our inception, we have raised a total of €306.4 million through the sale of equity securities, including €33.7 million in the initial public offering of our ordinary shares on Euronext Paris in 2006 and €66.0 million in the initial public offering of our ordinary shares on Euronext and ADS on Nasdaq New-York in 2019. We have also received $475.0 million (€415.9 million) in payments from our collaborators, including AstraZeneca, since 2011, excluding payments received for purchases of our equity securities by our collaborators.

We have significant agreements with AstraZeneca pursuant to which we have the right to earn milestone and royalty payments. We have other license agreements pursuant to which we have acquired intellectual property and under which we will be required to make payments to the counterparty upon the achievement of certain milestone events and commercial sales related to our product candidates.

We have incurred net losses in each year since our inception except for the years ended December 31, 2016 and 2018. Our net income (loss) was €(48.4) million, €3.0 million and €(20.8) million for the years ended December 31, 2017, 2018 and 2019, respectively. Substantially all of our net losses have resulted from costs incurred in connection with our research and development programs and from selling, general and administrative expenses associated with our operations. As we continue advancing our product candidates through research and development programs and investing in the commercialization of Lumoxiti, we expect to continue to incur significant expenses and may again incur operating losses in future periods. We anticipate that such expenses will increase substantially if and as we:

- continue the research and development of our product candidates;
- initiate clinical trials for, or additional preclinical development of, our product candidates;
- further develop and refine the manufacturing processes for our product candidates;
- change or add manufacturers or suppliers of biological materials;
- seek regulatory and marketing authorizations for any of our product candidates that successfully complete development;
- establish a sales, marketing and distribution infrastructure to commercialize Lumoxiti and any other products for which we may obtain marketing authorization;
- seek to identify and validate additional product candidates;
- acquire or license other product candidates, technologies or biological materials;
- make milestone, royalty or other payments under any current or future license agreements;
- obtain, maintain, protect and enforce our intellectual property portfolio;
- secure manufacturing arrangements for commercial production;

- seek to attract and retain new and existing skilled personnel;
- create additional infrastructure to support our operations as a U.S. public company and incur increased legal, accounting, investor relations and other expenses; and
- experience delays or encounter issues with any of the above.

We anticipate that we will need to raise additional funding, prior to completing clinical development of any of our product candidates. Until such time that we can generate significant revenues from sales of Lumoxiti and our product candidates, if approved, we expect to finance our operating activities through a combination of milestone payments received pursuant to our strategic alliances, equity offerings, debt financings, government or other third-party funding and collaborations, and licensing arrangements. However, we may not receive milestone payments when expected, or at all, and we may be unable to raise additional funds or enter into such arrangements when needed on favorable terms, or at all, which would have a negative impact on our financial condition and could force us to delay, limit, reduce or terminate our development programs or commercialization efforts or grant to others rights to develop or market product candidates that we would otherwise prefer to develop and market ourselves. Failure to receive additional funding could cause us to cease operations, in part or in full.

Presentation of Financial Information

Our audited consolidated financial statements included herein as of and for the years ended December 31, 2017, 2018 and 2019 have been prepared in accordance with IFRS as issued by the IASB.

Due to the listing of our ordinary shares on Euronext Paris and in accordance with the European Union's regulation No. 1606/2002 of July 19, 2002, we also prepare and publish our consolidated financial statements in accordance with IFRS as adopted by the European Union, or EU.

All the standards published by the IASB that are mandatorily applicable in the years ended December 31, 2017, 2018 and 2019 are endorsed by the EU and are mandatorily applicable in the EU. Therefore, our audited consolidated financial statements for the years ended December 31, 2017, 2018 and 2019 are compliant with both IFRS as issued by the IASB and IFRS as adopted by the EU.

The preparation of financial statements in accordance with IFRS requires us to make significant judgments and estimates which are presented below. See "—Critical Accounting Policies and Significant Judgments and Estimates."

Our Principal Collaboration and Licensing Agreements

Our results of operations are impacted by the terms and conditions of our principal collaboration and licensing agreements. For a description of our principal collaboration and licensing agreements, see "Item 10C.—Material Contracts."

Our Principal Components of Our Results of Operations

Revenue and other income

Our revenue and other income mainly consists of revenues from collaboration and licensing agreements and government financing for research expenditure in the form of the research tax credits, as well as other grants.

Revenue from collaboration and licensing agreements

We currently derive substantially all our revenues from payments pursuant to our licensing and collaboration agreements with AstraZeneca relating to monalizumab and IPH5201, consisting of (i) upfront payments, (ii) milestone payments based upon the achievement of pre-determined development, regulatory and commercial events and (iii) research and development fees related to charges for full time equivalents, or FTEs, at contracted rates and reimbursement of research and development expenses.

We have not generated any revenue from product sales since our inception, with the exception in 2019 and 2018 of Lumoxiti sales, which were classified in the net income (loss) from distribution agreements during the transition period with AstraZeneca. Our ability to generate significant product revenue and to become profitable will depend upon our ability to successfully commercialize Lumoxiti and our ability to successfully develop, obtain regulatory approval for and commercialize any other product candidates. Because of the numerous risks and uncertainties associated with product development and regulatory approval, we are unable to predict the amount, timing or whether we will be able to obtain product revenue.

On January 1, 2018, IFRS 15 *Revenue from contracts with customers*, or IFRS 15, became mandatorily applicable.

IFRS 15 supersedes IAS 11 *Construction contracts*, IAS 18 Revenue, or IAS 18, and related interpretations, and changes the accounting treatment of the revenue relating to our agreement with AstraZeneca with respect to monalizumab. Under IFRS 15, our co-funding share of research and development expenses incurred by AstraZeneca is no longer recorded as research and development expense, but rather is deducted from the recognition of the upfront payment received by us upon execution of the agreement. The amount of our co-funding obligation is now recognized as a collaboration liability and is no longer recorded as deferred revenue in the consolidated statement of financial position. When the collaboration liability is in a foreign currency, which is the case in the context of this agreement, it is translated at each reporting date using the closing exchange rate, which generates foreign exchange gains or losses in our consolidated statement of income (loss).

We have opted for the modified retrospective approach without any of the practical expedients allowed by IFRS 15. Accordingly, the comparative information is not restated and the cumulative impact of the first application is presented as an adjustment of the opening equity as of January 1, 2018. Consequently, the first application of IFRS 15 may affect the comparability of our revenue and research and development expenses for the years ended December 31, 2017, 2018 and 2019.

Since January 1, 2018, agreements are analyzed according to IFRS 15. For our agreements relating to monalizumab and IPH5201, we have concluded that the license is not distinct from the research and development services because those services increase the utility of the license. As a result, the estimated transaction price is spread over the period when we are engaged to deliver services to AstraZeneca based on the percentage of completion of the costs to be incurred, and non-refundable initial payments received are deferred and recognized as revenue over time.

Variable consideration can be included in the estimated transaction price only if it is highly probable that the related revenue will not be reversed in the future. According to the level of uncertainty relating to the results of preclinical studies and clinical trials and the decisions relating to regulatory approvals, related payments are excluded from the transaction price as long as the triggering event is not certain. If and when the triggering event occurs, the corresponding milestone is added to the transaction price and revenue is recognized relative to the percentage of completion related to the transaction.

When a collaboration contract grants to the collaborator an option to acquire a license, we exercise judgment to determine the beginning date of transfer of the control of the license. Depending on the situation, the recognition of the revenue begins from the date of the contract, with the payment relating to the exercise of the option being therefore considered as variable consideration, or the recognition is deferred until the exercise or expiration of the option.

In addition, under the agreements with AstraZeneca relating to IPH5201 and avdoralimab, we are reimbursed for some of our internal and external costs. We recognize these reimbursements as revenue in our consolidated statement of income (loss) when the related costs are incurred.

Revenue recognition involves significant judgments and estimates by management. See "—Critical Accounting Policies and Significant Judgments and Estimates."

Prior to 2018, revenue was recognized in accordance with IAS 18, which resulted in a difference in revenue recognition accounting policies used for the audited consolidated financial statements for the years ended December 31, 2017, 2018 and 2019.

Government financing for research expenditures

Our government financing for research expenditures consists of research tax credits (*crédit d'impôt recherche*) and grants.

The research tax credit is granted to companies by the French tax authorities in order to encourage them to conduct technical and scientific research. Companies demonstrating that they have expenses that meet the required criteria, including research expenses located in France or, since January 1, 2005, within the EU or in another state that is a party to the agreement in the European Economic Area that has concluded a tax treaty with France that contains an administrative assistance clause, receive a tax credit which can be used against the payment of the corporate tax due for the fiscal year in which the expenses were incurred and during the next three fiscal years, or, as applicable, can be reimbursed for the excess portion. The expenditures taken into account for the calculation of the research tax credit involve only research expenses.

The main characteristics of the research tax credit are:

- the research tax credit results in a cash inflow to us from the tax authorities, i.e., it is used to offset the payment of corporate tax or is paid directly to us for the portion that remains unused the year after the date of its record as a tax credit in the income statement;
- our corporate income tax liability does not limit the amount of the research tax credit—if we do not pay any corporate income tax, we can request direct cash payment of the research tax credit the year following its record in the income statement; and
- the research tax credit is not included in the determination of the corporate income tax.

When the research tax credit is not deductible from taxes payable by us, it is generally reimbursed by the French government three years after the fiscal year for which it is determined. However, since 2011, companies that meet the definition of small and medium sized enterprises ("SMEs") according to the European Union criteria are eligible for early reimbursement of their research tax credit receivable. The status of SME is lost when the criteria for eligibility are exceeded during two consecutive years. We lost our status as an SME at the end of the fiscal year 2019.

We have concluded that the research tax credit meets the definition of a government grant as defined in IAS 20 Accounting for government grants and disclosure of government assistance, or IAS 20, and that the classification as "Revenue and other income" in our consolidated statement of income (loss) is appropriate.

We also from time to time receive government grants, which are recognized in our consolidated statement of income (loss) when we comply with the conditions attached to the grants and they are non-repayable grants.

Operating expenses

Since inception, our operating expenses have consisted primarily of research and development expenses and selling, general and administration expenses.

Research and development expenses

We engage in substantial research and development efforts to develop innovative product candidates. Research and development expenses consist primarily of:

- personnel costs, including salaries, related benefits and share-based compensation, for our employees engaged in scientific research and development functions;
- cost of third-party contractors and academic institutions involved in preclinical studies or clinical trials that we may conduct, or third-party contractors involved in field trials;
- purchases of biological raw materials, real estate leasing costs as well as conferences and travel costs; and
- certain other expenses, such as expenses for use of laboratories and facilities for our research and development activities as well as depreciation and amortization.

Our research and development efforts are focused on our existing product candidates and preclinical programs, including the advancement of our lead product candidates, monalizumab, lacutamab and avdoralimab. Our direct research and development expenses consist principally of external costs associated with subcontracting of preclinical and clinical operations to third parties, which we track on a program-by-program basis. We also use our employee and infrastructure resources across multiple research and development programs, and do not track these indirect expenses on a program-by-program basis.

Research and development costs are expensed as incurred. Costs for certain activities are recognized based on an evaluation of the progress to completion of specific tasks using data such as information provided to us by our vendors and analyzing the progress of our preclinical studies or other services performed. Significant judgment and estimates are made in determining the accrued expense balances at the end of any reporting period. Non-refundable advance payments for research and development goods or services to be received in the future from third parties are deferred and capitalized. The capitalized amounts are expensed as the related goods are delivered or the services are performed.

Research and development activities are central to our business. As product candidates in later stages of clinical development generally have higher development costs than those in earlier stages of clinical development, primarily due to the increased size and duration of later-stage clinical trials, we expect that our research and development costs will increase in the foreseeable future. Such cost increases are expected to occur as we conduct existing clinical trials and initiate future clinical trials, manufacture pre-commercial clinical trial and preclinical study materials, expand our research and development efforts, seek regulatory approvals for our product candidates that successfully complete clinical trials, access and develop additional technologies and hire additional personnel to support our research and development efforts.

We cannot determine with certainty the duration and total costs of our future clinical trials of our product candidates or if, when, or to what extent we will generate revenues from the commercialization and sale of any of our product candidates, or those of our collaborators, that might obtain regulatory approval. We may never succeed in achieving regulatory approval for any of our product candidates. The duration, costs and timing of clinical trials and development of our product candidates will depend on a variety of factors, including:

- the scope, rate of progress and expense of our ongoing clinical trials as well as any additional preclinical studies, clinical trials conducted by our collaborators and other research and development activities;
- clinical trial and preclinical study results;
- the terms and timing of regulatory approvals;
- the expense of filing, maintaining, prosecuting, defending and enforcing patent claims and other intellectual property rights; and
- the ability to market, commercialize and achieve market acceptance for any products that receive regulatory approval.

A change in the outcome of any of these variables with respect to the development of monalizumab, lacutamab and avdoralimab or any other product candidate or preclinical program that we are developing or could develop in the future could mean a significant change in the costs and timing associated with the development of such product candidates or preclinical programs. For example, if the FDA, the European Medicines Agency, or EMA, or another regulatory authority were to require us to conduct preclinical studies and clinical trials beyond those that we currently anticipate will be required for the completion of clinical development, or if we experience significant delays in enrollment in any clinical trials, we could be required to spend significant additional financial resources and time on the completion of clinical development. For a discussion of the risks associated with completing the development projects on schedule, see “Risk Factors—Risks Related to the Development and Commercialization of Lumoxiti and Our Product Candidates.”

Selling, general and administrative expenses

Selling, general and administrative expenses consist primarily of personnel costs and share-based compensation for personnel other than research and development staff. Selling, general and administrative expenses also consist of fees for professional services, mainly related to audit, IT, accounting, recruitment and legal services, communication and travel costs, real-estate leasing costs, office furniture and equipment costs, allowance for amortization and depreciation, director's attendance fees and insurance costs and overhead costs, such as postal and telecommunications expenses.

We anticipate that our selling, general and administrative expense will increase in the future as we grow our support functions for the expected increase in our research and development activities and the commercialization of Lumoxiti. Our share of Lumoxiti operational expenses are included in net income (loss) from distribution agreements because AstraZeneca has been responsible for commercialization activities to date. However, we have directly incurred operational expenses related to Lumoxiti in the year ended December 31, 2019 and we will expect to incur additional operational expenses related to Lumoxiti in the future. These operational expenses consist mainly of selling, general and administrative expenses. We also anticipate increased expenses associated with being a public company in the United States, including costs related to strengthening our support functions and hiring additional staff as well as our audit, legal, regulatory and tax-related services associated with maintaining compliance with Nasdaq listing and SEC requirements, director and officer insurance premiums and investor relations costs.

Net income (loss) from distribution agreements

When commercialization activities related to a product that we own or license are performed by a third-party under a collaboration or transition agreement, we must determine if the collaborator acts as an agent or a principal. With respect to our agreement with AstraZeneca related to Lumoxiti, we concluded that AstraZeneca acted as principal during the periods presented because AstraZeneca controls the commercialization activities and is the holder of the applicable regulatory marketing authorization.

As a result, we recognize on a single line the net income (loss) from our Lumoxiti distribution agreement in an amount equal to the sales for the period (which were modest for the fiscal years ended December 31, 2018 and 2019), net of the administrative and selling expenses associated with the sales revenue allocated to us.

Net financial income (loss)

Our financial loss primarily consists of realized and unrealized foreign exchange gains and losses primarily related to the purchase of services as well as deposit accounts denominated in U.S. dollars and gains and losses and interest received in relation to cash and cash equivalents that have been deposited in cash accounts, short-term fixed deposits and short-term highly liquid investments with original maturities of three months or less. Our cash and cash equivalents generate a modest amount of interest income. We expect to continue this investment philosophy in the future.

A. Operating Results.

Comparisons for the years ended December 31, 2018 and 2019

The following table sets forth a summary of our consolidated statements of income (loss) for the periods presented.

	Year ended December 31,	
	2018(1)	**2019 (1)**
	(in thousands)	
Revenue from collaboration and licensing agreements	€ 79,892	€ 68,974
Government financing for research expenditures	14,060	16,840
Revenue and other income	**93,952**	**85,814**
Research and development	(69,555)	(78,844)
Selling, general and administrative	(18,142)	(25,803)
Operating expenses	**(87,697)**	**(104,647)**
Net income (loss) from distribution agreements	(1,109)	(8,219)
Operating income (loss)	**(5,146)**	**(27,052)**
Financial income	6,002	11,269
Financial expenses	(8,429)	(4,976)
Net financial income (loss)	**(2,427)**	**6,293**
Net income (loss) before tax	**2,718**	**(20,759)**
Income tax expense	333	–
Net income (loss)	**€ 3,049**	**€ (20,759)**

(1) The consolidated financial statements as of and for the year ended December 31, 2019 reflect the impacts of the adoption of IFRS 16 that became applicable on January 1, 2019. The Company applied the modified retrospective transition method. As a consequence, the comparative consolidated financial information as of and for the years ended December 31, 2018 have not been restated. See Note 2.f to our consolidated financial statements appearing elsewhere in this Annual Report.

Revenue and other income

Revenue and other income resulted from collaboration and licensing agreements and government financing for research expenditure. Revenue and other income decreased by €8.1 million, or 8,7 %, to €85.8 million for the year ended December 31, 2019, as compared to revenue and other income of €94.0 million for the year ended December 31, 2018.

	Year ended December 31,	
	2018	2019
	(in thousands)	
Revenue from collaboration and licensing agreements	€ 79,892	€ 68,974
Government financing for research expenditures	14,060	16,840
Revenue and other income	**€ 93,952**	**€ 85,814**

Revenues from collaboration and licensing agreements

Revenues from collaboration and licensing agreements decreased by €10.9 million, or 13.7%, to €69.0 million for the year ended December 31, 2019, as compared to revenues from collaboration and licensing agreements of €79.9 million for the year ended December 31, 2018. These revenues were derived principally under our agreements with AstraZeneca and are set forth in the table below.

	Year ended December 31,	
	2018	2019
	(in thousands)	
Proceeds from collaboration and licensing agreements:		
Monalizumab agreement	€ 61,546	€ 42,541
IPH5201 agreement	15,632	18,816
Proceeds from collaboration and licensing agreements	77,178	61,356
Invoicing of research and development (IPH5201 and avdoralimab agreements)	2,242	6,949
Exchange gains on collaboration and licensing agreements	465	658
Others	7	10
Revenue from collaboration and licensing agreements	**€ 79 ,892**	**€ 68,974**

Proceeds related to monalizumab. Revenue related to monalizumab decreased by €19.0 million, or 30.9%, to €42.5 million for the year ended December 31, 2019, as compared to €61.5 million for the year ended December 31, 2018. This change is primarily due to the one-off impact of the exercise of the option by AstraZeneca ($100.0 million) in October 2018, which generated a catch-up impact in revenue of €32.0 million and €6.4 million in the years ended December 31, 2018 and 2019, respectively. As of December 31, 2019, the deferred revenue related to monalizumab is €62.7 million (€39.7 million as "Deferred revenue—Current portion" and €22.9 million as "Deferred revenue—Non-current portion").

Proceeds related to IPH5201. Revenue related to IPH5201 increased by €3.2 million, or 20.4%, to €18.8 million for the year ended December 31, 2019, as compared to €15.6 million for the year ended December 31, 2018. This change is primarily due to revenue related to the partial recognition in 2019 of the $50.0 million non-refundable upfront payment received from AstraZeneca in 2018, which has been recognized as revenue based on the percentage of completion of the development work. As of December 31, 2019, the amount not yet recognized in revenue amounted to €9.1 million, classified as "Deferred revenue—Current portion."

Invoicing of research and development costs. Revenue from invoicing of research and development costs for the year ended December 31, 2019 was €6.9 million compared to €2.2 million for the year ended December 31, 2018. Pursuant to our agreements with AstraZeneca, clinical costs for the ongoing Phase I trial of avdoralimab in combination with durvalumab are equally shared between us and AstraZeneca and research and development costs related to IPH5201 are fully borne by AstraZeneca, resulting in periodic settlement invoices.

Government financing for research expenditures

Government financing for research expenditures increased by €2.8 million, or 19.8%, to €16.8 million for the year ended December 31, 2019, as compared to €14.1 million for the year ended December 31, 2018. This change is primarily a result of an increase in the research tax credit of €3.2 million, which is mainly due to an increase in the amortization expense relating to the intangible assets related to the licenses acquired from AstraZeneca in October 2018. The table below details government funding for research expenditures for the years ended December 31, 2018 and 2019.

	Year ended December 31,	
	2018	2019
	(in thousands)	
Research tax credits	€ 13,527	€ 16,737
Grants	533	103
Government financing for research expenditures	**€ 14,060**	**€ 16,840**

The research tax credit is calculated as 30% of the amount of research and development expenses, net of grants received, eligible for the research tax credit for the years ended December 31, 2018 and 2019.

Operating expenses

The table below presents our operating expenses for the years ended December 31, 2018 and 2019.

	Year ended December 31,	
	2018	2019
	(in thousands)	
Research and development	€ 69,555	€ 78,844
Selling, general and administrative	18,142	25,803
Total operating expenses	**€ 87,697**	**€ 104,647**

Research and development expenses

Our research and development expenses in the periods presented primarily relate to activities for our monalizumab, lacutamab and avdoralimab programs and Lumoxiti.

Our research and development expenses are broken down as set forth in the table below:

	Year ended December 31,	
	2018	2019
	(in thousands)	
Monalizumab	€ 8,794	€ 6,195
Lacutamab	15,019	9,870
Avdoralimab	9,883	5,887
Lumoxiti(1)	1,094	11,709
Sub-total programs in clinical development	*34,790*	*33,660*
Sub-total programs in preclinical development	*11,356*	*10,741*
Total direct research and development expenses	**46,146**	**44,401**
Personnel expenses (including share-based payments)	14,226	15,892
Depreciation and amortization	6,709	15,518
Other expenses	2,474	3,033
Personnel and other expenses	**23,409**	**34,443**
Total research and development expenses	**€ 69,555**	**€ 78,844**

(1) Lumoxiti research and development expenses mainly relate to the generation of additional clinical data and the preparation of the submission of the marketing authorization application to the EMA.

Research and development increased by €9.3 million, or 13.4%, to €78.9 million for the year ended December 31, 2019, as compared to research and development of €69.6 million for the year ended December 31, 2018. This increase change is primarily a result of an increase of €11.0 million euros in personnel and other expenses, partly offset by a decrease of €1.7 million euros in direct research and development expenses (clinical and non-clinical).

Research and development expenses represented a total of 79.4% and 75.3% of the total operation expenses for the years ended December 31, 2018 and 2019, respectively. As of December 31, 2018, we had 154 employees in research and development functions, compared to 162 as of December 31, 2019.

Direct research and development expenses decreased by €1.7 million, or 3.9%, to €44.4 million for the year ended December 31, 2019, as compared to direct research and development expenses of €46.1 million for the year ended December 31, 2018. This change is primarily a result of: (i) a €5.1 million decrease in expenses related to the lacutamab program, (ii) a €4.0 million decrease in expenses related to the avdoralimab program, (iii) a €2.6 million decrease in expenses related to the monalizumab program, partially offset by (iv) a €10.6 million increase in expenses related to the acquisition of Lumoxiti. The decrease in expenses related to the lacutamab and avdoralimab programs mainly results from €7.5 million decrease in chemical, manufacturing and production control costs due to the phasing of the production on batches.

Personnel and other expenses increased by €11.0 million, or 47.1%, to €34.3 million for the year ended December 31, 2019, as compared to personnel and other expenses of €23.4 million for the year ended December 31, 2018. This change is primarily a result of (i) a €8.8 million increase in depreciation and amortization expenses due to the full year impact of the amortization of Lumoxiti (€2.3 million) and IPH5201 (€6.5 million) and (ii) a €1.7 million increase in personnel expenses (including share-based compensation) due to the increase in employee headcount and bonuses (€1.4 million) and share-based payments (€0.3 million).

Selling, general and administrative expenses

Selling, general and administrative expenses increased by €7.7 million, or 42.2%, to €25.8 million for the year ended December 31, 2019, as compared to €18.1 million for the year ended December 31, 2018. Selling, general and administrative expenses represented a total of 20.7% and 24.7% of our total operating expenses for the years ended December 31, 2018 and 2019, respectively.

The table below presents our selling, general and administrative expenses by nature for the years ended December 31, 2018 and 2019:

	Year ended December 31,	
	2018	2019
	(in thousands)	
Personnel expenses (including share-based payments)	€ 7,601	€ 10,572
Non scientific advisory and consulting	5,301	8,384
Other expenses(1)	5,240	6,847
Total selling, general and administrative	**€ 18,142**	**€ 25,803**

(1) Other expenses are related to intellectual property, maintenance costs for laboratory equipment and our headquarters, depreciation and amortization and other selling, general and administrative expenses.

Personnel expenses, which includes the compensation paid to our employees and consultants, increased by €3.0 million, or 39.1%, to €10.6 million for the year ended December 31, 2019, as compared to personnel expenses of €7.6 million for the year ended December 31, 2018. This increase mainly results from an increase in wages and salaries of €2.1 million, resulting from the recruitment of employees for our US subsidiary (€1.7 million), including employees affected to the commercialization of Lumoxiti. As of December 31, 2019, we had 65 employees in general and administrative functions, as compared to 41 as of December 31, 2018. This change is primarily a result of the recruitment of 20 employees for our US subsidiary.

Non-scientific advisory and consulting expenses mostly consist of auditing, accounting, taxation and legal fees as well as consulting fees in relation to business strategy and operations and hiring services. Non-scientific advisory and consulting expenses increased by €3.1 million, or 58.1%, to €8.4 million for the year ended December 31, 2019 as compared to €5.3 million for the year ended December 31, 2018. This increase mainly results from fees incurred for the commercialization of Lumoxiti and the development of the activities of our US affiliate.

Net income (loss) from distribution agreements

We recognized a net loss of €8.2 million from the Lumoxiti distribution agreement in the year ended December 31, 2019, as compared to a net loss of €1.1 million for the year ended December 31, 2018, which reflected revenue from sales of Lumoxiti in the period, less administrative and selling expenses associated with the sales revenue allocated to us. The commercial launch of Lumoxiti in the U.S. occurred in November 2018 (although revenue derived from such sales was recognized over a 12 month period in 2019) and is in its ramp-up phase.

Financial income (loss), net

Net financial result increased by €8.7 million, to a €6.3 million gain for the year ended December 31, 2019, as compared to €2.4 million loss for the year ended December 31, 2018. This increase is mainly due to a €4.1 million gain relating to the change in valuation allowance on financial instruments (as compared to a €3.9 million loss for the year ended December 31, 2018).

The table below presents the components of our net financial result for the years ended December 31, 2018 and 2019:

	Year ended December 31,	
	2018	2019
	(in thousands)	
Gains on financial assets	€ 1,582	€ 1,620
Unrealized gains on financial assets		4,063
Foreign exchange gains	4,068	5,568
Other financial income	352	18
Financial income	**6,002**	**11,270**
Unrealized losses on financial assets	(3,942)	–
Foreign exchange losses	(3,851)	(4,772)
Interest on financial liabilities	(102)	(204)
Other financial expenses	(534)	(1)
Financial expenses	**(8,429)**	**(4,976)**
Net financial loss	**€ (2,427)**	**€ 6,293**

For the years ended December 31, 2018 and 2019, the foreign exchange gains and losses mainly result from the variance of the exchange rate between the Euro and the U.S. dollar on U.S. dollar-denominated cash and cash equivalents and financial assets.

Unrealized gains and losses on financial assets relate to unquoted instruments.

Comparisons for the years ended December 31, 2017 and 2018

The following table sets forth a summary of our consolidated statements of income (loss) for the periods presented.

	Year ended December 31,	
	2017	2018(1)
	(in thousands)	
Revenue from collaboration and licensing agreements	€ 32,631	€ 79,892
Government financing for research expenditures	11,402	14,060
Revenue and other income	**44,033**	**93,952**
Research and development	(67,000)	(69,555)
Selling, general and administrative	(17,015)	(18,142)
Operating expenses	**(84,015)**	**(87,697)**
Net income (loss) from distribution agreements		(1,109)
Operating income (loss)	**(39,983)**	**5,146**
Financial income	2,501	6,002
Financial expenses	(10,535)	(8,429)
Net financial loss	**(8,034)**	**(2,427)**
Net income (loss) before tax	**(48,016)**	**2,718**
Income tax expense	(368)	333
Net income (loss)	**€ (48,385)**	**€ 3,049**

(1) The consolidated financial statements as of and for the year ended December 31, 2018 reflect the impacts of the adoption of IFRS 9 and IFRS 15 that became applicable on January 1, 2018. The comparative consolidated financial statements as of and for the year ended December 31, 2017 have not been restated. The impact on the consolidated statement of income (loss) of the adoption of IFRS 9 is not material and the impact of the adoption of IFRS 15 is presented in "Principal Components of Our Results of Operations—Revenue from Collaboration and Licensing Agreements." See Note 2.d to our consolidated financial statements appearing elsewhere in this Annual Report for more details on transition measures.

The table below provides a reconciliation of our consolidated statement of income (loss) as published for the year ended December 31, 2018 and our consolidated statement of income (loss) without the application of IFRS 15, which reflects the application of the same accounting principles as for the year ended December 31, 2017:

	Year ended December 31, 2018		
	As Published	IFRS 15 Impact	Excluding IFRS 15 Impact
		(in thousands)	
Revenue from collaboration and licensing agreements	€ 79,892	€ 21,033	€ 100,925
Government financing for research expenditures	14,060	–	14,060
Revenue and other income	**93,952**	**21,033**	**114,985**
Research and development	(69,555)	(15,542)	(85,097)
Selling, general and administrative	(18,142)	–	(18,142)
Operating expenses	**(87,697)**	**(15,542)**	**(103,239)**
Net income (loss) from distribution agreements	(1,109)	–	(1,109)
Operating income/(loss)	**5,146**	**5,491**	**10,637**
Financial income	6,002	–	6,002
Financial expenses	(8,429)	1,858	(6,571)
Net financial loss	**(2,427)**	**1,858**	**(569)**
Net income (loss) before tax	**2,718**	**7,349**	**10,067**
Income tax expense	333	–	333
Net income	**€ 3,049**	**€ 7,349**	**€ 10,397**

Revenue and other income

Revenue and other income resulted from collaboration and licensing agreements and government financing for research expenditure. Revenue and other income increased by €49.9 million, or 113.4%, to €94.0 million for the year ended December 31, 2018, as compared to revenue and other income of €44.0 million for the year ended December 31, 2017.

	Year ended December 31,	
	2017	2018
	(in thousands)	
Revenue from collaboration and licensing agreements	€ 32,631	€ 79,892
Government financing for research expenditures	11,402	14,060
Revenue and other income	**€ 44,033**	**€ 93,952**

Revenues from collaboration and licensing agreements

Revenues from collaboration and licensing agreements increased by €47.3 million, or 144.8%, to €79.9 million for the year ended December 31, 2018, as compared to revenues from collaboration and licensing agreements of €32.6 million for the year ended December 31, 2017. These revenues were derived principally under our agreements with AstraZeneca and are set forth in the table below.

	Year ended December 31,	
	2017	2018
	(in thousands)	
Proceeds from collaboration and licensing agreements:		
Monalizumab agreement	€ 32,346	€ 61,546
IPH5201 agreement		15,632
Proceeds from collaboration and licensing agreements	32,346	77,178
Invoicing of research and development (IPH5201 and avdoralimab agreements)	--	2,242
Exchange gains on collaboration and licensing agreements	272	465
Others	13	7
Revenue from collaboration and licensing agreements	**€ 32,631**	**€ 79,892**

Proceeds related to monalizumab. Revenue related to monalizumab increased by €29.2 million, or 90.3%, to €61.5 million for the year ended December 31, 2018, as compared to €32.3 million for the year ended December 31, 2017. This change is primarily due to (i) the exercise of the option by AstraZeneca in October 2018, which resulted in revenue of €32.0 million in the year ended December 31, 2018 and (ii) an increase of €18.3 million in revenue recognized in the period based on the percentage of completion of development work, partially offset by (iii) the impact of the adoption of IFRS 15, which had a negative impact of €21.0 million on revenue for the year ended December 31, 2018. As of December 31, 2018, the deferred revenue related to monalizumab is €104.9 million (€54.2 million as "Deferred revenue—Current portion" and €50.7 million as "Deferred revenue—Non-current portion").

Proceeds related to IPH5201. Revenue related to IPH5201 for the year ended December 31, 2018 was €15.6 million compared to nil for the year ended December 31, 2017. Revenue related to the partial recognition of the $50.0 million non-refundable upfront payment received from AstraZeneca in 2018, which has been recognized as revenue based on the percentage of completion of the development work. As of December 31, 2018, the amount not yet recognized in revenue amounted to €27.9 million, classified as "Deferred revenue—Current portion."

Invoicing of research and development costs. Revenue from invoicing of research and development costs for the year ended December 31, 2018 was €2.2 million compared to nil for the year ended December 31, 2017. Pursuant to our agreements with AstraZeneca, research and development costs related to avdoralimab are equally shared between us and AstraZeneca and research and development costs related to IPH5201 are fully borne by AstraZeneca, resulting in periodic settlement invoices.

Government financing for research expenditures

Government financing for research expenditures increased by €2.7 million, or 23.3%, to €14.1 million for the year ended December 31, 2018, as compared to €11.4 million for the year ended December 31, 2017. This change is primarily a result of an increase in the research tax credit of €2.5 million, which is mainly due to an increase in eligible research and development personnel expenses and an increase in amortization of the monalizumab intangible asset following the additional consideration due to Novo Nordisk A/S in 2018. The table below details government funding for research expenditures for the years ended December 31, 2017 and 2018.

	Year ended December 31,	
	2017	2018
	(in thousands)	
Research tax credits	€ 11,041	€ 13,527
Grants	361	533
Government financing for research expenditures	**€ 11,402**	**€ 14,060**

The research tax credit is calculated as 30% of the amount of research and development expenses, net of grants received, eligible for the research tax credit for the years ended December 31, 2017 and 2018.

Operating expenses

The table below presents our operating expenses for the years ended December 31, 2017 and 2018.

	Year ended December 31,	
	2017	2018
	(in thousands)	
Research and development	€ 67,000	€ 69,555
Selling, general and administrative	17,015	18,142
Total operating expenses	**€ 84,015**	**€ 87,697**

Research and development expenses

Our research and development expenses in the periods presented primarily relate to activities for our monalizumab, lacutamab and avdoralimab programs.

Our research and development expenses are broken down as set forth in the table below:

	Year ended December 31,	
	2017	2018
	(in thousands)	
Monalizumab(1)	€ 15,992	€ 8,794
Lacutamab	14,750	15,019
Avdoralimab	333	9,883
Other preclinical programs	7,295	7,713
Lumoxiti(2)	--	1,094
Discovery projects and other	3,912	3,643
Total direct research and development expenses	**42,282**	**46,146**
Personnel expenses (including share-based payments)	14,692	14,226
Other expenses	10,026	9,183
Personnel and other expenses	**24,718**	**23,409**
Total research and development expenses	**€ 67,000**	**€ 69,555**

(1) As a result of the adoption of IFRS 15 as of January 1, 2018, monalizumab expenses do not include our co-funding share of research and development work performed by AstraZeneca, which amounted to €15.5 million and is recorded as a reduction to the transaction price, which is to be recorded as a revenue based on the percentage of completion. See the table appearing on Section 2.d of this Annual Report for reconciliation to IFRS 15.

(2) Lumoxiti research and development expenses mainly relate to the generation of additional data for regulatory purposes.

Research and development increased by €2.6 million, or 3.8%, to €69.6 million for the year ended December 31, 2018, as compared to research and development of €67.0 million for the year ended December 31, 2017. The increase is mainly explained by: (i) an increase of €9.6 million in expenses related to avdoralimab following our acquisition of the related rights from Novo Nordisk in June 2017, (ii) an increase of €8.3 million in expenses related to the progress of our monalizumab program (excluding the IFRS 15 impact), partially offset by (iii) a decrease of €15.5 million related to the impact of IFRS 15.

Personnel expenses including share-based compensation to our employees and consultants decreased by €0.5 million, or 3.2%, to €14.2 million for the year ended December 31, 2018, as compared to €14.7 million for the year ended December 31, 2017. This decrease is the cumulative impact of (i) the decrease of €3.0 million in share-based payments partially offset by (ii) the increase in wages and salaries of €2.5 million due to increases in employee headcount and bonuses paid. As of December 31, 2017 and 2018, we had 147 and 154 employees engaged in research and development activities, respectively.

Selling, general and administrative expenses

Selling, general and administrative expenses increased by €1.1 million, or 6.6%, to €18.1 million for the year ended December 31, 2018, as compared to €17.0 million for the year ended December 31, 2017. Selling, general and administrative expenses represented a total of 20.3% and 20.7% of the total operating expenses for the years ended December 31, 2017 and 2018, respectively.

The table below presents our selling, general and administrative expenses by nature for the years ended December 31, 2017 and 2018:

	Year ended December 31,	
	2017	2018
	(in thousands)	
Personnel expenses (including share-based payments)	€ 10,456	€ 7,601
Non scientific advisory and consulting	3,794	5,301
Other expenses(1)	2,765	5,240
Total selling, general and administrative	**€ 17,015**	**€ 18,142**

(1) Other expenses are related to intellectual property, maintenance costs for laboratory equipment and our headquarters, depreciation and amortization and other selling, general and administrative expenses.

Personnel expenses includes the compensation paid to our employees and consultants, and decreased by €2.9 million, or 27.3%, to €7.6 million for the year ended December 31, 2018, as compared to personnel expenses of €10.5 million for the year ended December 31, 2017. This decrease results from a decrease in share-based payments of €4.3 million, partially offset by the increase in wages and salaries of €1.4 million. As of December 31, 2017, we had 41 employees in general and administrative functions, which was stable compared to December 31, 2018.

Non-scientific advisory and consulting expenses mostly consist of auditing, accounting, taxation and legal fees as well as consulting fees in relation to business strategy and operations and hiring services. Non-scientific advisory and consulting expenses increased by €1.5 million, or 39.7%, to €5.3 million for the year ended December 31, 2018 as compared to €3.8 million for the year ended December 31, 2017, primarily as a result of our agreement with AstraZeneca entered into in October 2018.

Net income (loss) from distribution agreements

We recognized a net loss of €1.1 million from the Lumoxiti distribution agreement in the year ended December 31, 2018, which reflected immaterial revenue from sales of Lumoxiti in the period, less administrative and selling expenses associated with the sales revenue allocated to us.

Financial income (loss), net

Net financial loss decreased by €5.6 million, or 69.8%, to €2.4 million for the year ended December 31, 2018, as compared to €8.0 million for the year ended December 31, 2017.

The table below presents the components of our net financial loss for the years ended December 31, 2017 and 2018:

	Year ended December 31,	
	2017	2018
	(in thousands)	
Gains on financial assets	€ 1,254	€ 1,582
Foreign exchange gains	784	4,068
Other financial income	463	352
Financial income	**2,501**	**6,002**
Unrealized losses on financial assets	(3,238)	(3,942)
Interest on financial liabilities	(113)	(102)
Foreign exchange losses	(6,661)	(3,851)
Other financial expenses	(523)	(534)
Financial expenses	**(10,535)**	**(8,429)**
Net financial loss	**€ (8,034)**	**€ (2,427)**

For the years ended December 31, 2017 and 2018, the foreign exchange gains and losses mainly result from the variance of the exchange rate between the Euro and the U.S. dollar on U.S. dollar-denominated cash and cash equivalents and financial assets.

Unrealized losses on financial assets relate to unquoted instruments.

Critical Accounting Policies and Significant Judgments and Estimates

Our consolidated financial statements are prepared in accordance with IFRS. Some of the accounting methods and policies used in preparing the financial statements under IFRS are based on complex and subjective assessments by our management or on estimates based on past experience and assumptions deemed realistic and reasonable based on the facts and circumstances. The actual value of our assets, liabilities and shareholders' equity as well as our income and expenses could differ from the value derived from these estimates if conditions changed and these changes had an impact on the assumptions adopted. See Note 2 to our consolidated financial statements appearing elsewhere in this Annual Report.

We believe that the most significant management judgments and assumptions in the preparation of our consolidated financial statements are described below.

Accounting for collaboration and licensing arrangements

To date, our revenue has been generated primarily from payments received in relation to research, collaboration and licensing agreements signed with pharmaceutical companies. These contracts generally provide for components such as upfront payments, milestone payments upon reaching certain predetermined development objectives, research and development funding, as well as payment of royalties on future sales of products.

Non-refundable upfront payments are deferred and recognized as revenue over the period we are engaged to deliver services to the third-party. Revenue is recognized based on completion of the underlying work.

Milestone payments represent amounts received from our collaborators, the receipt of which is dependent upon the achievement of certain scientific, regulatory, or commercial milestones. We recognize milestone payments when the triggering event has occurred, there are no further contingencies or services to be provided with respect to that event, and the counterparty has no right to refund of the payment. The triggering event may be scientific results achieved by us or another party to the arrangement, regulatory approvals, or the marketing of products developed under the arrangement.

Measurement of the subcontracting costs relating to clinical trial costs

Our expense accruals for clinical trials are based on estimates of the fees associated with services provided by clinical trial investigational sites and clinical research organizations. Payments under some of the contracts we have with such parties depend on factors such as successful enrollment of patients, site initiation and the completion of clinical trial milestones. In accruing service fees, we estimate the time period over which services will be performed and the level of effort to be expended in each period. If possible, we obtain information regarding unbilled services directly from these service providers. However, we may be required to estimate these services based on other information available to us. If we underestimate or overestimate the activity or fees associated with a study or service at a given point in time, adjustments to research and development expenses may be necessary in future periods. Historically, our estimated accrued expenses have approximated actual expense incurred. However, due to the nature of such estimates, we cannot assure you that we will not make changes to our estimates in the future as we become aware of additional information about the status or conduct of our clinical trials and other research activities.

Measurement of AstraZeneca invoices under the monalizumab and Lumoxiti agreements

The quarterly invoices submitted under these agreements are based on estimates made by AstraZeneca on the basis of its accounting work, which requires AstraZeneca to make estimates regarding the advancement of clinical programs and associated costs. AstraZeneca provides us with an update on their budgets, which provides us with visibility into variations and allows us to identify potential deviations. These invoices have a significant impact on our operating expenses and trade payables.

Measurement of the fair value of free shares

Since January 1, 2018, we have granted share-based compensation under several plans to certain employees and members of our executive and supervisory boards in the form of free shares (*Attributions gratuites d'actions*, or AGA), free preferred shares convertible into ordinary shares (*Attributions gratuites d'actions de préférence convertibles en actions ordinaires*, or AGAP) and free performance shares (*Attributions gratuites d'actions de performance*, or AGA Perf) as follows:

Date	Types	Number of warrants issued as of December 31, 2019	Number of warrants outstanding as of December 31, 2019	Maximum number of shares to be issued as of December 31, 2019	Exercise price per share	Grant date share fair value
April 3, 2018	AGAP Employees 2017	5,725	5,339	533,900	–	€ 5.52
April 3, 2018	AGAP Management 2017	2,400	2,000	200,000	–	€ 5.52
April 3, 2018	AGA Employees 2017	114,500	–	–	–	€ 5.52
July 3, 2018	AGA Bonus Management 2018	67,028	–	–	–	€ 5.06
November 20, 2018	AGA Perf Employees 2018	327,500	307,500	307,500	–	€ 8.00
November 20, 2018	AGA Perf Management 2018	260,000	230,000	230,000	–	€ 8.00
January 14, 2019	AGA Employees 2018	90,650	85 650	85 650	–	€ 7.31
April 29, 2019	AGA New Members 2017-1	25,000	25,000	25,000	–	€ 5.74
July 3, 2019	AGA Bonus Management 2019	57,376	57,376	57,376	–	€ 5.90
November 4, 2019	AGA Perf Management 2019	355,000	355,000	355,000	–	€ 3.13
November 4, 2019	AGA Perf Employees 2019	546,700	532,800	532,800	–	€ 3.13

We account for share-based compensation in accordance with the authoritative guidance on share-based compensation, IFRS 2 *Share-based payment*, or IFRS 2. Pursuant to IFRS 2, the awards are measured at their fair value on the date of grant. The fair value is calculated with the most relevant formula regarding the conditions and the settlement of each plan.

Determining the fair value of share-based awards at the grant date requires judgment. We use the Black-Scholes option and Monte Carlo approach pricing models to determine the fair value of share-based compensation. Free preference shares plans includes performance conditions that are based on the market price of our ordinary shares. Holders of free preference shares may also benefit from accelerated vesting triggered by the achievement of internal goals.

The determination of the grant date fair value of warrants and free shares is affected by assumptions regarding a number of complex and subjective variables. These variables include the fair value of our ordinary shares on the date of grant, the expected term of the awards, our share price volatility, the employee turnover weighted average probability, risk-free interest rates, expected dividends, and performance conditions when applicable. We estimate these items as follows:

Fair value of our ordinary shares. As our ordinary shares are publicly traded on Euronext Paris, for purposes of determining the fair value of our ordinary shares we have established a policy of using the closing sales price per ordinary share as quoted on Euronext Paris on the date of the grant by the management board.

Expected Volatility. We use the historical volatility of our ordinary shares on Euronext Paris, made on the basis of a Capital Asset Pricing model of the share price using a Monte Carlo approach.

Employee turnover weighted average probability. This rate is based on the historical data from our company.

Risk-Free Interest Rate. The risk-free interest rate is based on the Euribor swap.

Dividend Yield. We have never declared or paid any cash dividends and do not presently plan to pay cash dividends in the foreseeable future. Consequently, we have used an expected dividend yield of zero.

If any of the assumptions used in the Black-Scholes and Monte-Carlo models change significantly, share-based compensation for future awards may differ materially compared to the awards granted previously.

Measurement of employee-benefit obligations

The amount of defined benefit obligation is measured according to actuarial valuations. Inherent in these valuations are key actuarial assumptions such as the discount rate, mortality tables and rates of turnover in employee personnel. These assumptions are provided in Note 10 to our consolidated financial statements appearing elsewhere in this Annual Report. Any change in these actuarial assumptions could have a significant impact on our consolidated financial statements.

Measurement of contingencies and loss provision

As part of our activities, we may be exposed to contractual commitment risk. Management exercises its judgment to estimate the probability and amount of cash outflows, as well as the information to disclose regarding contingent liabilities.

Estimate of the recoverable amount of the acquired and under progress licenses

Impairment tests are performed on a yearly basis for the intangible assets which are not amortized (such as intangible assets in progress). We test amortizable intangible assets for impairment when there is an indicator of impairment. Impairment tests involve comparing the recoverable amount of the licenses to their net book value. The recoverable amount of an asset is the higher of its fair value less costs to sell and its value in use. If the carrying amount of any asset is above its recoverable amount, we recognize an impairment loss to reduce the carrying amount to the recoverable amount. The main assumptions used for the impairment test include (a) the amount of cash flows that are set on the basis of the development and commercialization plans and budgets approved by Management, (b) assumptions related to the achievement of the clinical trials and the launch of the commercialization, (c) the discount rate, (d) assumptions on risk related to the development and (e) for the commercialization, selling price and volume of sales, and are provided in Note 6 to our consolidated financial statements which are included elsewhere in this Annual Report. Any change in these assumptions could lead to the recognition of an impairment charge that could have a significant impact on our consolidated financial statements.

In case of failure of the clinical trials in progress, we may have to fully depreciate the intangible asset.

Estimate of the useful life of the acquired licenses

Intangible assets are amortized on a straight line basis over their anticipated useful life. The estimated useful life is the period over which the asset provides future economic benefits. It is estimated by management and is regularly revised by taking into consideration the period of development over which it expects to receive economic benefits such as collaboration revenues, royalties and product of sales. However, given the uncertainty surrounding the duration of the research and development activities for the programs in development and their likelihood to generate future economic benefits to the company, the estimated useful life of the rights related to these programs is rarely longer than the actual development phase of the product candidate. When a program is in commercialization phases, the useful life takes into account the protection of the exclusivity rights and the anticipated period of commercialization without taking into account any extension or additional patents.

B. Liquidity and Capital Resources.

The liquidity and capital resources discussion that follows contains certain estimates as of the date of this Annual Report of our estimated future sources and uses of liquidity (including estimated future capital resources and capital expenditures) and future financial and operating results. These estimates reflect numerous assumptions made by us with respect to industry performance, general business, economic, regulatory, market and financial conditions and other future events, and matters specific to our businesses, all of which are difficult or impossible to predict and many of which are beyond our control.

Sources and uses of liquidity

We have primarily financed our operations through our receipt of $475.0 million (€415.9 million) in payments from our collaborators, including AstraZeneca, since 2011, excluding payments received for purchases of our equity securities by our collaborators.

We have also financed our operations since our inception through several rounds of public and private financings. Since our inception, we have raised a total of €306.4 million through the sale of equity securities, including €33.7 million in the initial public offering of our ordinary shares on Euronext Paris in 2006 and €66.0 million in the initial public offering of our initial public offering of our ordinary shares on Nasdaq New-York in 2019.

In addition, we have received an aggregate of €80.6 million in research tax credits through December 31, 3019. As a French biopharmaceutical company, we have benefited from certain tax advantages, including, for example, the research tax credit. The research tax credit can be offset against French corporate income tax due and the portion in excess, if any, may be refunded. The research tax credit is calculated based on our claimed amount of eligible research and development expenditures in France. The research tax credit increased by €3.2 million, or 23,7 %, to €16.7 million for the year ended December 31, 2019, as compared to a research tax credit of €13.5 million for the year ended December 31, 2018.

Until December 31, 2018, we qualified as a small or medium size business. Therefore, the French Treasury refunded our 2017 and 2018 research tax credit claims during 2018 and 2019, respectively, and we received reimbursement of the 2018 research tax credit in compliance with the applicable regulatory rules in July 2019. We lost our status as a small or medium size business at the end of the year ended December 31, 2019 and, therefore, we will no longer be entitled to the immediate reimbursement of the Research Tax Credit but instead will be reimbursed within the expiry of a three-year period.

We are potentially eligible to earn a significant amount of milestone payments and royalties under our agreements with AstraZeneca in the event that we satisfy certain pre-specified milestones. We may enter into new collaboration agreements that also provide milestone payments. These milestone payments are dependent on the accomplishment of various development, regulatory and commercialization objectives, and the achievement of many of these milestones is outside of our control. However, our ability to earn these payments and their timing will, in part, be dependent upon the outcome of our research activities which is uncertain at this time.

On July 3, 2017, we borrowed from the bank Société Générale in order to finance the construction of our future headquarters. This loan, amounting to a maximum of €15.2 million, can be drawn down during the period of the construction in order to pay supplier payments as they become due, but in any event no later than August 30, 2019. We have decided to postpone this construction. Until this construction begins, the proceeds of the loan will be used to finance several projects, such as extension of our current building, improvement of our information systems and development of our commercial infrastructure. Repayment of any amounts drawn down are payable over a 12-year term beginning on August 30, 2019 and ending on August 30, 2031. As security for the loan, we pledged collateral in the form of financial instruments held at Société Générale amounting to €15.2 million. The security interest on the pledged financial instruments will be released in accordance with the following schedule: €4.2 million in July 2024, €5.0 million in July 2027 and €6.0 million in July 2031. We had drawn down €15.2 million under the loan as of December 31, 2019. The loan bears a fixed interest rate of 2.01%. Under the loan, we are subject to a covenant that our total cash, cash equivalents and current and non-current financial assets as of each fiscal year end will be at least equal to the amount of outstanding principal under the loan. The repayment period started on August 30, 2019.

We lease our headquarters in Luminy, Marseille, France under a finance lease agreement. The present value of the minimum lease payments until June 2020, which is the term of the lease, is recognized as a financial liability of €0.2 million as of December 31, 2019. In addition, we obtained a €1.5 million PTZI loan (Prêt à Taux Zéro Innovation—interest-free loan for innovation) from Banque Publique d'Investissement, or BPI France, in 2013. The loan is repayable beginning in September 2016 over five years and amounted to €0.5 million as of December 31, 2019. Lastly, during the years ended December 31, 2016 and 2017, we also used lease-financing and bank loans to finance the acquisition of laboratory equipment and to set up new laboratories. The debt related to these loans amounts to €1.1 million at December 31, 2019.

Liquidity position

Cash, cash equivalents and short-term investments increased by €51.3 million, or 30,6 %, to €218.9 million as of December 31, 2019, as compared to cash, cash equivalents and short-term investments of €167.5 million at December 31, 2018. The cash assets that we hold consist of current accounts and fixed term accounts. Short-term investments primarily consist of shares of money market funds and mutual funds. Their purpose is to finance our activities, including our research and development costs.

We have received a total of €306.4 million from capital increases, before deducting the costs associated with capital increases, and after excluding proceeds from share compensation instruments, between 1999 and December 31, 2019. The table below summarizes the main capital increases between 1999 and December 31, 2019.

Date	**Gross Proceeds**
April 2000	€ 1.2 million
March 2001	3.3 million
July 2002	20.0 million
March 2004	5.0 million
July 2004	10.0 million
March 2006	10.0 million
November 2006	33.7 million
December 2009	24.3 million
November 2013	20.3 million
June 2014	50.0 million
October 2018	62.6 million
October 2019	66.0 million
Total	**€ 306.4 million**

Cash flows

Comparisons for the year ended December 31, 2018 and 2019

The following table sets forth cash flow data for the years ended December 31, 2018 and 2019:

	Year ended December 31,	
	2018	2019
	(in thousands)	
Cash flows from / (used in) operating activities	€ (32,529)	€ 34,924
Cash flows from / (used in) investing activities	24 279	(62 121)
Cash flows from / (used in) financing activities	61,222	77,765
Effect of the exchange rate changes	(26)	5
Net increase / (decrease) in cash and cash equivalents	**€ 52,947**	**€ 50,572**

Cash flows from / (used in) operating activities

Our net cash flow from operating activities increased by €67.5 million to €34.9 million for the year ended December 31, 2019 as compared to net cash flows used in operating activities of €32.5 million for the year ended December 31, 2018. This improvement of our operating cash flows mainly results from the collection of €108.7 million of proceeds relating to the agreements signed with AstraZeneca in October 2018, partially offset by an increase of outflows in relation to our research and development activities.

Cash flows from / (used in) investing activities

Our net cash flows used in investing activities for the year ended December 31, 2019 were €62.1 million and mainly consisted of the upfront payment relating to the acquisition of Lumoxiti (€43.8 million) and the additional considerations relating to monalizumab (€13.1 million) and anti-CD39 (€7.0 million).

Our net cash flows from investing activities for the year ended December 31, 2018 were €24.3 million and mainly consisted of (i) disposal of net financial assets for €24.2 million, (ii) interest received on financial assets for €1.4 million, less (iii) acquisitions of property and equipment for €0.9 million and (iv) acquisition of intangible assets for €0.6 million.

Cash flows from / (used in) financing activities

Our net cash flows from financing activities for the year ended December 31, 2019 increased by €16.6 million to €77.8 million as compared to net cash flows from financing activities of €61.2 million for the year ended December 31, 2018 This increase mainly results from (i) the net proceeds of our initial public offering on the Nasdaq in October 2019 (€66.0 million), and (ii) the net proceeds from the drawdown of our borrowings, less repayments during the period (€11.9 million).

Comparisons for the year ended December 31, 2017 and 2018

The following table sets forth cash flow data for the years ended December 31, 2017 and 2018:

	Year ended December 31,	
	2017	2018
	(in thousands)	
Cash flows from / (used in) operating activities	€ (48,060)	€ (32,531)
Cash flows from / (used in) investing activities	(29,460)	24,279
Cash flows from / (used in) financing activities	915	61,222
Effect of the exchange rate changes	66	(26)
Net increase / (decrease) in cash and cash equivalents	**€ (76,539)**	**€ 52,947**

Cash flows from / (used in) operating activities

Our net cash flow used in operations decreased by €15.5 million to €32.5 million for the year ended December 31, 2018 as compared net cash flows used in operations of €48.1 million for the year ended December 31, 2017. This improvement of our operating cash flows results from the collection of €40.3 million of proceeds relating to the agreements signed with AstraZeneca in October 2018, partially offset by an increase of outflows in relation to our research and development activities.

Cash flows from / (used in) investing activities

Our net cash flows from investing activities for the year ended December 31, 2018 were €24.3 million and mainly consisted of (i) disposal of net financial assets for €24.2 million, (ii) interest received on financial assets for €1.4 million, less (iii) acquisitions of property and equipment for €0.9 million and (iv) acquisition of intangible assets for €0.6 million.

Our net cash flows used in investing activities for the year ended December 31, 2017 were €29.5 million and mainly consisted of (i) acquisitions of net financial assets for €25.7 million, (ii) the avdoralimab acquired rights from Novo Nordisk A/S resulting in a cash out flows of €2.8 million, as the remaining part of the upfront payment of €40.0 million was contributed in kind through a capital increase of €37.2 million, (iii) acquisitions of property and equipment for €3.0 million (mainly related to the acquisition of the land attached to our headquarters and certain pieces of laboratory equipment), less (iv) interest received on financial assets for €1.4 million.

The acquisitions of current financial assets consist of purchases of current marketable securities that do not meet the conditions under IAS 7 Statement of cash flows to be considered as cash equivalents. See Note 4 to our consolidated financial statements for the year ended December 31, 2018 appearing elsewhere in this Annual Report.

Cash flows from / (used in) financing activities

Our net cash flows from financing activities for the year ended December 31, 2018 increased by €60.3 million to €61.2 million as compared to net cash flows from financing activities of €0.9 million for the year ended December 31, 2017. On October 22, 2018, AstraZeneca acquired 9.8% of our capital through the issuance of 6,260,500 new shares at €10 per share, generating a €62.6 million cash inflow.

Funding requirements

We believe that our existing cash, cash equivalents, short-term investments and non-current financial assets, will enable us to fund our operations for the next twelve months. We have based this estimate on assumptions that may prove to be wrong, and we could use our capital resources sooner than we currently expect.

Until we can generate a sufficient amount of revenue from sale of approved products, if ever, we expect to finance our operating activities through our existing liquidity and expected milestone payments from collaborators.

Our present and future funding requirements will depend on many factors, including, among other things:

- the size, progress, timing and completion of our clinical trials and preclinical studies for any current or future product candidates, including our lead product candidates, monalizumab, lacutamab and avdoralimab;
- the number of potential new product candidates we identify and decide to develop;
- costs associated with our payment obligations to third parties in connection with our development and potential commercialization of certain of our product candidates;
- costs associated with expanding our organization;
- the costs involved in filing patent applications and maintaining and enforcing patents or defending against claims of infringement raised by third parties;
- the time and costs involved in obtaining regulatory approval for our product candidates and any delays we may encounter as a result of evolving regulatory requirements or adverse results with respect to any of these product candidates;
- selling and marketing activities undertaken in connection with the commercialization of Lumoxiti and any other current or future product candidates, including monalizumab, lacutamab, avdoralimab and IPH5201 and other product candidates, together with the costs involved in the creation of a sales and marketing organization; and
- the amount of revenues, if any, we may derive either directly, or in the form of milestone or royalty payments from any future potential partnership agreements, from monalizumab, IPH5201, or relating to our other product candidates.

For more information as to the risks associated with our future funding needs, see "Risk Factors—We may need to raise additional funding to complete the development and any commercialization of our product candidates, which may not be available on acceptable terms, or at all, and failure to obtain this necessary capital when needed may force us to delay, limit or terminate our product development efforts or other operations."

Capital expenditures

Our operations mainly require investment in intangible assets. We acquired the rights of avdoralimab from Novo Nordisk A/S in 2017. We paid an upfront of €40.0 million, of which €37.2 million was contributed in new ordinary shares and €2.8 million in cash.

In January 2019, we paid to AstraZeneca an initial payment for the license related to Lumoxiti ($50.0 million, or €43.8 million, using the foreign exchange rate of 1.1422 at the date of payment), and in February 2019, we paid to Novo Nordisk A/S additional consideration relating to monalizumab ($15.0 million, or €13.1 million using the exchange of 1.1394 at the date of payment). In June 2019, we paid €7.0 million to Orega Biotech in relation to the anti-CD39 program as consideration following the collaboration and option agreement signed on October 22, 2018 with AstraZeneca regarding IPH5201.

Our operations generally require little investment in tangible assets because we outsource most of the manufacturing and research activities to third parties. We lease some of our computer equipment under operating lease agreements. We account for our payments for these items as operating expenses in the consolidated statement of income.

Our capital expenditures in the years ended December 31, 2017, 2018 and 2019 primarily related to laboratory equipment. Clinical research and development costs are not capitalized until marketing authorizations are obtained.

Our corporate office in Luminy, Marseille, France is leased under a finance lease agreement signed in 2008 with Sogebail, a subsidiary of Société Générale, for an aggregate of €6.6 million. The lease-financing agreement has a 12-year term. We have a purchase option for all of the buildings and land for the lump sum of €1 at the end of the term of the contract on June 9, 2020, which we have exercised.

Since July 2017, we also rent office space in Marseille, France under a commercial lease.

C. Research and Development.

For a discussion of our research and development activities, see "Item 4.B—Business Overview" and "Item 5.A—Operating Results."

D. Trend Information.

An outbreak of a novel strain of coronavirus (i.e. COVID-19), which first emerged in the PRC in late December 2019, has since spread to other parts of the world, including the U.S. and Europe, where we have planned or ongoing clinical trials. We could experience or continue to experience disruptions relating to this pandemic that could severely impact our business. The full extent, consequences, and duration of the COVID-19 pandemic and the resulting impact on our business, financial condition and results of operations cannot be predicted on the date of this Annual Report. We will continue to evaluate the impact that the COVID-19 pandemic could have on our business, financial condition and results of operations during the year ending December 31, 2020.

See "Item 4D.—Risk Factors—Risks Related to the Development and Commercialization of Lumoxiti and Our Product Candidates—The recent global COVID-19 pandemic could adversely affect our business, financial condition and results of operations."

E. Off-Balance Sheet Arrangements.

During the periods presented, we did not, and we do not currently, engage in off-balance sheet financing arrangements as defined under SEC rules, such as relationships with other entities or financial partnerships, which are often referred to as structured finance or special purpose entities, established for the purpose of facilitating financing transactions that are not required to be reflected on our consolidated statement of financial position. In addition, we do not engage in trading activities involving non-exchange traded contracts. We therefore believe that we are not materially exposed to any financing, liquidity, market or credit risk that could arise if we did engage in these relationships.

F. Tabular Disclosure of Contractual Obligations.

The following table summarizes our contractual obligations (principal amount only) as of December 31, 2019:

(in thousands of euro)	≤ 1 year	2 to 5 years included	≥ 5 years	Total
BPI PTZI IPH41	300	150	–	450
Lease liabilities – Real estate property(1)	418	–	–	418
Down-payment(2)	(74)	–	–	(74)
Lease liabilities – Rent "Le Virage"(3)	77	1,203	157	1,437
Lease liabilities – Premises Innate Inc	25	329	142	496
Lease liabilities – Laboratory equipment	175	640	–	815
Lease liabilities – Vehicles	16	21	–	37
Loans – Equipment	55	222	42	319
Loan – Building	1,139	4,793	8,894	14,826
Total	**2,131**	**7,358**	**9,235**	**18,723**

The table below summarizes our contractual obligations (principal amount and interest) as of December 31, 2019:

(in thousands of euro)	≤ 1 year	2 to 5 years included	≥ 5 years	Total
BPI PTZI IPH41	300	150	–	450
Lease finance obligations – Real estate property(1)	420	–	–	420
Down-payment(2)	(74)	–	–	(74)
Lease finance obligations – Rent Le Virage(3)	106	1,272	159	1,537
Lease liabilities – Premises Innate Inc.	34	355	144	533
Lease liabilities – Laboratory equipment	179	647	–	826
Lease liabilities – Vehicles	19	22	–	41
Loans – Equipment	57	228	43	328
Loan – Building	1,427	5,706	9,391	16,524
Total	**2,468**	**8,380**	**9,737**	**20,585**

(1) Lease finance obligations—real estate relate primarily to real estate property in relation to our acquisition of our headquarters and main laboratories.
(2) We paid a guarantee to Sogebail for our real estate lease in the form of a down payment. This down payment amounted to €0.1 million as of December 31, 2019.
(3) On January 10, 2020, the Company signed an amendment to its lease in order to expand its premises ("Le Virage"). This amendment also extends the duration of the contractual commitment. The effective date of this amendment is January 15, 2020. The figures presented do not include the payments relating to this amendment.

The commitment amounts in the table above are associated with contracts that are enforceable and legally binding and that specify all significant terms, including fixed or minimum services to be used, fixed, minimum or variable price provisions, and the approximate timing of the actions under the contracts. The table does not include obligations under agreements that we can cancel without a significant penalty as well as obligations under our employment benefit plans, which amounted to €3.8 million as of December 31, 2019.

As of December 31, 2019, we have non-cancellable purchase commitments for a total of €0.2 million with various CMOs.

As part of a supply of scientific equipment, we were committed towards a supplier to minimum annual purchases of consumables. As of December 31, 2019, the overall commitment amounted to €0.1 million for the period from January to June 2020.

In addition, we have certain obligations under the terms of research, collaboration and licensing agreements which usually require us to bear all expenses relating to the procurement, examination and extension procedures of patents, as well as to uphold and defend the patents and will require, according to certain milestones, the payment of lump sums and royalties on sales to the licensor. The timing of the obligations depends on when related milestones are reached, which cannot be anticipated.

We also signed option agreements which require us to (i) bear all expenses relating to the procurement, examination and extension procedures of patents, as well as to uphold and defend the patents, (ii) pay a lump sum of money as option payment and (iii) if we decide to later opt-in, to pay to the licensor of lump sums (milestone payments) and royalties on sales.

Lastly, we signed certain agreements with collaborators, which defined the rules of joint-ownership and the granting of rights regarding certain aspects of intellectual property. Under these contracts, we usually bear all expenses relating to the procurement, examination and extension procedures of the patents and to any procedure required to uphold and defend the patents. These agreements also usually require, in exchange for a license over the share of rights owned by the co-owner, and according to certain milestones, the payment of lump sums and royalties on sales to the co-owner. For example, we may be obligated to pay Novo Nordisk A/S up to €20.0 million in potential regulatory milestones relating to monalizumab and tiered mid-to-high single-digit percentage royalties on net sales of monalizumab products, and up to an aggregate of €370.0 million upon the achievement of development, regulatory and sales milestones relating to avdoralimab and tiered royalties ranging from a low double-digit to low-teen percentage of net sales of avdoralimab. We may also be obligated to pay Orega Biotech up to an additional €51.5 million in the aggregate upon the achievement of development and regulatory milestones, and mid-single digit to low-teen percentage payments, depending on determinations relating to Orega Biotech's intellectual property rights for certain patents, on sublicensing revenues we receive pursuant to our agreement with AstraZeneca relating to IPH5201. Finally, in January 2020, we made a $15.0 million milestone payment as a result of the achievement of a regulatory milestone relating Lumoxiti. We are also obligated to pay a low single digit percentage royalties on our net sales of Lumoxiti, and are obligated to pay Selexis SA, for each of lacutamab, IPH5201 and IPH5301, up to 1.6 million Swiss francs in development and regulatory milestones and either up to 50.0 million Swiss francs in commercial milestones or low single digit percentage royalties on net sales.

G. Safe Harbor.

This Annual Report contains forward-looking statements within the meaning of Section 27A of the Securities Act and Section 21E of the Exchange Act and as defined in the Private Securities Litigation Reform Act of 1995. See "Special Note Regarding Forward-Looking Statements."

Item 6. Directors, Senior Management and Employee.

A. Directors and Senior Management.

Directors and Officers

The following table sets forth information concerning the members of our Executive Board and Supervisory Board and our other executive officers as of December 31, 2019.

Name	Age	Position
Executive Board Members		
Mondher Mahjoubi, M.D.	61	Chairman of the Executive Board, Chief Executive Officer, Member of the Executive Committee
Yannis Morel, Ph.D.	46	Member of the Executive Board, EVP, Product Portfolio Strategy & Business Development, Member of the Executive Committee
Laure-Hélène Mercier	41	Member of the Executive Board, EVP, Chief Financial Officer, Member of the Executive Committee
Supervisory Board Members		
Hervé Brailly, Ph.D.	58	Chairman of the Supervisory Board
Irina Staatz-Granzer, Ph.D.	59	Member and Vice Chairman of the Supervisory Board
Jean-Yves Blay, Ph.D.	57	Member of the Supervisory Board
Gilles Brisson	68	Member of the Supervisory Board
Véronique Chabernaud, M.D.	58	Member of the Supervisory Board
Maïlys Ferrere(1)	57	Member of the Supervisory Board
Patrick Langlois, Ph.D.	74	Member of the Supervisory Board
Marcus Schindler, Ph.D.(2)	53	Member of the Supervisory Board
Other Executive Officers		
Pierre Dodion, M.D.	65	Member of the Executive Committee, EVP, Chief Medical Officer
Odile Belzunce	39	Member of the Executive Committee, VP Compliance, IT and Portfolio Management

Jennifer Butler	43	Member of the Executive Committee, EVP, U.S. General Manager of Innate Pharma US Inc.
Frédérique Brune	54	Member of the Executive Committee, VP Development, CMC and Supply Chain
Eric Vivier, D.V.M., Ph.D.	55	Permanent Guest to the Executive Committee, SVP, Chief Scientific Officer
Tracy Rossin	42	Member of the Executive Committee, VP, Global Head of Communications
Odile Laurent	58	Member of the Executive Committee, VP Human Resources

(1) As representative of Bpifrance Participations, the legal entity that holds this Supervisory Board seat.
(2) As representative of Novo Nordisk A/S, the legal entity that holds this Supervisory Board seat.

Executive Board

Mondher Mahjoubi, M.D., Chief Executive Officer and Chairman of our Executive Board, was appointed as our Chief Executive Officer and Chairman of our Executive Board on December 30, 2016. Prior to joining us, Dr. Mahjoubi led the Oncology area at AstraZeneca beginning in November 2013 where he focused on the cancer pipeline and global strategy before becoming AstraZeneca's Oncology Global Manager in August 2016. In that role, he had direct responsibility for oncology global medical affairs and United States medical affairs. Prior to AstraZeneca, he was the Senior Vice President of Global Product Strategy in Oncology at Genentech and he previously held positions in marketing and medical affairs for Sanofi-Aventis. Dr. Mahjoubi holds a M.D. from the University of Tunis (Tunisia) and certifications in Medical Oncology from the University of Tunis and University of Paris Sud (France) and in Clinical Research and Methodology from the University of Lariboisiere-Saint Louis (France). He is trained as a medical oncologist and is a member of the American Society of Clinical Oncology and European Society of Medical Oncology.

Yannis Morel, Ph.D., member of the Executive Board and EVP, Product Portfolio Strategy and Business Development, joined us in 2001 and has held his current position since 2007 and was appointed as a member of our Executive Board on May 25, 2015. He was employed in various positions in our Research and Development Department, including immunology researcher and program manager, from 2001 to 2007. He received a Ph.D. in Oncology from Aix-Marseille University (France) and a B.S. in Molecular Physical Chemistry from Ecole Normale Supérieure de Cachan (France).

Laure-Hélène Mercier, member of the Executive Board and Chief Financial Officer, joined us in 2007, was appointed Chief Financial Officer on December 30, 2016 and was appointed as a member of our Executive Board on January 31, 2019. Prior to her current position, Ms. Mercier served as Executive Vice President Finance and was previously our Director of Investor Relations. Prior to joining us, Ms. Mercier held positions as an equity analyst at Oddo Securities and Natexis Bleichroeder. She has a MSc. (DEA) in Neurosciences from Université Aix-Marseille (France) and a M.B.A. from ESSEC Business School (France).

Supervisory Board

Hervé Brailly, Ph.D., Chairman of the Supervisory Board, is our co-founder and chaired our Executive Committee from the time of our founding in 1999 until we were converted into a *société anonyme* with an executive board and supervisory board on June 13, 2005. Dr. Brailly served as our Chief Executive Officer until December 30, 2016. Prior to joining us, he spent his entire career at Immunotech SA, a biotechnology company acquired in 1995 by Beckman-Coulter, where he held various leadership positions. Dr. Brailly also serves on the boards of directors of Deinove SA (ALDEI) since May 2017. Dr. Brailly received a Ph.D. in Immunology, with a specialization in immuno-pharmacology, from the Ecole des Mines de Paris (France).

Irina Staatz-Granzer, Ph.D., Vice Chairman and member of the Supervisory Board, has served on our Supervisory Board since 2009. Dr. Staatz-Granzer has held business development positions at Hermal, Boots Healthcare International, Knoll, Scil Biomedicals and was CEO of Scil Technology Gmbh and U3 Pharma AG. She founded and is currently CEO of Staatz Business Development & Strategy. Dr. Staatz-Granzer also serves as Chairman of Talix Therapeutics NV and Emergence Therapeutics AG and as President of PLCD (German Pharma Licensing Club). Dr. Staaz-Granzer received a degree in pharmacy from Philipps-Universität Marburg (Germany) and a Ph.D. from the University of Tübingen (Germany).

Jean-Yves Blay, Ph.D., member of the Supervisory Board, has served on our Supervisory Board since 2017. Prof. Blay has held the post of General Director of the Centre Léon Bérard in Lyon, France, since 2014 and became President of Unicancer in 2019. He holds the position of the French Sarcoma Group, and acts as Network Director of the European Reference Network for rare adult cancers (EURACAN). He held the position of President of the European Organization for Research and Treatment of Cancer. Prof. Blay is a trained medical oncologist and received a Ph.D. from the University Claude Bernard in Lyon (France).

Gilles Brisson, member of the Supervisory Board, has served on our Supervisory Board since 2007 and was the Chairman until December 30, 2016. Mr. Brisson has worked in management positions at Rhône-Poulenc and then at Aventis Pharma, where he served as Chairman of the Executive Board, Chairman of the Supervisory Board and Europe Manager. Until July 2018, Mr. Brisson also served as Chairman of the Supervisory Board Financiere Verdi III. He currently serves as a member of the Supervisory Board Financiere Verdi III, and is a member of the Board of Directors of LFB SA.

Véronique Chabernaud, M.D., member of the Supervisory Board, has served on our Supervisory Board since 2015. Dr. Chabernaud is an oncologist and has worked for 20 years in the pharmaceutical industry. In particular, she was the Director of the French Oncological Operational Unit at Sanofi Aventis, a Vice President of Marketing and Sales at Aventis Intercontinental and Europe, and Director of Oncology Global Medical Affairs at Rhône Poulenc Rorer. She has also consulted with companies in France and abroad. Such companies include Genomic Health, BioSystems International, MaunaKea Technologies and Ariana Pharma. In 2007, Dr. Chabernaud founded Créer la Vitalité, which helps companies and organizations in the development of a global health approach. Dr. Chabernaud also founded the association “Enfance et Vitalité” which offers health workshops to children. She is a graduate of ESSEC Business School (France) and has a M.D. in Medicine, Oncology and Cancer Biology from Faculté Xavier Bichat in Paris (France). Since 2019, Véronique Chabernaud has been Chairman of the Board of Directors and Chairman of the Compensation and nomination committee of Groupe Bastide le confort médical (BLC).

Maïlys Ferrere, member of the Supervisory Board, has served on our Supervisory Board since 2017 when she was appointed after being proposed by our shareholder Bpifrance. Ms. Ferrere has been Director of the Large Venture Investment team, Innovation Division of Bpifrance since 2012. Previously, Ms. Ferrere was an Investment Director at the Strategic Investment Fund between 2009 and 2012 and served as a member of the Board of Pixium Vision, Gensight Biologics, and as member of Supervisory board of Valneva SE (VE). Ms. Ferrere also serves as member of the Board of DBV Technologies SA, Sequans Communications SA and Euronext Paris. She received a Bachelor degree in Business Law from Pantheon-Sorbonne University, Paris (France) and graduated from IEP Paris (School of Higher Education for Political Studies), and the French Society for Financial Analysts.

Patrick Langlois, Ph.D., member of the Supervisory Board, has served on our Supervisory Board since 2010. Dr. Langlois has been Associate Managing Director of PJL Conseils since 2005. Dr. Langlois worked for the Rhône-Poulenc group starting in 1975 and was appointed the Financial Director in 1997, where he served until 1999. From 2000 through 2004, he worked at Aventis. Dr. Langlois also serves as the chairman of the board of directors of French company Sensorion SA and also serves as a director of Newron (Italy). He received a Ph.D. in Economics from the University of Rennes (France).

Marcus Schindler, Ph.D., (Prof. (adj.), member of the Supervisory Board, has served on our Supervisory Board since 2018 when he was appointed after being proposed by our shareholder Novo Nordisk A/S. Dr. Schindler has been Senior Vice President and Head of Global Drug Discovery at Novo Nordisk A/S since April 2018. Dr. Schindler has close to 20 years of experience in leadership roles in the pharmaceutical industry, working both in international large pharma and biotechnology companies, including Astra Zeneca (Sweden), Boehringer Ingelheim (Germany) and (OSI) Prosidion (UK). He received a Ph.D. in Pharmacology from the University of Cambridge.

Other Executive Officers

Pierre Dodion, M.D., Member of the Executive Committee, Executive Vice President and Chief Medical Officer, joined us in that role in 2014. Prior to joining us, Dr. Dodion served as Senior Vice President, Chief Medical Officer and later as Senior Vice President of Corporate Development and Operations at Nasdaq-listed ARIAD Pharmaceuticals from 2007 until 2013. He previously held positions at Pfizer, Novartis and Aventis. Dr. Dodion received a M.D. from Free University of Brussels (Belgium) and a M.B.A. from Saint Joseph University in Philadelphia.

Odile Belzunce, Member of the Executive Committee, Vice President, Compliance, IT and Portfolio Management, was appointed as a member of our Executive Committee on January 31, 2019. During the ten years prior to Ms. Belzunce joining our Executive Committee, Ms. Belzunce served as our Quality Manager and Head of Compliance. Ms. Belzunce received a DESS “Analyse & Qualité” from Aix-Marseille University (France).

Jennifer Butler, Member of the Executive Committee, Executive Vice President and U.S. General Manager, joined us in that role in 2019. Prior to joining us, Ms. Butler served as Chief Business Officer, Chief Commercial Officer and Head of U.S. Operations at Tessa Therapeutics from July 2017 until March 2019. Prior to Tessa Therapeutics, Ms. Butler served for more than ten years in various commercial roles with increasing responsibility at AstraZeneca and MedImmune. Ms. Butler received a B.A. Biological Basis of Behavior with a concentration in the Physiology of Neural Systems from University of Pennsylvania.

Frédérique Brune, Member of the Executive Committee, Vice President Development, CMC and Supply Chain, was appointed as a member of our Executive Committee on July 1, 2019 after previously serving as our Senior Director of Development, CMC and Pharmaceutical Operations since March 2017. Prior to joining us, Ms. Brune served as Quality Director of Bioproduction at LFB-Biotechnologies from March 2016 to March 2017. From September 2007 to March 2016, she worked as Director of Development programs as well as Interim Head Pharmacist at LFB-Biotechnologies. Prior to LFB-Biotechnologies, Ms. Brune served in various roles and responsibilities from 2001 to 2007 at Pierre Fabre Research Institute, including as Analytical Development and Quality Control Director, Pharmacist delegate and Program Director. Ms. Brune graduated from the faculty of Pharmacy Paris XI and holds a Master of Science in Experimental and Clinical Pharmacology from University Paris VI.

Eric Vivier, D.V.M., Ph.D., Permanent guest to the Executive Committee, Senior Vice President, Chief Scientific Officer, joined us in that role in 2018. Prior to joining us, Dr. Vivier joined the Center of Immunology at Marseille-Luminy (CIML) in 1993, becoming its Director in 2008 until 2017. Dr. Vivier received a Doctor of Veterinary Medicine from Ecole Nationale Vétérinaire de Maisons-Alfort (France) and holds a Ph.D. in Immunology from the Paris University (Paris XI) (France).

Tracy Rossin, Member of the Executive Committee, Vice President, Global Head of Communications, joined us in September 2019. Prior to this, she served as Head of Corporate Affairs at MedImmune from November 2015 to September 2019 and as Director, External Communications from July 2012 to October 2015. From 2006 to 2012, Ms. Rossin served as Global Brand Communications Director at AstraZeneca. Ms. Rossin received a Bachelor of Arts degree in Communications and Political Science from Miami University.

Odile Laurent, Member of the Executive Committee, Vice President, Human Resources Director, joined us in that role in September 2017. Prior to joining us, Ms. Laurent was Group Human Resources Director at Marie Brizard Wine&Spirits Group from 2015 to 2017. Previously, Ms. Laurent was Director of Human Resources for the 'Power Transformers' business unit at Areva T&D, and was subsequently appointed Head of Global Sales at Alstom Grid. Ms. Laurent has spent most of her career at Sanofi-Aventis. From 2005 to 2008 she was successively in charge of the Multi-site and European Human Resources Department of the 'Matures Products and OTC' business unit, and later of the Supply-Chain business unit worldwide. Ms. Laurent holds a PhD in Physical Sciences from the Institut National Polytechnique of Toulouse and a Master of Business Administration in Human Resources from the Institut d'Administration des Entreprises of Toulouse (France).

Family Relationships

There are no family relationships among any of the members of our Executive Board and Supervisory Board.

B. Compensation.

Compensation of Members of the Executive and Supervisory Boards

Following the entry into force of the Sapin 2 Law (French law no. 2016-1691 of December 9, 2016), the Ordonnance no. 2019-1234 dated November 27, 2019 and the Decree no. 2019-1235 dated November 27, 2019, the payment of any variable or exceptional compensation attributed for a financial year to the Chairman of the Supervisory Board, the Chairman of the Executive Board and members of the Executive Board, is subject to approval at the next ordinary general meeting (ex-post vote). The payments of the below variable compensations, for the year ended December 31, 2019, will be submitted for approval to the ordinary and extraordinary shareholder meeting to be held on May 19, 2020. In addition to the ex-post vote described above, French law also requires that the compensation policy for the members of the Executive and Supervisory Board for the year ending December 31, 2020 is subject to the approval at the ordinary general meeting relating to the year ending December 31, 2020.

Compensation of Members of the Supervisory Board

Attendance Fees

We pay attendance fees to the members of the Supervisory Board, except for the permanent representatives of Novo Nordisk A/S and Bpifrance Participations and the Chairman of the Supervisory Board. At our general meeting of shareholders held on May 22, 2019, shareholders set the total attendance fees to be distributed among the members of the Supervisory Board at €240,000. The attendance fees consist of a fixed portion and a variable portion based on attendance at meetings of the Supervisory Board and its committees. The following table shows the framework for our attendance fees for the year ended December 31, 2019:

	Member Role		Attendance Fee
Fixed Portion (annual fee)	Supervisory Board Member	€	15,000
Variable Portion (attendance fee at each meeting of the Supervisory Board)	Supervisory Board/Committee Chairman	€	3,500
	Other Members of the Supervisory Board	€	2,000
Variable Portion (attendance fee at each meeting of a committee of the Supervisory Board)	Committee Chairman	€	2,000
	Other Committee Members	€	1,300

The following table sets forth information regarding the attendance fees earned by members of the Supervisory Board during the year ended December 31, 2019:

Member		Attendance Fees
Gilles Brisson	€	42,600
Patrick Langlois	€	48,550
Irina Staatz-Granzer	€	27,550
Véronique Chabernaud	€	32,300
Jean-Yves Blay	€	24,000

The Supervisory Board of March 9, 2020 decided to put to the vote of our shareholders at the general meeting of shareholders to be held on May 19, 2020, a total attendance fees envelop to be distributed among the members of the Supervisory Board amounting to €260,000 for the year ending December 31, 2020. The following table shows the framework for our attendance fees for the year ended December 31, 2020:

	Member Role		Attendance Fee
Fixed Portion (annual fee)	Supervisory Board Member	€	15,000
	Audit Committee Chairman	€	20,000
Variable Portion (attendance fee at each meeting of the Supervisory Board)	Supervisory Board Chairman and Committee Chairman	€	3,500
	Other Members of the Supervisory Board	€	2,000
Variable Portion (attendance fee at each meeting of a committee of the Supervisory Board)	Compensation and Nomination Committee Chairman	€	2,000
	Audit Committee Chairman	€	5,000
	Committee member	€	1,300

Chairman Compensation

On December 14, 2016, the Supervisory Board decided that Hervé Brailly, the Chairman of the Supervisory Board, would receive specific compensation pursuant to article L.225-84 of the French Commercial Code for his duties as Chairman of the Supervisory Board. The Supervisory Board of January 31, 2019 decided to increase the fixed compensation of Mr. Brailly by €50,000 to a total of €100,000. During the year ended December 31, 2019, we paid Mr. Brailly €100,000 in specific compensation for his performance of these duties.

Agreement with Jean-Yves Blay

On September 14, 2018, we entrusted Jean-Yves Blay, a member of our Supervisory Board, with a specific mission pursuant to article L.225-84 of the French Commercial Code. Based on Mr. Blay's scientific and medical qualifications, we have agreed that he will attend meetings of our Strategic Advisory Board consisting of at least one meeting that he attends in-person and approximately two conference calls per year. Mr. Blay will participate in these Strategic Advisory Board meetings and then present a report to the Supervisory Board, at least once a year, on his opinions of the Strategic Advisory Board's proceedings. This agreement will remain in place for the duration of Mr. Blay's term of office as a member of the Supervisory Board, including any renewal terms. We have agreed to pay Mr. Blay €10,000 in compensation for his performance of these additional duties. During the year ended December 31, 2019, Mr. Blay did not participate to the meeting of the Strategic Advisory Board meeting and therefore was not paid for these additional duties.

Compensation of Members of the Executive Board

Framework for Executive Board Compensation

During the year ended December 31, 2019, the Executive Board consisted of Mondher Mahjoubi, Yannis Morel and Laure-Hélène Mercier. Dr. Mahjoubi served as Chairman of the Executive Board.

The compensation of members of the Executive Board is decided by the Supervisory Board upon recommendation by the compensation and nomination committee. The compensation of Dr. Mahjoubi, the Chairman of the Executive Board, is paid under his social mandate, whereas the compensation of Dr. Morel and Ms. Mercier is paid under their employment contract.

The compensation of members of the Executive Board includes the following components:

- *Fixed Compensation*. The members of the Executive Board receive fixed compensation pursuant to their employment agreement or, in the case of the Chairman, his social mandate.

- *Annual Variable Compensation*. The members of the Executive Board are eligible to receive annual variable compensation upon the recommendation of the compensation and nomination committee based on the achievement of pre-specified objectives. For the year ended December 31, 2019, such objectives were organized around four pillars: Scientific Excellence, Financial Discipline, Commercial Performance, Organization Readiness and Great Place to Work, each Executive board member having their own achievement percentage per each pillar and specific objectives based on their core functions. The members of the Executive Board are able to opt to receive a portion equivalent to 50%of their annual variable compensation in the form of free shares, increased by a 30% premium.

- *Performance Free Shares*. The members of the Executive Board are able to receive, upon authorization of the Supervisory Board and upon recommendation of the compensation and nomination committee, equity compensation in the form of performance free shares.

- *Other Benefits*. The members of the Executive Board receive other benefits consisting of a supplementary pension plan, in-kind benefits and, for the Chairman of the Executive Board, unemployment insurance.

2019 Compensation of Mondher Mahjoubi

The following table sets forth the compensation earned by Dr. Mahjoubi during the year ended December 31, 2019:

Type of Compensation		Amount of Compensation	Description
Fixed Compensation	€	470,000	Gross fixed compensation pursuant to Dr. Mahjoubi's social mandate.
Annual Variable Compensation—*Cash*	€	183,018	This amount represents 50% of Dr. Mahjoubi's annual variable compensation, based on his achievement of 100% of the annual objectives increased by 5 14.9% over-performance. Dr. Mahjoubi elected to receive the other 50% of his variable compensation in the form of free shares.
Annual Variable Compensation—*Free Shares*	€	185,165.28	Dr. Mahjoubi opted for the payment of 50% of his annual variable compensation in free shares, increased by a 30% premium. The Executive Board of July 3, 2019 attributed 31,068 free shares (AGA Bonus 2019) to Dr. Mahjoubi. The number of free shares was calculated on the basis of the weighted-average price per ordinary share for the 20 trading days preceding the shareholders meeting of May 22, 2019, amounting to €5.90 per share. These 31,068 free shares are valued at €185,165.28 on the basis of the stock price on December 31, 2019, or €5.96 per ordinary share.
Annual Variable Compensation—*Exceptional Premium*	€	100,000	The Supervisory Board granted this amount as an exceptional premium to Dr. Mahjoubi based on his crucial role during the company's Nasdaq IPO of the Company.
Performance Free Shares 2018	€	150,500	This amount was calculated in accordance with the IFRS 2 valuation of the grant to Dr. Mahjoubi of 70,000 performance free shares 2018.
Performance Free Shares 2019	€	282,000	This amount was calculated in accordance with the IFRS 2 valuation of the grant to Dr. Mahjoubi of 100,000 performance free shares 2019.
Benefits in Kind	€	20,240	Primarily represents amounts paid for use of a company car and additional retirement benefits (known as "article 83"), among other benefits.
Total Compensation	**€**	**1,390,923**	

2019 Compensation of Yannis Morel

The following table sets forth the compensation earned by Dr. Morel during the year ended December 31, 2019:

Type of Compensation	Amount of Compensation	Description
Fixed Compensation	€ 216,000	Gross fixed compensation pursuant to Dr. Morel's employment contract.
Annual Variable Compensation—*Cash*	€ 40,636	This amount represents 50% of Dr. Morel's annual variable compensation, based on his achievement of 100% of the annual objectives increased by 12.71% over-performance. Dr. Morel elected to receive the other 50% of his variable compensation in the form of free shares.
Annual Variable Compensation—*Free Shares*	€ 42,548	Dr. Morel opted for the payment of 50% of his annual variable compensation in free shares, increased by a 30% premium. The Executive Board of July 3, 2019 attributed 7,139 free shares (AGA Bonus 2019) to Dr. Morel. The number of free shares was calculated on the basis of the weighted-average price per ordinary share for the 20 trading days preceding May 22, 2019 shareholders meeting, amounting to €5.96 per share. These 7,139 free shares are valued at €42,548 on the basis of the stock price on December 31, 2019, or €5.90 per ordinary share.
Annual Variable Compensation—*Exceptional Premium*	€ 20,000	The Supervisory Board granted this amount as an exceptional premium to Dr. Morel based on his participation to the Nasdaq IPO of the Company
Performance Free Shares 2018	€ 107,500	This amount was calculated in accordance with the IFRS 2 valuation of the grant to Dr. Morel of 50,000 performance free shares 2018.
Performance Free Shares 2019	€ 141,000	This amount was calculated in accordance with the IFRS 2 valuation of the grant to Dr. Morel of 50,000 performance free shares 2019.
Benefits in Kind	€ 4,057	Primarily represents amounts paid for use of a company car and additional retirement benefits (known as "article 83"), among other benefits.
Total Compensation	**€ 571,741**	

2019 Compensation of Laure-Hélène Mercier

The following table sets forth the compensation earned by Ms. Mercier during the year ended December 31, 2019:

Type of Compensation		Amount of Compensation	Description
Fixed Compensation	€	180,000	Gross fixed compensation pursuant to Ms. Mercier's employment contract.
Annual Variable Compensation—*Cash*	€	34,538.4	This amount represents 50% of Ms. Mercier's annual variable compensation, based on her achievement of 100% of the annual objectives increased by 13.96% over-performance. Ms. Mercier's elected to receive the other 50% of his variable compensation in the form of free shares.
Annual Variable Compensation—*Free Shares*	€	35,456.04	Ms. Mercier's opted for the payment of 50% of his annual variable compensation in free shares, increased by a 30% premium. The Executive Board of July 3, 2019 attributed 5,949 free shares (AGA Bonus 2019) to Ms. Mercier. The number of free shares was calculated on the basis of the weighted-average price per ordinary share for the 20 trading days preceding May 22, 2019 shareholders meeting, amounting to €5.96 per share. These 5,949 free shares are valued at €35,456.04 on the basis of the stock price on December 31, 2019, or €5.90 per ordinary share.
Annual Variable Compensation—*Exceptional Premium*	€	45,000	The Supervisory Board granted this amount as an exceptional premium to Ms. Mercier based on her crucial role to the Nasdaq IPO of the Company
Performance Free Shares 2018	€	107,500	This amount was calculated in accordance with the IFRS 2 valuation of the grant to Ms. Mercier of 50,000 performance free shares 2018.
Performance Free Shares 2019	€	141,000	This amount was calculated in accordance with the IFRS 2 valuation of the grant to Ms. Mercier of 50,000 performance free shares 2019.
Benefits in Kind	€	1,618	Primarily represents amounts paid for additional retirement benefits (known as "article 83").
Total Compensation	**€**	**545,112**	

2020 Executive Board Compensation

At our general meeting of shareholders to be held on May 19, 2020, the compensation of the members of the Executive Board set forth in the following table for the year ended December 31, 2020 will be put to the vote of our shareholders:

Type of Compensation	Mondher Mahjoubi	Yannis Morel	Laure-Hélène Mercier(1)
Fixed Compensation	€ 470,000	€ 240,000	€ 200,000
Maximum Annual Variable Compensation if 100% of the objectives are reached	€ 282,000	€ 96,000	€ 120,000
Maximum Annual Variable Compensation if case of over-performance	€ 352,500	€ 80,000	€ 100,000

The variable compensation for the year ended December 31, 2020 is based on the achievement of certain pre-specified objectives. Certain of the objectives are general (science, commercial, finance, business development and great place to work) and the other objectives are specific and relate to the core functions of the member of the Executive Board. The variable compensation of Mr. Mahjoubi is solely based on the achievement of the general objectives. 60% of the variable compensation of Mr. Morel and Ms. Mercier is based on the achievement of the general objectives and 40% of their variable compensation is based on the achievement of the specific objectives relating to their respective core functions. Members of the Executive Board may opt for the payment of 50% of their annual variable compensation in free shares, in which case it will be increased by a 30% premium.

At our general meeting of shareholders to be held on May 19, 2020, the allocation of free performance shares subject to stock market value and internal conditions will be put to the vote of our shareholders.

Limitations on Liability and Indemnification Matters

Under French law, provisions of bylaws that limit the liability of the members of Executive and Supervisory Boards are prohibited. However, French law allows *sociétés anonymes* to contract for and maintain liability insurance against civil liabilities incurred by members of Executive and Supervisory Boards involved in a third-party action, provided that they acted in good faith and within their capacities as members of such board of the company. Criminal liability cannot be indemnified under French law, whether directly by the company or through liability insurance.

We have liability insurance for our Executive and Supervisory Board members, and insurance coverage for liability under the Securities Act. We also entered into agreements with our Executive and Supervisory Board members to provide contractual indemnification. With certain exceptions and subject to limitations on indemnification under French law, these agreements provide for indemnification for damages and expenses including, among other things, attorneys' fees, judgments, fines and settlement amounts incurred by any of these individuals in any action or proceeding arising out of his or her actions in that capacity. We believe that this insurance and these agreements are necessary to attract qualified Executive and Supervisory Board members.

These agreements may discourage shareholders from bringing a lawsuit against our Executive and Supervisory Board members for breach of their fiduciary duty. These provisions also may have the effect of reducing the likelihood of derivative litigation against our Executive and Supervisory Board members, even though such an action, if successful, might otherwise benefit us and our shareholders. Furthermore, a shareholder's investment may be adversely affected to the extent we pay the costs of settlement and damage awards against our Executive and Supervisory Board members pursuant to these insurance agreements.

Equity Incentives

We believe our ability to grant equity incentives is a valuable and necessary compensation tool that allows us to attract and retain the best personnel for positions of substantial responsibility, provides additional incentives to employees and promotes the success of our business. Due to French corporate law and tax considerations, we have historically granted several different equity incentive instruments to our Executive Board and Supervisory Board members, employees and consultants, including (i) BSAs, which have historically only been granted to independent members of the Supervisory Board and consultants, (ii) BSAARs and (iii) free shares.

Our Executive Board's authority to grant these warrants and free shares and the aggregate amount authorized to be granted must be approved by two-thirds of the shareholders present at the relevant extraordinary shareholders' meeting. Once approved by our shareholders, our Executive Board can continue to grant such awards for a specified period upon prior authorization of the Supervisory Board.

We have various compensation plans for our Executive Board members, Supervisory Board members, employees and consultants that have been approved by our shareholders. The last allocation in 2015 of BSAARs no longer continue to vest following termination of the employment, office or service of the holder within the first two years and all vested warrants must be exercised within post-termination exercise periods set forth in the grant documents. In the event of certain changes in our share capital structure, such as a consolidation or share split or dividend, French law and applicable grant documentation provides for appropriate adjustments of the numbers of ordinary shares issuable and/or the exercise price of the outstanding warrants.

As of December 31, 2019, we had the following equity awards, warrants and free shares outstanding:

- 309,500 ordinary shares issuable upon the exercise of share warrants (BSA) outstanding as of December 31, 2019 at a weighted average exercise price of €6.57 per ordinary share;
- 1,362,322 ordinary shares issuable upon the exercise of redeemable share warrants (BSAAR) outstanding as of December 31, 2019 at a weighted average exercise price of €6.00 per ordinary share;
- 733,900 ordinary shares issuable upon conversion of 7,581 free preferred shares (AGAP 2017) outstanding as of December 31, 2019 assuming all related performance and presence conditions are met;
- 168,026 ordinary shares issuable upon the vesting of free shares (AGA) outstanding as of December 31, 2019;
- 811,400 ordinary shares issuable upon conversion of 6,740 free preferred shares (AGAP 2016) as of December 31, 2019, assuming all performance and presence conditions are met.
- 537,500 ordinary shares issuable upon definitive acquisition of 537,500 Free Performance shares 2018 as of December 31, 2019, assuming all performance and presence conditions are met; and
- 887,800 ordinary shares issuable upon definitive acquisition of 887,800 Free Performance shares 2019 as of December 31, 2019, assuming all performance and presence conditions are met.

Equity Warrants and Redeemable Share Subscription Warrants

Share Warrants (BSA)

Share warrants, or BSA, are granted at a de minimis price and entitle the holder of one BSA to exercise the warrant for one underlying share, at an exercise price per share determined by our Executive Board at the time of grant by reference to the then prevailing share price. We have granted BSA to Supervisory Board members and certain consultants of the Company. Our share warrants plans include provisions that allow for the adjustment of the one-for-one exercise ratio to compensate for certain modifications of our share capital, such as rights issues, stock splits, mergers and other events affecting all existing shareholders. None of those events have occurred yet. Our BSA have an exercise period of 10 years – BSA not exercised after that time lapse and are automatically cancelled. Our share warrants cannot be sold.

The following table shows the BSA outstanding as of December 31, 2019:

Plan title	BSA 2011	BSA 2013	BSA 2014	BSA 2015-1	BSA 2015-2	BSA 2017
General assembly meeting date	June 29, 2011	June 28, 2013	May 27, 2014	April 27, 2015	April 27, 2015	June 2, 2016
Date of grant	July 29, 2011	July 17, 2013	July 16, 2014	April 27, 2015	July 1, 2015	September 20, 2017
Total number of BSA authorized	350,000	300,000	150,000	150,000	150,000	150,000
Total number of BSA granted	225,000	237,500	150,000	70,000	14,200	37,000
Start date of the exercise period	July 29, 2011	July 17, 2013	July 16, 2014	April 27, 2015	July 1, 2015	September 20, 2017
End date of the exercise period	July 29, 2021	July 17, 2023	July 16, 2024	April 26, 2025	June 30, 2025	September 20, 2027
Exercise price per BSA/share	€1.77	€2.36	€8.65	€9.59	€14.05	€11
Number of BSA exercised as of December 31, 2019	158,060	191,140	75,000	—	—	—
BSA cancelled or lapsed as of June 30, 2019	—	—	—	—	—	—
BSA remaining as of December 31, 2019	66,940	46,360	75,000	70,000	14,200	37,000

Redeemable Share Warrants (BSAAR)

Redeemable share warrants, or BSAAR, are identical to our share warrants of BSA (including the one-for-one exercise ratio, its potential adjustment for certain modifications of our share capital and the exercise period of 10 years), except for the following features:

- the BSAAR are initially purchased by the beneficiary at their fair value, as determined by an expert, and
- the BSAAR plans include a "forcing" clause making it possible to encourage holders to exercise their BSAAR when the market price exceeds the exercise price and reaches a threshold defined in the BSAAR plan. We can then, subject to a time period for notifying the holders that will permit them to exercise their BSAAR, decide to purchase the unexercised BSAAR at a unit price equal to the BSAAR acquisition price initially paid by its holder.

Our redeemable share warrants cannot be sold. Our BSAAR have been granted to certain of our executive officers and employees.

The following table shows the BSAAR outstanding as of December 31, 2019:

Plan title	BSAAR 2011	BSAAR 2012	BSAAR 2015
General assembly meeting date	June 29, 2011	June 28, 2012	April 27, 2015
Date of grant	September 9, 2011	May 27, 2013	July 1, 2015
Total number of BSAAR granted	650,000	146,050	1,050,382
Start date of the exercise period	September 9, 2011	May 27, 2013	July 1, 2015
End date of the exercise period	September 9, 2021	May 27, 2023	June 30, 2025
BSAAR initial purchase price	€0.05	€0.11	€1.15
Exercise price per BSAAR/share	€2.04	€2.04	€7.20
Number of BSAAR exercised as of December 31, 2019	395,000	84,450	1,940
BSAAR cancelled or lapsed as of December 31, 2019	—	—	2,720
BSAAR remaining as of December 31, 2019	255,000	61,600	1,045,722

Free Shares (AGA)

Free shares, or AGA, are employee equity incentive instruments pursuant to which the beneficiaries are granted, for free, the possibility to receive our ordinary shares under certain conditions. Upon grant by our Executive Board, the AGA are subject to an acquisition, or vesting, period of at least one year. At the end of this period, the free shares vest and the beneficiary becomes a full shareholder. However, if the vesting period is less than a certain period set by law of currently two years (but three years under previous law), it must be followed by a lock-up period, so that the sum of the two periods is equal to a minimum total period also set by law of currently two years (but three years under previous law). Vesting can be conditional or not. The vesting of all or our AGA is subject to a presence condition at the end of the vesting period. Some of our AGA are also subject to performance conditions. Over the years, we have established several AGA plans, for our employees or for management only, sometimes as a “welcome package” (with no performance conditions). Our free share plans include provisions that allow for the adjustment of the number of ordinary shares to which a beneficiary is entitled at the end of the vesting period to compensate for certain modifications of our share capital, such as rights issues, stock splits, mergers and other events affecting all existing shareholders, during the vesting period. Certain of our plans also provide for an accelerated vesting in case of a tender offer on the Company during the vesting period.

One particular AGA plan, the "AGA Bonus," entitles our management to opt for the payment of up to 50% of their annual variable compensation in free shares. Those who take this option benefit from a matching compensation equal to 30% of the corresponding portion of the annual variable compensation, also payable in free shares. The AGA Bonus are subject to the same performance conditions, after a one-year vesting period, as the annual variable compensation. The number of AGA Bonus is determined by dividing the euro amount of the annual variable compensation for which the election is made and of the matching contribution, by an average of the trading price of our shares. Once vested, the AGA Bonus are subject to the minimum one-year lock-up period.

The following table shows the AGAs outstanding as of December 31, 2019:

Plan title	AGA Employees 2017-1	AGA New Members 2017-1	AGA Bonus 2018-1	AGA Employees 2018-1	AGA Perf Employees 2018	AGA Perf Management 2018	AGA Perf Employees 2019	AGA Perf Management 2019
General assembly meeting date	June 23, 2017	June 23, 2017	May 29, 2018	May 29, 2018	May 29, 2018	May 29, 2018	May 22, 2019	May 22, 2019
Date of grant	April 3, 2018	April 29, 2019	July 3, 2018(1)	January 14, 2019	November 20, 2018	November 20, 2018	November 4, 2019	November 4, 2019
Vesting Period	1 year	3 years	1 year	1 year	3 years	3 years	3 years	3 years
Lock-up period	1 year	None	1 year	1 year	None	None	None	None
Performance Conditions	None	None	Yes	None	Yes	Yes	Yes	Yes
Number of AGA granted	114,500	25,000	67,028	90,650	327,500	260,000	546,700	355,000
Number of AGA vested as of December 31, 2019	110,500	–	–	–	–	–	–	–
Number of AGA lapsed as of December 31, 2019 (2)	4,000	–	469	5,000	20,000	30,000	13,900	–
Number of AGA remaining to be vested as of December 31, 2019	–	25,000	66,559	85,650	307,500	230,000	532,800	355,000

(1) The annual variable compensation performance conditions are determined on or about the beginning of the fiscal year and executives make their election at about that time. However, because we need the shareholders' vote on the total number of free shares available for granting AGA Bonus (like all other free shares), we wait until our annual shareholders meeting (generally during the second half of the second quarter of the year) to grant the AGA Bonus – hence a granting, vesting and lock-up calendar different from that of the payment of the annual variable compensation, which takes place towards the end of the fiscal year or at the beginning of the next fiscal year.

(2) Usually after the end of the vesting period, the Executive Board will convene and acknowledge the number of free shares that have vested and the number of those that have not because the presence condition and, as applicable, the performance conditions, have not been met. For the purpose of computing the amount of share-based compensation in our consolidated financial statements, AGA that have lapsed because the presence condition has not been met, are excluded from the computation, even though the Executive Board has not met yet and formally acknowledged this fact. As a result, certain of the numbers above are different from those in our consolidated financial statements.

The following authorization will be submitted for approval to the general meeting of the shareholders to be held on May 19, 2020: (i) up to 200,000 free shares to the benefit of employed members of the Executive Committee, employed senior executives and/or corporate officers (AGA Bonus), (ii) up to 770,000 free shares with performance conditions to the benefit of executive officers, employed members of the Executive Committee, employed senior executives and/or corporate officers and (iii) up to 910,000 free shares with performance conditions to the benefit of employees.

Free Preferred Shares (AGAP)

Free preferred shares, or AGAP, are another employee equity incentive instrument similar to the free shares or AGA, except that, after a one-year vesting period, the beneficiaries receive a preferred shares (shares B) which will become convertible into ordinary shares following a lock-up period of two additional years, if the performance conditions (and a presence condition) are met at the end of this lock-up period. Each free preferred share is convertible into a number of our ordinary shares – which number depends upon the degree of fulfilment of the performance conditions. The free preferred shares remain convertible into ordinary shares for a period of six years and six months. Free preferred shares not converted at the end of this conversion period can be repurchased by us and cancelled. Our AGAP cannot be sold.

We have established several AGAP plans in 2016 and 2017 for all of our employees or for management only.

During the acquisition and lock-up periods, beneficiaries of the 2016 AGAP are not entitled to vote at our shareholders' meetings, to dividends or to preferential subscription rights. On the contrary, during the lock-up period, beneficiaries of the 2017 AGAP are entitled to vote at our shareholders' meetings, to dividends and to preferential subscription rights, as if they held the same number of ordinary shares as their number of vested AGAP. After the end of the lock-up period, holders of all of our AGAP that have not yet converted them into our ordinary shares, are entitled to vote at our shareholders' meetings, to dividends and to preferential subscription rights, on the basis of the number of ordinary shares to which they are entitled if they convert their AGAP.

Our free preferred share plans include provisions that allow for the adjustment of the number of ordinary shares to which a beneficiary is entitled upon conversion of his or her AGAP at the end of the lock-up period, to compensate for certain modifications of our share capital, such as rights issues, stock splits, mergers and other events affecting all existing shareholders. The 2017 AGAP plan provides for an accelerated vesting with a waiver of the performance conditions in case of a tender offer on the Company during the vesting period.

On October 21, 2019, the performance criteria of the 2016-1 AGAP were assessed and the conversion ratio was determined as follows: one 2016-1 AGAP gives the right to 130 ordinary shares.

On December 30, 2019, the performance criteria of the 2016-2 AGAP were assessed and the conversion ratio was determined as follows: one 2016-2 AGAP gives the right to 111 ordinary shares.

The following table shows the AGAPs outstanding as of December 31, 2019:

Plan title	**AGAP Management 2016-1**	**AGAP Management 2016-2**	**AGAP Employees 2016-1**	**AGAP Management 2017-1**	**AGAP Employees 2017-1**
General assembly meeting date	June 2, 2016	June 2, 2016	June 2, 2016	June 23, 2017	June 23, 2017
Date of grant	October 21, 2016	December 30, 2016	October 21, 2016	April 3, 2018	April 3, 2018
Number of AGAP granted	2,000	3,000	2,486	2,400	5,725
Maximum number of ordinary shares into which each AGAP can be converted	130	111	130	100	100
Number of AGAP lapsed during the vesting period	450	–	105	400	144
Number of AGAP vested	1,550	3,000	2,381	2,000	5,581
Number of AGAP lapsed during the lock up period	100	–	146	–	242
Number of outstanding AGAP	1,450	3,000	2,230	2,000	5,339

C. Board Practices.

Supervisory Board

The Supervisory Board is made up of a minimum of three members and a maximum of eighteen. The members of the Supervisory Board are appointed for a renewable term of two years at the general meeting of shareholders. The general meeting of shareholders may revoke the appointments of the members of the Supervisory Board at any time during the meeting by a simple majority vote. The appointees are selected by the shareholders and may be individuals or companies. Each member must own at least one of our ordinary shares for the entire term of the appointment.

The age limit for being a member of the Supervisory Board and the limitations on holding such an appointment concurrently with an appointment in another company are subject to the applicable legal and regulatory provisions.

Role of the Supervisory Board in Risk Oversight

Our Supervisory Board is primarily responsible for the oversight of our risk management activities and has delegated to the audit committee the responsibility to assist our Supervisory Board in this task. While our Supervisory Board oversees our risk management, our management, through the Executive Board is responsible for day-to-day risk management processes. Our Supervisory Board expects our management to consider risk and risk management in each business decision, to proactively develop and monitor risk management strategies and processes for day-to-day activities and to effectively implement risk management strategies adopted by the Supervisory Board. We believe this division of responsibilities is the most effective approach for addressing the risks we face.

Supervisory Board Committees

The Supervisory Board has established an audit committee, a compensation and nomination committee and a transactions committee, which operate pursuant to rules of procedure adopted by our Supervisory Board.

Subject to available exemptions, the composition and functioning of all of our committees will comply with all applicable requirements of the French Commercial Code, the Exchange Act, the Nasdaq listing rules and SEC rules and regulations.

In accordance with French law, committees of our Supervisory Board only have an advisory role and can only make recommendations to our Supervisory Board. As a result, decisions are made by our Supervisory Board taking into account non-binding recommendations of the relevant Supervisory Board committee.

Audit Committee

Our audit committee assists our Supervisory Board in its oversight of our corporate accounting and financial reporting and oversees the selection of our auditors, their remuneration and independence and keeps the Supervisory Board informed on control systems, key processes and procedures, security and risks. From the Supervisory Board of May 22, 2019, the members of the audit committee as of the date of this Annual Report are Patrick Langlois, Irina Staatz-Granzer and Mailys Ferrere as representative of Bpifrance Participations. Dr. Langlois is the Chairman of the audit committee.

Our Supervisory Board has determined that Dr. Langlois and Dr. Staatz-Granzer are independent within the meaning of the applicable listing rules and the independence requirements contemplated by Rule 10A-3 under the Exchange Act. Our Supervisory Board has further determined that Dr. Langlois is an "audit committee financial expert" as defined by the Nasdaq listing rules and that each of the members qualifies as financially sophisticated under the Nasdaq listing rules.

The principal responsibility of our audit committee is to monitor the existence and efficacy of our financial audit and risk control procedures on an ongoing basis.

Our Supervisory Board has specifically assigned the following duties to the audit committee:

- legal control of the half-year and annual accounts;
- evaluating internal control practices, risk analysis;
- supervising the creation of the financial statements published by us;
- assessing accounting methods; and
- selecting statutory auditors, negotiating their fees, reviewing of their conclusions and reviewing their independence.

The audit committee reviews and approves the report from the Chairman of the Supervisory Board on internal control.

Compensation and Nomination Committee

Our compensation and nomination committee assists our Supervisory Board in reviewing and making recommendations to our Supervisory Board with respect to the appointment and the compensation of the members of our Executive Board, Supervisory Board and Executive Committee and other key employees. In accordance with operating rules adopted by the Supervisory Board, the nomination and compensation committee is composed of at least two members appointed by the Supervisory Board. Following the Supervisory Board on May 22, 2019, the members of the committee are Patrick Langlois, Hervé Brailly and Véronique Chabernaud. Currently, Dr. Langlois and Dr. Chabernaud are independent members of the compensation and nomination committee. Dr. Chabernaud is the Chairman of the committee.

Our Supervisory Board has specifically assigned the following duties to the compensation and nomination committee: reviewing our remuneration policy, in particular the description of our collective objectives (applicable company-wide) and individual objectives (for members of the Executive Board and the Executive Committee), reviewing the compensation of the members of our Executive Board and the Executive Committee, the policy concerning the distribution of equity such as warrants, stock options, grants and capital increases reserved for members of our savings plan, examining the amount of attendance fees among the Supervisory Board and the committees members, assisting the Supervisory Board in the selection of the members of the Executive Board and committees, making recommendations with respect to the independence of the members of the Supervisory Board and committees and preventing conflicts of interest within the Supervisory Board.

Transactions Committee

Our transactions committee assists our Supervisory Board in examining the business and corporate development opportunities available to us, which may include the acquisition of rights to products or the acquisition of other companies as well as out-licensing opportunities. The members of this committee are Irina Staatz-Granzer, Hervé Brailly, Gilles Brisson and Marcus Schindler. Currently, Dr. Staatz-Granzer is an independent member and Chairman of the transactions committee. Our Supervisory Board has specifically assigned the following duties to the transactions committee: to analyze the fundamentals of the products and/or companies targeted by us, the feasibility of targeted acquisitions and to participate in the selection of investment bankers and/or consultants.

Observer to the Supervisory Board

Dr. Olivier Martinez is an observer to the Supervisory Board. Dr. Martinez is a Senior Investments Director for Bpifrance Participations.

Other Committees

The Strategic Advisory Board

We also have a Strategic Advisory Board composed of six external consultants, consisting of three individuals from the medical community and three individuals from the scientific community. The Strategic Advisory Board is not a committee of the Supervisory Board within the meaning of Article R.225-29 of the French Commercial Code; its members are chosen by the Executive Board. This kind of advisory committee is common in French companies in the biotechnology sector.

The Strategic Advisory Board's role is to assist us in our strategic choices in scientific and technical fields. Its main missions are to evaluate the relevance of our choices in terms of product development and to propose, if necessary, changes to strategic or technical approaches; to advise management and guide our scientific direction in identifying strategies and selecting product candidates, based, in particular, on the scientific results obtained by us, including new targets and new compounds and to promote and advise us in our alliance strategies, such as external growth supporting synergies, including acquisition of new competences, purchase of operating rights, product candidates and innovative technologies. The Strategic Advisory Board is comprised of Sebastian Amigorena, Aurélien Marabelle, Ruslan Medzhitov, Miriam Merad, Tanguy Seiwert and Mario Sznol. Dr. Merad is the Chairman of the Strategic Advisory Board.

Sebastian Amigorena, Ph.D., is the "Directeur de Recherche de Classe Exceptionnelle" at the Centre National de la Recherche Scientifique. He also leads the Immunology Department and the newly created Cancer Immunotherapy Center at Institut Curie in Paris (France). Dr. Amigorena has made significant contributions to immunology and cell biology at every stage of his career. His findings have helped advance the understanding of antigen presentation and T cell priming by dendritic cells, with applications in the fields of cancer immunotherapy and vaccination. Dr. Amigorena has received numerous national and international prizes and awards, including the prestigious senior European Research Council award in 2008 and in 2014.

Aurélien Marabelle, MD, Ph.D., is the Clinical Director of the Cancer Immunotherapy Program at Gustave Roussy Cancer Center in Villejuif, France. Dr. Marabelle's clinical practice is dedicated to early phase clinical trials in cancer immunotherapy and his translational research is focused on mechanisms of action of immune checkpoint monoclonal antibodies. He works as a senior medical oncologist and an investigator in the Drug Development Department. He is coordinating a team focused on cancer immunotherapy translational research projects at INSERM.

Ruslan Medzhitov, Ph.D., is a Sterling Professor at Yale University School of Medicine in New Haven, Connecticut and an Investigator of the Howard Hughes Medical Institute. His research interests include biology of inflammation, biological bases of diseases and evolutionary design of biological systems. Dr. Medzhitov is a member of the National Academy of Sciences, National Academy of Medicine and European Molecular Biology Organization. He is a fellow of the American Academy of Microbiology and a foreign member of the Russian Academy of Sciences.

Miriam Merad, M.D., Ph.D., is the Mount Sinai Chair professor in Cancer Immunology and the Director of the Precision Immunology Institute at Mount Sinai School of Medicine in New York. Dr. Merad's laboratory studies the contribution of macrophages and dendritic cells to Cancer and Inflammatory diseases in mice and humans. She has shown that tissue macrophages have unique functional attributes that contribute to tumor outcome and response to treatment. Dr. Merad pioneered mapping the regulatory network of dendritic cells resulting in the identification of a lineage of dendritic cells, the CD103+ DC, that is now considered to be a key target to improve antiviral and antitumor immunity. Dr. Merad receives generous funding from the National Institutes of Health, or NIH, for her research on innate immunity and their contribution to human disease and belongs to several NIH consortia.

Tanguy Seiwert, M.D., is Assistant Professor of Medicine, Section of Hematology and Oncology in the Department of Medicine at the University of Chicago. Dr. Seiwert's research focuses on the biology of head and neck cancer and lung cancer. In the laboratory, he studies targeted therapies that disrupt specific pathways vital to cancer growth and metastasis. More specifically, he focuses on which novel drugs appear most promising, which individual tumors are more likely to respond to these treatments and how to successfully combine therapies. Dr. Seiwert uses this preclinical knowledge to develop new treatments for use in clinical trials, and to ultimately improve patient care.

Mario Sznol, M.D., is a Professor of Medicine, Leader, Melanoma/RCC Disease-Associated Research Team, and co-leader, Cancer Immunology Program at the Yale Cancer Center in New Haven, Connecticut. Recently, he was appointed the incoming President of the Society for Immunotherapy of Cancer. Dr. Sznol's interests include cancer immunotherapy, drug development for cancer and treatment of patients with melanoma and renal cell carcinoma. After completing a fellowship in medical oncology at Mount Sinai College of Medicine in New York in 1987, he joined the National Cancer Institute, or NCI, as a Senior Investigator in the Investigational Drug Branch, or IDB, Cancer Therapy Evaluation Program, or CTEP. He was Head of the Biologics Evaluation Program, IDB, CTEP, from 1994 to 1999, and in 1999, was appointed Vice President of Clinical Development for Vion Pharmaceuticals in New Haven, Connecticut. He joined the Yale faculty in medical oncology in 2004.

Executive Committee

We also have an Executive Committee composed of members with significant experience in strategy, financial management, medical research, research and development project management, the negotiation of industrial and commercial agreements in the field of innovative companies, including biotechnology companies, compliance and regulations and in business development. The Executive Committee meets at least once a month and deals with all subject regarding the activities and the management of the company.

The current members of the Executive Committee are Mondher Majoubi, Yannis Morel, Laure-Hélène Mercier, Pierre Dodion, Odile Belzunce, Jennifer Butler, Frédérique Brune, Tracy Rossin and Odile Laurent. Eric Vivier, our Senior Vice President, Chief Scientific Officer, is a permanent guest to the meetings of the Executive Committee.

Corporate Governance Practices

As a French *société anonyme*, we are subject to various corporate governance requirements under French law. We are a "foreign private issuer" under the U.S. federal securities laws and the Nasdaq listing rules. The foreign private issuer exemption permits us to follow home country corporate governance practices instead of certain Nasdaq listing requirements. A foreign private issuer that elects to follow a home country practice instead of Nasdaq listing requirements must submit to Nasdaq a written statement from an independent counsel in such issuer's home country certifying that the issuer's practices are not prohibited by the home country's laws.

We apply the AFEP/MEDEF code, which recommends that a majority of the members of the Supervisory Board be independent (as such term is defined under the code). Neither the corporate laws of France nor our bylaws requires that (i) our compensation committee include only independent members of the Supervisory Board, (ii) each committee of the Supervisory Board have a formal written charter or (iii) our independent members of the Supervisory Board hold regularly scheduled meetings at which only independent members of the Supervisory Board are present. We intend to follow French corporate governance practices in lieu of Nasdaq listing requirements for each of the foregoing.

These exemptions do not modify the independence requirements for the audit committee, and we intend to comply with the requirements of the Sarbanes-Oxley Act and the Nasdaq listing rules, which require that our audit committee be composed of at least three independent members. Rule 10A-3 under the Exchange Act provides that the audit committee must have direct responsibility for the nomination, compensation and choice of our auditors, as well as control over the performance of their duties, management of complaints made, and selection of consultants. Under Rule 10A-3, if the laws of a foreign private issuer's home country require that any such matter be approved by the board of directors or the shareholders of the Company, the audit committee's responsibilities or powers with respect to such matter may instead be advisory. Under French law, the audit committee may only have an advisory role and appointment of our statutory auditors, in particular, must be decided by our shareholders at our annual meeting.

In addition, Nasdaq rules require that a listed company specify that the quorum for any meeting of the holders of share capital be at least 33 1/3% of the outstanding shares of the company's ordinary voting shares. We intend to follow our French home country practice, rather than complying with this Nasdaq rule. Consistent with French Law, our bylaws provide that when first convened, general meetings of shareholders may validly convene only if the shareholders present or represented hold at least (1) 20% of the voting shares in the case of an ordinary general meeting or of an extraordinary general meeting where shareholders are voting on a capital increase by capitalization of reserves, profits or share premium, or (2) 25% of the voting shares in the case of any other extraordinary general meeting. If such quorum required by French law is not met, the meeting is adjourned. There is no quorum requirement under French law when an ordinary general meeting or an extraordinary general meeting is reconvened where shareholders are voting on a capital increase by capitalization of reserves, profits or share premium, but the reconvened meeting may consider only questions that were on the agenda of the adjourned meeting. When any other extraordinary general meeting is reconvened, the required quorum under French law is 20% of the shares entitled to vote. If a quorum is not met at a reconvened meeting requiring a quorum, then the meeting may be adjourned for a maximum of two months.

Code of Ethics

We have adopted a Code of Ethics applicable to all of our employees and members of our Executive Board and Supervisory Board. The Code of Ethics is available on our website. We expect that any amendments to the Code of Ethics, or any waivers of its requirements, will be disclosed on our website.

Executive Compensation Arrangements

Except the arrangements described in "Item 7.B—Related Party Transactions—Arrangements with the Members of our Executive and Supervisory Boards," there are no arrangements or understanding between us and any of our other members of our Executive and Supervisory Boards providing for benefits upon termination of their employment, other than as required by applicable law.

D. Employees.

As of December 31, 2019, we had 235 full-time employees. None of our employees are represented by collective bargaining agreements. We believe that we maintain good relations with our employees. As of December 31, 2019, of our 235 full-time employees, 214 were based in France and 21 were based in the United States. The following tables show the number of employees as of December 31, 2019 broken out by department and entity:

Full-time equivalent employees of Innate Pharma SA	As of December 31, 2019
Research and development	162
General and administrative	46
Executive committee	6
Total	214

Full-time equivalent employees of Innate Pharma Inc.	As of December 31, 2019
Sales & Marketing	17
General and administrative	2
Executive committee	2
Total	21

E. Share Ownership.

For information regarding the share ownership of our directors and executive officers, see "Item 6.B—Compensation" and "Item 7.A—Major Shareholders."

Item 7. Major Shareholders and Related Party Transactions.

A. Major Shareholders.

The following table and accompanying footnotes sets forth, as of December 31, 2019, information regarding beneficial ownership of our ordinary shares by:

- each person, or group of affiliated persons, known by us to beneficially own more than 5% of our ordinary shares;
- each of our Executive Board and Supervisory Board members individually; and
- all of our Executive Board and Supervisory Board members as a group.

Assuming that all of our ordinary shares represented by ADSs are held by residents of the United States, as of December 31, 2019, we estimate that approximately 14.9 million shares, or 19% of our ordinary shares were held of record by 13 residents of the United States.

Beneficial ownership is determined according to the rules of the SEC and generally means that a person has beneficial ownership of a security if he, she or it possesses sole or shared voting or investment power of that security, including free shares that vest within 60 days of March 31, 2019 and options and warrants that are currently exercisable or exercisable within 60 days of March 31, 2019. Ordinary shares subject to free shares, options and warrants currently exercisable or exercisable within 60 days of March 31, 2019 are deemed to be outstanding for computing the percentage ownership of the person holding these free shares, options or warrants and the percentage ownership of any group of which the holder is a member, but are not deemed outstanding for computing the percentage of any other person.

Except as indicated by the footnotes below, we believe, based on the information furnished to us, that the persons named in the table below have sole voting and investment power with respect to all ordinary shares shown that they beneficially own, subject to community property laws where applicable. The information does not necessarily indicate beneficial ownership for any other purpose, including for purposes of Sections 13(d) and 13(g) of the Securities Act.

Unless otherwise indicated, the address of each beneficial owner listed in the table below is c/o Innate Pharma S.A., 117, Avenue de Luminy – BP 30191, 13009 Marseille, France.

	Number of Ordinary Shares Beneficially Owned	Percentage of Ordinary Shares Beneficially Owned
5% Shareholders:		
Novo Nordisk A/S(1)	9,817,546	12.2%
MedImmune Limited(2)	7,485,500	9.3%
Bpifrance Participations(3)	6,389,406	7.94%
EcoR1 Capital LLC(4)	6,623,114	8.23%
Executive Board and Supervisory Board members and other executive officers:		
Mondher Mahjoubi, M.D.(5)	301,443	*
Yannis Morel, Ph.D.(6)	153,917	*
Laure-Hélène Mercier(7)	108,379	*
Hervé Brailly, Ph.D.(8)	1,329,784	1.65%
Irina Staatz-Granzer(9)	45,100	*
Jean-Yves Blay(10)	50	*
Gilles Brisson(11)	98,059	*
Véronique Chabernaud(12)	24,210	*
Maïlys Ferrere(13)	–	–
Patrick Langlois(14)	15,141	*
Marcus Schindler(15)	–	–
Pierre Dodion, M.D.(16)	57,372	*
Odile Belzunce(17)	20,275	*
Jennifer Butler	–	–
Frédérique Brune(18)	500	–
Eric Vivier, D.V.M.(19)	72,672	*
Tracy Rossin	–	–
All members of our Executive Board and Supervisory Board and other executive officers as a group(20)	2 226 402	2.77%

* Represents beneficial ownership of less than 1%.

(1) Consists of 9,817,546 ordinary shares. The principal business address for Novo Nordisk A/S is Novo Allé, 2880 Bagsvaerd, Danemark.

(2) Consists of 7,485,500 ordinary shares. The principal business address for MedImmune Limited is Milstein Building, Granta Park, Cambridge, CB21 6GH, United Kingdom.

(3) Consists of 6,389,406 ordinary shares. The principal business address for Bpifrance Participations is 27-31, avenue du Général Leclerc, 94 710 Maisons Alfort Cedex.

(4) Consists of 6,623,114 ordinary shares. The principal business address for EcoR1 Capital LLC is 357 Tehama Street #3, San Francisco, CA 94103, United-States.

(5) Consists of 301,443 ordinary shares.

(6) Consists of 65,917 ordinary shares and 88,000 ordinary shares issuable upon the exercise of redeemable share warrants (BSAAR) that are exercisable within 60 days of February 29, 2020.

(7) Consists of 63,879 ordinary shares and 44,500 ordinary shares issuable upon the exercise of redeemable share warrants (BSAAR) that are exercisable within 60 days of February 29, 2020.
(8) Consists of 979,784 ordinary shares and 350,000 ordinary shares issuable upon the exercise of redeemable share warrants (BSAAR) that are exercisable within 60 days of February 29, 2020.
(9) Consists of 25,100 ordinary shares and 20,000 ordinary shares issuable upon the exercise of share warrants (BSA) that are exercisable within 60 days of February 29, 2020.
(10) Consists of 50 ordinary shares.
(11) Consists of 48,059 ordinary shares and 50,000 ordinary shares issuable upon the exercise of share warrants (BSA) that are exercisable within 60 days of February 29, 2020.
(12) Consists of 10 ordinary shares and 24,200 ordinary shares issuable upon the exercise of share warrants (BSA) that are exercisable within 60 days of February 29, 2020.
(13) As representative of Bpifrance Participations, the legal entity that holds this Supervisory Board seat.
(14) Consists of 8,141 ordinary shares and 7,000 ordinary shares issuable upon the exercise of share warrants (BSA) that are exercisable within 60 days of February 29, 2020.
(15) As representative of Novo Nordisk A/S, the legal entity that holds this Supervisory Board seat.
(16) Consists of 372 ordinary shares and 57,000 ordinary shares issuable upon the exercise of redeemable share warrants (BSAAR) that are exercisable within 60 days of February 29, 2020.
(17) Consists of 5,275 ordinary shares and 15,000 ordinary shares issuable upon the exercise of redeemable share warrants (BSAAR) that are exercisable within 60 days of February 29, 2020.
(18) Consists of 500 ordinary shares.
(19) Consists of 72,672 ordinary shares.
(20) Consists of (i) 1,570,702 ordinary shares, (ii) 101,200 ordinary shares issuable upon the exercise of share warrants (BSA) that are exercisable within 60 days of February 29, 2020 and (iii) 554,500 ordinary shares issuable upon the exercise of redeemable share warrants (BSAAR) that are exercisable within 60 days of February 29, 2020.

The significant changes in the percentage ownership held by our principal shareholders since January 1, 2017 are a result of the transactions described in our prospectus dated October 16, 2019, filed with the SEC pursuant to Rule 424(b), under the heading "Certain Relationships and Related Party Transactions—Transactions with Our Principal Shareholders" and the dilution resulting from our public offering.

None of our principal shareholders has voting rights different than our other shareholders.

B. Related Party Transactions.

Since January 1, 2019, we have engaged in the following transactions with members of our Executive and Supervisory Boards and holders of more than 5% of our outstanding voting securities, and their respective affiliates, which we refer to as our related parties.

Transactions With Our Principal Shareholders

AstraZeneca

In October 2019, we entered into a supply agreement with AstraZeneca relating to the exclusive manufacturing and supply by AstraZeneca of Lumoxiti in connection with its commercialization in the U.S., the European Union., the United Kingdom and Switzerland.

Arrangements with the Members of our Executive and Supervisory Boards

Director and Executive Officer Compensation

See "Item 6.B—Compensation—Limitations on Liability and Indemnification Matters" for information regarding compensation of the members of our Supervisory and Executive Boards.

Agreement with Jean-Yves Blay

On September 14, 2018, we entrusted Jean-Yves Blay, a member of our Supervisory Board, with a specific mission pursuant to article L.225-84 of the French Commercial Code. Based on Mr. Blay's scientific and medical qualifications, we have agreed that he will attend meetings of our Strategic Advisory Board consisting of at least one meeting that he attends in-person and approximately two conference calls per year. Mr. Blay will participate in these Strategic Advisory Board meetings and then present a report to the Supervisory Board, at least once a year, on his opinions of the Strategic Advisory Board's proceedings. This agreement will remain in place for the duration of Mr. Blay's term of office as a member of the Supervisory Board, including any renewal terms. We have agreed to pay Mr. Blay €10,000 in compensation for his performance of these additional duties. During the year ended December 31, 2019, Mr. Blay did not participate to the meeting of the Strategic Advisory Board meeting and therefore was not paid for these additional duties.

Agreement with Patrick Langlois

On March 19, 2019, we entrusted Mr. Langlois with a specific mission pursuant to article L.225-84 of the French Commercial Code. This mission ended December 31, 2019 and consisted in, during the 2019 financial year (i) ensuring that the Company has an efficient economic and legal structure to respond to the evolution towards a commercial activity, (ii) share his experience in the deployment of and our Enterprise Resource Planning system and (iii) accompany the evolution of the organization of the Company for its introduction on the Nasdaq. As compensation for this mission, Mr. Langlois received a compensation amounting to € 25,000 (on top of his compensation as member of the Supervisory board and Chairman of the Audit Committee).

Indemnification Agreements

We entered into indemnification agreements with each of our Executive Board and Supervisory Board members. See the section of this Annual Report titled "Item 6B—Compensation."

Insofar as indemnification for liabilities arising under the Securities Act may be permitted to directors, officers or persons controlling us pursuant to the foregoing provisions, we have been informed that in the opinion of the SEC such indemnification is against public policy as expressed in the Securities Act and is therefore unenforceable.

Transaction with Related Companies

From time to time, in the ordinary course of our business, we may contract for services from companies or institutions in which certain members of our Executive Board or Supervisory Board may serve as a director or advisor. The cost and provision of these services are negotiated on an arms-length basis and none of these

Related Person Transaction Policy

We comply with French law regarding approval of transactions with related parties. On September 12, 2019, the Supervisory Board adopted a related person transaction policy that sets forth our procedures for the identification, review, consideration and approval or ratification of related person transactions. The policy became effective immediately upon the execution of the underwriting agreement for the October 2019 global offering. For purposes of our policy only, a related person transaction is a transaction, arrangement or similar contractual relationship, or any series of similar transactions, arrangements or relationships, in which we and any related person are, were or will be participants and the amount involved in the transaction exceeds $120,000, with the exception of usual transactions concluded under normal conditions. A related person is any member of the Executive Board or Supervisory Board or beneficial owner of more than 5% of any class of our voting securities, including any of their immediate family members and any entity owned or controlled by such persons.

Under the policy, if a transaction has been identified as a related person transaction, including any transaction that was not a related person transaction when originally consummated or any transaction that was not initially identified as a related person transaction prior to consummation, our management must present information regarding the related person transaction to the Supervisory Board for review, consideration and approval or ratification. The presentation must include a description of, among other things, the material facts, the interests, direct and indirect, of the related persons, the benefits to us of the transaction and whether the transaction is on terms that are comparable to the terms available to or from, as the case may be, an unrelated third-party or to or from employees generally. Under the policy, we will collect information that we deem reasonably necessary from each member of our Executive Board and Supervisory Board and, to the extent feasible, significant shareholder to enable us to identify any existing or potential related-person transactions and to effectuate the terms of the policy.

In addition, under our Code of Business Conduct and Ethics, which we adopted on September 12, 2019, our employees and Executive and Supervisory Board members have an affirmative responsibility to disclose any transaction or relationship that reasonably could be expected to give rise to a conflict of interest.

In considering related person transactions, the Supervisory Board, will take into account the relevant available facts and circumstances including, but not limited to:

- the risks, costs and benefits to us;
- the impact on the independence of a member of the Executive Board or Supervisory Board in the event that the related person is a member of the Executive Board or Supervisory Board, immediate family member of a member of the Executive Board or Supervisory Board or an entity with which a member of Executive Board or Supervisory Board is affiliated;
- the availability of other sources for comparable services or products; and
- the terms available to or from, as the case may be, unrelated third parties or to or from employees generally.

The policy requires that, in determining whether to approve, ratify or reject a related person transaction, the Supervisory Board must consider, in light of known circumstances, whether the transaction is in, or is not inconsistent with, our best interests and those of our shareholders, as the Supervisory Board determines in the good faith exercise of its discretion.

All of the transactions described above were entered into prior to the adoption of the written policy, but our Supervisory Board evaluated and approved all transactions that were considered to be related party transactions under French law at the time at which they were consummated.

C. Interests of Experts and Counsel.

Not applicable.

Item 8. Financial Information.

A. Consolidated Statements and Other Financial Information.

Consolidated Financial Statements

Our consolidated financial statements are included as part of this Annual Report, starting at page F-1.

Legal Proceedings

From time to time, we may be involved in various claims and legal proceedings relating to claims arising out of our operations. We are not currently a party to any legal proceedings that, in the opinion of our management, are likely to have a material adverse effect on our business. Regardless of outcome, litigation can have an adverse impact on us because of defense and settlement costs, diversion of management resources and other factors.

Dividend Policy

We have never declared or paid any dividends on our ordinary shares. We do not anticipate paying cash dividends on our equity securities in the foreseeable future and intend to retain all available funds and any future earnings for use in the operation and expansion of our business, given our state of development.

Subject to the requirements of French law and our bylaws, dividends may only be distributed from our distributable profits, plus any amounts held in our available reserves which are reserves other than legal and statutory and revaluation surplus. Dividend distributions, if any in the future, will be made in euro and converted into U.S. dollars with respect to the ADSs, as provided in the deposit agreement. See the information set forth in our prospectus dated October 16, 2019, filed with the SEC pursuant to Rule 424(b), under the heading “Description of Share Capital” for more information.

B. Significant Changes.

Not applicable.

Item 9. The Offer and Listing.

A. Offer and Listing Details.

Our ADSs have been listed on the Nasdaq Global Select Market under the symbol "IPHA" since October 21, 2019. Our ordinary shares have been trading on Euronext Paris under the symbol "IPH" since November 3, 2006. Prior to that date, there was no public trading market for our ADSs or our ordinary shares.

B. Plan of Distribution.

Not applicable.

C. Markets.

Our ADSs have been listed on Nasdaq under the symbol "IPHA" since October 21, 2019. Our ordinary shares have been trading on Euronext Paris under the symbol "IPH" since November 3, 2006.

D. Selling Shareholders.

Not applicable.

E. Dilution.

Not applicable.

F. Expenses of the Issue.

Not applicable.

Item 10. Additional Information.

A. Share Capital.

Not applicable.

B. Memorandum and Articles of Association.

The information set forth in our prospectus dated October 16, 2019, filed with the SEC pursuant to Rule 424(b), under the heading "Description of Share Capital—Key Provisions of Our Bylaws and French Law Affecting Our Ordinary Shares," "Description of Share Capital—Differences in Corporate Law," and "Limitations Affecting Shareholders of a French Company" is incorporated herein by reference.

C. Material Contracts.

Underwriting Agreement

We entered into an underwriting agreement by and among Citigroup Global Markets Inc., SVB Leerink LLC and Evercore Group L.L.C., as representatives of the underwriters, on October 16, with respect to the ADSs and ordinary shares sold in our October 2019 global offering. We agreed to indemnify the underwriters against certain liabilities, including liabilities under the Securities Act, and to contribute to payments the underwriters may be required to make in respect of such liabilities.

Strategic Collaborations and License Agreements

AstraZeneca

2015 Agreements

In April 2015, we entered into two agreements with MedImmune, a wholly owned subsidiary of AstraZeneca, which we refer to as AstraZeneca. The first agreement was a co-development and license agreement relating to certain combination products containing monalizumab, or the Original Co-Development Agreement, and the second agreement was a development and option agreement for products containing monalizumab, including products using monalizumab as a monotherapy, or the 2015 Option Agreement. We received an initial payment of $250 million under these agreements on June 30, 2015, of which $100 million was paid to us as an initial payment for the Original Co-Development Agreement and $150 million was paid to us as consideration for the 2015 Option Agreement described below. In October 2018, AstraZeneca exercised its option under the 2015 Option Agreement, which resulted in the automatic termination of both the Original Co-Development Agreement and the 2015 Option Agreement, and a new co-development and license agreement relating to all products containing monalizumab, or the 2015 Co-Development Agreement, automatically came into effect. In connection with AstraZeneca's exercise of its option under the 2015 Option Agreement, an upfront payment of $100 million was due under the 2015 Co-Development Agreement, which it paid in January 2019.

2015 Co-Development Agreement

Under the 2015 Co-Development Agreement, we granted to AstraZeneca a worldwide, exclusive license, subject to certain exclusions, to certain of our patents and know-how to develop, manufacture and commercialize licensed products, including monalizumab, in the field of diagnosis, prevention and treatment of oncology diseases and conditions. We further granted to AstraZeneca a worldwide, non-exclusive license to certain of our other patents to develop, manufacture and commercialize licensed products, including monalizumab, in the field of diagnosis, prevention and treatment of oncology diseases and conditions. We retain the rights under the licensed patents and know-how to, among other things, co-promote licensed products in certain European countries, pursuant to our option to co-promote, and exploit the licensed patents and know-how to research, develop and commercialize the licensed products outside of the field of diagnosis, prevention and treatment of oncology diseases and conditions.

Under the 2015 Co-Development Agreement, we are required to collaborate with AstraZeneca to develop and commercialize licensed products. AstraZeneca will be the lead party in developing the licensed products and licensed product in certain major markets. Each party will have to use commercially reasonable efforts to complete certain development activities in accordance with a specified development plan.

We are required for a defined period of time to co-fund 30% of the Phase III clinical trials of licensed products, subject to an aggregate cap, in order to receive 50% of the profits in Europe.

On July 31, 2019, we notified AstraZeneca of our decision to co-fund a future monalizumab Phase III clinical development program. Additionally, in September 2019, we announced that AstraZeneca will advance monalizumab into a Phase III randomized clinical trial evaluating monalizumab in combination with cetuximab, and that we and AstraZeneca will co-fund the clinical trial. AstraZeneca will be responsible for the promotion of licensed products worldwide, subject to our option to co-promote the licensed products in certain European countries. Should we elect not to co-promote, our share of profits in Europe will be reduced by a specified amount of percentage points not to exceed the mid-single digits.

The development by AstraZeneca of a licensed product under the 2015 Co-Development Agreement is subject to certain reciprocal non-compete obligations.

AstraZeneca is obligated to pay us up to $925 million in the aggregate upon the achievement of certain development and regulatory milestones ($500 million), which includes $100 million we expect to receive upon dosing of the first patient in the first Phase III clinical trial for monalizumab, and commercialization milestones ($425 million). As described above, the arrangement also provides for a 50% profit share and, subject to certain deferrals of reimbursement, loss share of licensed products in Europe if we do not opt out of our co-funding and co-promoting obligations. In addition, we will be eligible to receive tiered royalties ranging from a low double-digit to mid-teen percentage on net sales of licensed products outside of Europe. The royalties payable to us under the 2015 Co-Development Agreement may be reduced under certain circumstances, including loss of exclusivity or lack of patent protection.

Our right to receive royalties under the 2015 Co-Development Agreement expires, on a licensed product-by-licensed product and country-by-country basis, on the latest of: (i) the tenth anniversary of the first commercial sale of such licensed product in such country, or in the case of European countries, in any European country, (ii) the expiration of regulatory exclusivity for such licensed product in such country and (iii) the expiration of the last-to-expire valid licensed patent claim subject to the agreement that covers such licensed product in such country.

Unless earlier terminated, the term of the 2015 Co-Development Agreement will expire on the date on which all of AstraZeneca's payment obligations have expired. We may terminate the 2015 Co-Development Agreement if AstraZeneca challenges any patent licensed to it under the agreement. AstraZeneca may terminate the 2015 Co-Development Agreement in its entirety for convenience at any time effective upon 120 days' prior written notice to us. Either party may terminate the 2015 Co-Development Agreement in the event of an uncured material breach by the other party or for certain bankruptcy or insolvency events involving the other party.

If the 2015 Co-Development Agreement is terminated by AstraZeneca for convenience or by us for AstraZeneca's material breach, insolvency or a patent challenge by AstraZeneca, all licenses and rights granted under the agreement terminate, however, upon any such termination, AstraZeneca would grant us an exclusive, worldwide, royalty-bearing right and license, with the right to grant sublicenses, under technology developed by AstraZeneca and incorporated into or necessary for the exploitation of licensed products, except for certain manufacturing technology that would require a separate agreement. If the 2015 Co-Development Agreement is terminated by AstraZeneca for our material breach or insolvency, AstraZeneca has the right to continue the agreement by providing written notice to us. If AstraZeneca provides us with such written notice, among other things, our rights under the co-promote option will terminate and we must cease any development, manufacture or commercialization activities under the agreement.

2018 Agreements

In October 2018, we entered into three agreements with AstraZeneca. The first agreement is a collaboration and option agreement relating to IPH5201, or the 2018 CD39 Option Agreement. We received an initial payment of $50 million under this agreement, $26 million of which was received in October 2018 and $24 million of which was received in January 2019. The second agreement is an option agreement relating to four pre-clinical programs, which we refer to as the 2018 Future Programs Option Agreement. We received an initial payment of $20 million under this agreement in October 2018. The third agreement is a license agreement with AstraZeneca relating to Lumoxiti, or the Lumoxiti Agreement. We made an initial payment to AstraZeneca of $50 million under this agreement in January 2019.

2018 CD39 Option Agreement

Pursuant to the 2018 CD39 Option Agreement, we granted to AstraZeneca an exclusive option to obtain an exclusive license to certain of our patents and know-how to develop and commercialize licensed products, including IPH5201 in the field of the diagnosis, prevention and treatment of all diseases and conditions in humans or animals, subject to certain limitations.

Under the 2018 CD39 Option Agreement, we must collaborate with AstraZeneca to develop CD39 option products. Prior to the expiration of the option period, we and AstraZeneca are subject to certain non-compete obligations.

AstraZeneca is responsible for funding the research and development costs of CD39 option products contemplated in the joint development plan. Additionally, we may conduct certain exploratory clinical studies at our own cost, subject to reimbursement by AstraZeneca with a premium under certain circumstances related to subsequent development by AstraZeneca.

Following the dosing of the first patient on March 9, 2020 in the IPH5201 Phase I clinical trial, AstraZeneca made a $5 million milestone payment to Innate under the companies' October 2018 multi-product oncology development collaboration. Pursuant to the 2018 CD39 Option Agreement, AstraZeneca is obligated to pay us up to $5 million in the aggregate upon the achievement of certain development milestones.

Unless earlier terminated, the term of the 2018 CD39 Option Agreement will expire on the earlier of exercise of the option or expiration of the option period in the event that AstraZeneca does not exercise the option. We may terminate the 2018 CD39 Option Agreement if AstraZeneca challenges any option patent. AstraZeneca may terminate the 2018 CD39 Option Agreement in its entirety for convenience at any time effective upon three months' prior written notice to us. Either party may terminate the 2018 CD39 Option Agreement in the event of an uncured material breach by the other party or for certain bankruptcy or insolvency events involving the other party.

CD39 Co-Development and License Agreement Upon Option Exercise by AstraZeneca

Upon exercise of the option under the 2018 CD39 Option Agreement, we would enter into a co-development and license agreement with AstraZeneca, or the CD39 Potential License Agreement. Under the CD39 Potential License Agreement, we would grant to AstraZeneca a worldwide, exclusive license, subject to certain exclusions, to certain of our patents and know-how regarding, among other things, our IPH5201 candidate, to develop, manufacture and commercialize licensed products in the field of diagnosis, prevention and treatment of diseases and conditions in humans and in animals, subject to certain limitations. We would retain certain rights under the licensed patents and know-how to, among other things, co-promote licensed products in certain European countries, pursuant to our option to co-promote.

The CD39 Potential License Agreement provides for a payment of $25 million upon exercise. Additionally, AstraZeneca would be obligated to pay us up to $795 million in the aggregate upon the achievement of certain development and regulatory milestones ($295 million) and commercialization milestones ($500 million). The arrangement also provides for a 50% profit share in Europe if we opt into certain co-promoting and late stage co-funding obligations. In addition, we would be eligible to receive tiered royalties ranging from a high-single digit to mid-teen percentage on net sales of IPH5201, or from a mid-single digit to low-double digit percentage on net sales of other types of licensed products, outside of Europe. The royalties payable to us under the CD39 Potential License Agreement may be reduced under certain circumstances, including loss of exclusivity or lack of patent protection.

Under the CD39 Potential License Agreement, unless we have elected not to co-fund, we would be required to collaborate with AstraZeneca to develop and commercialize licensed products. AstraZeneca would be the lead party in developing and commercializing the licensed products and each party must use commercially reasonable efforts to develop, obtain regulatory approval and commercialize at least one licensed product in certain major markets. Each party would have to use commercially reasonable efforts to complete its development activities in accordance with a specified development plan.

We would have the option to co-fund 30% of the Phase III clinical trials of licensed products in order to share in 50% of the profits and losses of licensed products in Europe. If we do not exercise this co-funding option, among other things, our right to share in 50% of the profits and losses in Europe and right to co-promote in certain European countries will terminate and will be replaced by rights to receive royalties on net sales at the rates applicable to outside of Europe. Additionally, certain milestone payments that may be payable to us would be reduced. AstraZeneca would be responsible for the promotion of licensed products worldwide, subject to our option to co-promote the licensed products in certain European countries if we elect to co-fund. Additionally, we would have a right of first negotiation in the event that AstraZeneca wishes to grant a third-party the right to commercialize licensed products in Europe or the United States.

The development by AstraZeneca of a licensed product under the Potential License Agreement is subject to certain reciprocal non-compete obligations.

Our right to receive royalties under the CD39 Potential License Agreement expires, on a licensed product-by-licensed product and country-by-country basis, on the latest of: (i) the tenth anniversary of the first commercial sale of such licensed product in such country, or, in the case of European countries, in any European country, (ii) the expiration of regulatory exclusivity for such licensed product in such country and (iii) the expiration of the last-to-expire valid licensed patent claim subject to the agreement that covers such licensed product in such country.

Unless earlier terminated, the term of the CD39 Potential License Agreement would expire on the date on which all of AstraZeneca's payment obligations have expired. We may terminate the CD39 Potential License Agreement if AstraZeneca challenges any patent licensed to it under the agreement. AstraZeneca may terminate the CD39 Potential License Agreement in its entirety for convenience at any time effective upon 120 days' prior written notice to us. Either party may terminate the CD39 Potential License Agreement in the event of an uncured material breach by the other party or for certain bankruptcy or insolvency events involving the other party.

2018 Future Programs Option Agreement

Pursuant to the 2018 Future Programs Option Agreement, we granted to AstraZeneca four exclusive options that are exercisable until IND approval to obtain a worldwide, royalty-bearing, exclusive license to certain of our patents and know-how relating to certain specified pipeline candidates to develop and commercialize optioned products in all fields of use. The relevant programs are IPH43, IPH25, the anti-Siglec-9 antibody program and a multi-specific NKp46 NKCE program. Upon exercise of an option, we would be entitled to an option exercise payment of $35 million, as well as development and regulatory milestone payments ($320 million) and commercialization milestone payments ($500 million) and tiered, mid-single digit to mid-teen percentage royalties on net sales of the applicable product. The royalties payable to us may be reduced under certain circumstances, including loss of exclusivity, lack of patent protection or the specific nature of the compound included within the applicable product. Additionally, we would have rights to co-fund certain development costs in order to obtain profit and loss sharing in Europe. So long as we elect to co-fund such development costs, we also will have a right to co-promote optioned products in Europe.

License Agreement for Lumoxiti

Pursuant to the Lumoxiti Agreement, we obtained an exclusive license under certain patents and know-how of AstraZeneca to develop, manufacture and commercialize Lumoxiti for all uses in humans and animals in the United States, the European Union and Switzerland. We are obligated to pay AstraZeneca up to $25 million in the aggregate upon the achievement of certain regulatory and commercial milestones. In connection with the Lumoxiti Agreement, we also obtained an exclusive sublicense from AstraZeneca under certain third-party intellectual property rights. In consideration for such sublicense we are obligated to pay a low single digit royalty on our net sales of Lumoxiti, as well as milestone payments up to approximately $1 million in the aggregate.

Under the Lumoxiti Agreement, AstraZeneca is obligated to provide support for the continued development and commercialization of Lumoxiti in the European Union and Switzerland prior to regulatory submission and approval as well as support for the continued commercialization of Lumoxiti in the United States for a specified period. We will reimburse AstraZeneca for the development, production and commercialization costs it will incur during the transition period, subject to certain limitations for the year ended December 31, 2019. In addition, pursuant to the Lumoxiti Agreement we entered into a supply agreement with AstraZeneca relating to the exclusive manufacturing and supply by AstraZeneca of Lumoxiti in connection with its commercialization in the U.S., the European Union., the United Kingdom and Switzerland.

Under the Lumoxiti Agreement, we have a right of first negotiation in the event that AstraZeneca intends to grant rights to commercialize Lumoxiti outside of the United States, the European Union and Switzerland.

The Lumoxiti Agreement will expire on a country-by-country basis upon the latest of (i) the expiry of the last exclusively licensed patent in such country, (ii) expiration of any regulatory exclusivity in such country, and (iii) the fifteenth anniversary of the first commercial sale of Lumoxiti in such country. Either party may terminate the Lumoxiti Agreement upon any uncured material breach of such party's obligations under the agreement or upon a bankruptcy or insolvency of the other party. Additionally, AstraZeneca may terminate the agreement in the event we challenge any patent exclusively licensed under the agreement or cease to perform all commercial activities with respect to Lumoxiti in the United States or the European Union for a specified period of time. We may terminate the Lumoxiti Agreement upon certain prior notice to AstraZeneca.

Additional agreements related to Monalizumab

Novo Nordisk A/S

On February 5, 2014, we in-licensed the full development and commercialization rights to monalizumab relating to the modulation of the activity of isolated NK cells from Novo Nordisk A/S. In consideration for these rights, we paid Novo Nordisk A/S €2 million in cash and 600,000 of our ordinary shares at a price of €8.33 per share. Novo Nordisk A/S is eligible to receive a total of €20 million in potential regulatory milestones and tiered mid-to-high single-digit percentage royalties on future net sales.

The agreement with Novo Nordisk A/S included a right to additional consideration in the event of an out-licensing agreement. Consequently, following the agreement signed with AstraZeneca in April 2015, we paid Novo Nordisk A/S an additional consideration amount of €6.5 million.

In October 2018 AstraZeneca exercised its option under the 2015 Option Agreement to acquire an exclusive license to monalizumab. Pursuant to this option exercise, AstraZeneca paid $100 million to us and, as a result, Novo Nordisk A/S became entitled to a second and final payment amounting to $15.0 million (€13.1 million). If the AstraZeneca agreement is terminated for any reason, we will pay to Novo Nordisk A/S a portion of any amounts that have been budgeted but have not been spent or will not be spent under the initial research and development budget. In light of current development plans and research and development costs incurred to date, we do not currently expect any amounts to be paid pursuant to this provision.

License Agreement with Novo Nordisk for avdoralimab

In July of 2017 we entered into an exclusive license agreement with Novo Nordisk A/S relating to avdoralimab, or the 2017 Novo Agreement, pursuant to which we obtained a worldwide, exclusive license under certain patents and know-how of Novo Nordisk A/S to develop, manufacture and commercialize pharmaceutical products that contain or comprise an Anti-C5aR antibody. We made an initial payment to Novo Nordisk A/S of €40.0 million under the 2017 Novo Agreement which was offset against Novo Nordisk A/S's subscription in new shares. We are obligated to pay Novo Nordisk A/S in the aggregate up to €370.0 million upon achievement of certain development, regulatory and sales milestones and tiered royalties ranging from a low double-digit to low teen percentage on net sales. Our royalty payment obligations are subject to certain reductions and expire on a product-by-product and country-by-country basis upon the later of the date the exploitation of a licensed product is no longer covered by a claim of a licensed patent in such country, loss of data or regulatory exclusivity in such country, and the twelfth anniversary of the first commercial sale of such product in such country. In connection with the 2017 Novo Agreement, we obtained an exclusive sublicense from Novo Nordisk A/S under certain third-party intellectual property rights. In consideration for such sublicense we may be obligated to pay a mid-single digit royalty on our net sales of a licensed product, however, we will be entitled to offset such payments against royalties payable to Novo Nordisk A/S.

Under the 2017 Novo Agreement, we are obligated to use commercially reasonable efforts to develop and seek regulatory approval for a licensed product.

The 2017 Novo Agreement shall expire upon expiration of the last royalty payment obligation under the agreement. Either party may terminate the 2017 Novo Agreement upon any uncured material breach of the agreement by the other party or upon a bankruptcy or insolvency of the other party. Additionally, Novo Nordisk A/S may terminate the agreement in the event we challenge any patent licensed under the agreement. We may terminate the 2017 Novo Agreement upon prior notice to Novo Nordisk A/S.

Collaboration and licensing agreement with Sanofi

We entered into a research collaboration and licensing agreement with Sanofi in January 2016 to apply our proprietary technology to the development of bispecific antibody formats engaging NK cells to kill tumor cells through the activating receptor NKp46. We granted to Sanofi under certain of our intellectual property a non-exclusive, worldwide, royalty-free research license, as well as an exclusive, worldwide license to research, develop and commercialize products directed against two specified targets, for all therapeutic, prophylactic and diagnostic indications and uses.

We will work together with Sanofi on the generation and evaluation of up to two bispecific NK cell engagers, using our technology and Sanofi's tumor targets. Under the terms of the license agreement, Sanofi will be responsible for the development, manufacturing and commercialization of products resulting from the research collaboration. We will be eligible for up to €400.0 million in payments, primarily upon the achievement of development and commercial milestones, as well as royalties ranging from a mid to high single-digit percentage on net sales.

Orega License Agreement

Pursuant to our licensing agreement with Orega Biotech, we acquired an exclusive license to Orega Biotech's intellectual property rights relating to its anti-CD39 checkpoint inhibitor program. As of December 31, 2018, we had paid a total amount of €1.8 million to Orega Biotech for the acquisition of these intellectual property rights, and in June of 2019 we paid Orega Biotech €7.0 million in relation to the anti-CD39 program as consideration relating to the collaboration and option agreement signed on October 22, 2018 with AstraZeneca for IPH5201. Following the dosing of the first patient on March 9, 2020 in the IPH5201 Phase I clinical trial, AstraZeneca made a $5 million milestone pursuant to our collaboration agreement with AstraZeneca and are obligated to make a €2.7 million milestone payment to Orega Biotech SAS pursuant to our licensing agreement with Orega Biotech SAS. We may also be obligated to pay Orega Biotech up to an additional €48.8 million in the aggregate upon the achievement of development and regulatory milestones, and mid-single digit to low-teen percentage payments, depending on determinations relating to Orega Biotech's intellectual property rights for certain patents, on sublicensing revenues we receive pursuant to our agreement with AstraZeneca relating to IPH5201.

The summaries provided above do not purport to be complete and are qualified in their entirety by reference to the complete agreements, which are attached as exhibits to this Annual Report on Form 20-F. For additional information on our material contracts, please see "Item 4. Information on the Company," "Item 6. Directors, Senior Management and Employees," and "Item 7.B - Related Party Transactions" of this Annual Report on 20-F.

D. Exchange Controls.

Under current French foreign exchange control regulations there are no limitations on the amount of cash payments that we may remit to residents of foreign countries. Laws and regulations concerning foreign exchange controls do, however, require that all payments or transfers of funds made by a French resident to a non-resident such as dividend payments be handled by an accredited intermediary. All registered banks and substantially all credit institutions in France are accredited intermediaries.

E. Taxation.

Material U.S. Federal Income Tax Considerations

The following describes material U.S. federal income tax considerations relating to the acquisition, ownership and disposition of our ordinary shares or ADSs by a U.S. holder (as defined below)) who hold our ordinary shares or ADSs as capital assets. This summary does not address all U.S. federal income tax matters that may be relevant to a particular U.S. holder. This summary does not address tax considerations applicable to a holder of our ordinary shares or ADSs that may be subject to special tax rules including, without limitation, the following:

- banks, financial institutions or insurance companies;
- brokers, dealers or traders in securities, currencies, commodities, or notional principal contracts;
- tax-exempt entities or organizations, including an "individual retirement account" or "Roth IRA" as defined in Section 408 or 408A of the Code (as defined below), respectively;
- real estate investment trusts, regulated investment companies or grantor trusts;
- persons that hold our ordinary shares or ADSs as part of a "hedging," "integrated," "wash sale" or "conversion" transaction or as a position in a "straddle" for U.S. federal income tax purposes;
- S corporations, partnerships, or other entities or arrangements classified as partnerships for U.S. federal income tax purposes;

- certain former citizens or long-term residents of the United States;
- persons that received our ordinary shares or ADSs as compensation for the performance of services;
- persons acquiring our ordinary shares or ADSs in connection with a trade or business conducted outside of the United States, including a permanent establishment or a fixed base in France;
- holders that own directly, indirectly, or through attribution 10% or more of the voting power or value of our ordinary shares or ADSs; and
- holders that have a "functional currency" other than the U.S. dollar.

Holders of our ordinary shares or ADSs who fall within one of the categories above are advised to consult their tax advisor regarding the specific tax consequences which may apply to their particular situation.

For the purposes of this description, a "U.S. holder" is a beneficial owner of our ordinary shares or ADSs that is (or is treated as), for U.S. federal income tax purposes:

- an individual who is a citizen or resident of the United States;
- a corporation created or organized in or under the laws of the United States, any state therein or the District of Columbia;
- an estate, the income of which is subject to U.S. federal income taxation regardless of its source; or
- a trust, if a court within the United States is able to exercise primary supervision over its administration and one or more U.S. persons have the authority to control all of the substantial decisions of such trust, or if such trust has a valid election in effect under applicable U.S. Treasury Regulations to be treated as a U.S. person.

If an entity or arrangement treated as a partnership for U.S. federal income tax purposes holds our ordinary shares or ADSs, the tax consequences relating to an investment in our ordinary shares or ADSs will depend in part upon the status of the partner and the activities of the partnership. Such a partner or partnership should consult its tax advisor regarding the specific tax considerations of acquiring, owning and disposing of our ordinary shares or ADSs in its particular circumstances.

Persons considering an investment in our ordinary shares or ADSs should consult their own tax advisors as to the particular tax consequences applicable to them relating to the acquisition, ownership and disposition of our ordinary shares or ADSs, including the applicability of U.S. federal, state and local tax laws, French tax laws and other non-U.S. tax laws.

This description does not address the U.S. federal estate, gift, or alternative minimum tax considerations, the Medicare tax on net investment income or any U.S. state, local, or non-U.S. tax considerations of the acquisition, ownership and disposition of our ordinary shares or ADSs.

This description is based on the U.S. Internal Revenue Code of 1986, as amended, or the Code, existing, proposed and temporary U.S. Treasury Regulations promulgated thereunder and administrative and judicial interpretations thereof, in each case as of the date hereof. All the foregoing is subject to change, which change could apply retroactively, and to differing interpretations, all of which could affect the tax considerations described below. There can be no assurances that the U.S. Internal Revenue Service, or the IRS, will not take a position concerning the tax consequences of the acquisition, ownership and disposition of our ordinary shares or ADSs or that such a position would not be sustained by a court. We have not obtained, nor do we intend to obtain, a ruling with respect to the U.S. federal income tax considerations of the purchase, ownership or disposition of our ordinary shares or ADSs. Accordingly, holders should consult their own tax advisors concerning the U.S. federal, state, local and non-U.S. tax consequences of acquiring, owning and disposing of our ordinary shares or ADSs in their particular circumstances.

As indicated below, this summary is subject to the discussion below of the U.S. federal income tax rules applicable to a "passive foreign investment company," or a PFIC.

In general, and taking into account the earlier assumptions, for U.S. federal income tax purposes, a U.S. holder holding ADSs will be treated as the owner of the ordinary shares represented by the ADSs. Exchanges of ordinary shares for ADSs, and ADSs for ordinary shares, generally will not be subject to U.S. federal income tax.

Distributions. Subject to the discussion under "—Passive Foreign Investment Company Considerations," below, the gross amount of any distribution (including any amounts withheld in respect of foreign tax) actually or constructively received by a U.S. holder with respect to our ordinary shares or ADSs will generally be taxable to the U.S. holder as a dividend to the extent of the U.S. holder's pro rata share of our current or accumulated earnings and profits as determined under U.S. federal income tax principles. Distributions in excess of earnings and profits will generally be non-taxable to the U.S. holder to the extent of, and will be applied against and reduce, the U.S. holder's adjusted tax basis in our ordinary shares or ADSs. Distributions in excess of earnings and profits and such adjusted tax basis will generally be taxable to the U.S. holder as either long-term or short-term capital gain depending upon whether the U.S. holder has held our ordinary shares or ADSs for more than one year as of the time such distribution is received. However, since we do not calculate our earnings and profits under U.S. federal income tax principles, it is expected that any distribution will be reported as a dividend, even if that distribution would otherwise be treated as a non-taxable return of capital or as capital gain under the rules described above. Non-corporate U.S. holders may qualify for the preferential rates of taxation with respect to dividends on our ordinary shares or ADSs applicable to long-term capital gains (i.e., gains from the sale of capital assets held for more than one year), or qualified dividend income if we are a "qualified foreign corporation" and certain other requirements are met. A non-U.S. corporation (other than a corporation that is a PFIC for the taxable year in which the dividend is paid or the preceding taxable year) generally will be considered to be a qualified foreign corporation (a) if it is eligible for the benefits of a comprehensive tax treaty with the United States which the Secretary of Treasury of the United States determines is satisfactory for purposes of this provision and which includes an exchange of information provision, or (b) with respect to any dividend it pays on ADSs which are readily tradable on an established securities market in the United States. Our ADSs are listed on the Nasdaq Global Select Market, which is an established securities market in the United States, and we believe the ADSs are readily tradable on the Nasdaq Global Select Market. There can be no assurance that the ADSs will continue to be considered readily tradable on an established securities market in the United States in later years. The Company, which is incorporated under the laws of France, believes that it qualifies as a resident of France for purposes of, and is eligible for the benefits of, the Convention between the Government of the United States of America and the Government of the French Republic for the Avoidance of Double Taxation and the Prevention of Fiscal Evasion with Respect to Taxes on Income and Capital, signed on August 31, 1994, as amended and currently in force, or the U.S.-France Tax Treaty, although there can be no assurance in this regard. Further, the IRS has determined that the U.S.-France Tax Treaty is satisfactory for purposes of the qualified dividend rules and that it includes an exchange-of-information program. Therefore, subject to the discussion under "—Passive Foreign Investment Company Considerations," below, such dividends will generally be "qualified dividend income" in the hands of individual U.S. holders, provided that a holding period requirement (more than 60 days of ownership, without protection from the risk of loss, during the 121-day period beginning 60 days before the ex-dividend date) and certain other requirements are met. The dividends will not be eligible for the dividends-received deduction generally allowed to corporate U.S. holders.

A U.S. holder generally may claim the amount of any French withholding tax on a distribution as either a deduction from gross income or a credit against its U.S. federal income tax liability. The foreign tax credit is subject to numerous complex limitations that must be determined and applied on an individual basis. Generally, the credit cannot exceed the proportionate share of a U.S. holder's U.S. federal income tax liability that such U.S. holder's taxable income bears to such U.S. holder's worldwide taxable income. In applying this limitation, a U.S. holder's various items of income and deduction must be classified, under complex rules, as either "foreign source" or "U.S. source." In addition, the creditability of foreign taxes could be affected by actions taken by intermediaries in the chain of ownership between the holders of our ordinary shares or ADSs and our company if, as a result of such actions, the holders of our ordinary shares or ADSs are not properly treated as beneficial owners of the underlying ordinary shares. Each U.S. holder should consult its own tax advisors regarding the foreign tax credit rules.

In general, the amount of a distribution paid to a U.S. holder in a foreign currency will be the U.S. dollar value of the foreign currency calculated by reference to the spot exchange rate on the day the depositary receives the distribution, in the case of the ADSs, or on the day the distribution is received by the U.S. holder, in the case of ordinary shares, regardless of whether the foreign currency is converted into U.S. dollars at that time. Any foreign currency gain or loss a U.S. holder realizes on a subsequent conversion of foreign currency into U.S. dollars will be U.S. source ordinary income or loss. If dividends received in a foreign currency are converted into U.S. dollars on the day they are received, a U.S. holder should not be required to recognize foreign currency gain or loss in respect of the dividend.

Sale, Exchange or Other Taxable Disposition. A U.S. holder will generally recognize gain or loss for U.S. federal income tax purposes upon the sale, exchange or other taxable disposition of our ordinary shares or ADSs in an amount equal to the difference between the amount realized from such sale or exchange and the U.S. holder's adjusted tax basis in those ordinary shares or ADSs, each as determined in U.S. dollars. Subject to the discussion under "—Passive Foreign Investment Company Considerations" below, this gain or loss will generally be a capital gain or loss. The adjusted tax basis in our ordinary shares or ADSs generally will be equal to the U.S dollar cost of such ordinary shares or ADSs. Capital gain from the sale, exchange or other taxable disposition of our ordinary shares or ADSs by a non-corporate U.S. holder is generally eligible for a preferential rate of taxation applicable to capital gains, if the non-corporate U.S. holder's holding period determined at the time of such sale, exchange or other taxable disposition for such ordinary shares or ADSs exceeds one year (i.e., such gain is long-term taxable gain). The deductibility of capital losses for U.S. federal income tax purposes is subject to limitations. Any such gain or loss that a U.S. holder recognizes generally will be treated as U.S. source gain or loss for foreign tax credit limitation purposes.

For a cash basis taxpayer, units of foreign currency paid or received are translated into U.S. dollars at the spot rate on the settlement date of the purchase or sale. In that case, no foreign currency exchange gain or loss will result from currency fluctuations between the trade date and the settlement date of such a purchase or sale.

An accrual basis taxpayer, however, may elect the same treatment required of cash basis taxpayers with respect to purchases and sales of our ordinary shares or ADSs that are traded on an established securities market, provided the election is applied consistently from year to year. Such election may not be changed without the consent of the IRS. For an accrual basis taxpayer who does not make such election, units of foreign currency paid or received are translated into U.S. dollars at the spot rate on the trade date of the purchase or sale. Such an accrual basis taxpayer may recognize exchange gain or loss based on currency fluctuations between the trade date and the settlement date. Any foreign currency gain or loss a U.S. holder realizes will be U.S. source ordinary income or loss.

Passive Foreign Investment Company Considerations. If we are a PFIC in any taxable year, a U.S. holder will be subject to special rules generally intended to reduce or eliminate any benefits from the deferral of U.S. federal income tax that a U.S. holder could derive from investing in a non-U.S. company that does not distribute all of its earnings on a current basis.

We will be a PFIC for U.S. federal income tax purposes in any taxable year in which, after applying certain look-through rules with respect to the income and assets of our subsidiaries, either: (1) at least 75% of the gross income is "passive income" or (2) at least 50% of the average quarterly value of our total gross assets (which would generally be measured by fair market value of our assets, and for which purpose the total value of our assets may be determined in part by the market value of the ADSs and our ordinary shares, which are subject to change) is attributable to assets that produce "passive income" or are held for the production of "passive income."

Passive income for this purpose generally includes dividends, interest, royalties, rents, gains from commodities and securities transactions, the excess of gains over losses from the disposition of assets which produce passive income, and includes amounts derived by reason of the temporary investment of funds raised in offerings of our ordinary shares or ADSs. If a non-U.S. corporation owns directly or indirectly at least 25% by value of the stock of another corporation, the non-U.S. corporation is treated for purposes of the PFIC tests as owning its proportionate share of the assets of the other corporation and as receiving directly its proportionate share of the other corporation's income. The determination of whether we are a PFIC is a fact-intensive determination made on an annual basis and the applicable law is subject to varying interpretation. If we are a PFIC in any taxable year during which a U.S. holder owns our ordinary shares or ADSs, such U.S. holder will be subject to special tax rules discussed below and could suffer adverse tax consequences.

The market value of our assets may be determined in large part by reference to the market price of the ADSs and our ordinary shares. Therefore, fluctuations in the market price of our ordinary shares or ADSs may result in our being a PFIC for any taxable year. Whether we are a PFIC for any taxable year will depend on income, assets, activities and market capitalization in each year, and because this is a factual determination made annually after the end of each taxable year, there can be no assurance that we will not be a PFIC in any taxable year. We do not believe we were characterized as a PFIC in our taxable year ended December 31, 2019. However, there can be no assurance that we will not be a PFIC in the current year or for any future taxable year. Our U.S. counsel expresses no opinion regarding our conclusions or our expectations regarding our PFIC status.

If we are a PFIC in any year with respect to which a U.S. holder owns our ordinary shares or ADSs, we will continue to be treated as a PFIC with respect to such U.S. holder in all succeeding years during which the U.S. holder owns the ordinary shares or ADSs, regardless of whether we continue to meet the tests described above unless we cease to be a PFIC and the U.S. holder has made a "deemed sale" election under the PFIC rules or is eligible to make and makes a mark-to-market election (as described below), with respect to all taxable years during such U.S. holder's holding period in which we are a PFIC. If the "deemed sale" election is made, a U.S. holder will be deemed to have sold the ordinary shares or ADSs the U.S. holder holds at their fair market value as of the date of such deemed sale and any gain from such deemed sale would be subject to the rules described below. After the deemed sale election, so long as we do not become a PFIC in a subsequent taxable year, the U.S. holder's ordinary shares or ADSs with respect to which such election was made will not be treated as shares in a PFIC and the U.S. holder will not be subject to the rules described below with respect to any "excess distribution" the U.S. holder receives from us or any gain from an actual sale or other disposition of the ordinary shares or ADSs. U.S. holders should consult their tax advisors as to the possibility and consequences of making a deemed sale election if such election becomes available.

If we are a PFIC, and you are a U.S. holder that does not make one of the elections described above (and below in further detail), a special tax regime will apply to both (a) any "excess distribution" by us to you (generally, your ratable portion of distributions in any year which are greater than 125% of the average annual distribution received by you in the shorter of the three preceding years or your holding period for our ordinary shares or ADSs) and (b) any gain realized on the sale or other disposition of our ordinary shares or ADSs. Under this regime, any excess distribution and realized gain will be treated as ordinary income and will be subject to tax as if (a) the excess distribution or gain had been realized ratably over your holding period for our ordinary shares or ADSs, (b) the amount deemed realized in each year had been subject to tax in each year of that holding period at the highest marginal rate for such year (other than income allocated to the current period or any taxable period before we became a PFIC, which would be subject to tax at the U.S. holder's regular ordinary income rate for the current year and would not be subject to the interest charge discussed below), and (c) the interest charge generally applicable to underpayments of tax had been imposed on the taxes deemed to have been payable in those years. In addition, dividend distributions made to you will not qualify for the lower rates of taxation applicable to qualified dividends discussed above under "Distributions."

Certain elections may alleviate some of the adverse consequences of PFIC status and would result in an alternative treatment of our ordinary shares or ADSs. If a U.S. holder makes a mark-to-market election, the U.S. holder generally will recognize as ordinary income any excess of the fair market value of our ordinary shares or ADSs at the end of each taxable year over their adjusted tax basis, and will recognize an ordinary loss in respect of any excess of the adjusted tax basis of our ordinary shares or ADSs over their fair market value at the end of the taxable year (but only to the extent of the net amount of income previously included as a result of the mark-to-market election). If a U.S. holder makes the election, the U.S. holder's tax basis in our ordinary shares or ADSs will be adjusted to reflect these income or loss amounts. Any gain recognized on the sale or other disposition of our ordinary shares or ADSs in a year in which we are a PFIC will be treated as ordinary income and any loss will be treated as an ordinary loss (but only to the extent of the net amount of income previously included as a result of the mark-to-market election). The mark-to-market election is available only if we are a PFIC and our ordinary shares or ADSs are "regularly traded" on a "qualified exchange." Our ordinary shares or ADSs will be treated as "regularly traded" in any calendar year in which more than a de minimis quantity of our ordinary shares or ADSs are traded on a qualified exchange on at least 15 days during each calendar quarter (subject to the rule that trades that have as one of their principal purposes the meeting of the trading requirement are disregarded). The Nasdaq Global Select Market is a qualified exchange for this purpose and, consequently, if the ADSs are regularly traded, the mark-to-market election will be available to a U.S. holder. It should be noted that only the ADSs and not our ordinary shares are listed on the Nasdaq Global Select Market. Consequently, our ordinary shares may not be marketable if Euronext Paris (where our ordinary shares are listed) does not meet the applicable requirements. U.S. holders should consult their tax advisors regarding the availability of the mark-to-market election for ordinary shares that are not represented by ADSs.

However, a mark-to-market election generally cannot be made for equity interests in any lower-tier PFICs that we own, unless shares of such lower-tier PFIC are themselves "marketable." As a result, even if a U.S. holder validly makes a mark-to-market election with respect to our ordinary shares or ADSs, the U.S. holder may continue to be subject to the PFIC rules (described above) with respect to its indirect interest in any of our investments that are treated as an equity interest in a PFIC for U.S. federal income tax purposes. U.S. holders should consult their tax advisors as to the availability and desirability of a mark-to-market election, as well as the impact of such election on interests in any lower-tier PFICs.

We do not currently intend to provide the information necessary for U.S. holders to make a "qualified electing fund elections" if we were treated as a PFIC for any taxable year. U.S. holders should consult their tax advisors to determine whether this election would be available and if so, what the consequences of the alternative treatments would be in their particular circumstances.

If we were a PFIC, the general tax treatment for U.S. holders described in this section would apply to indirect distributions and gains deemed to be realized by U.S. holders in respect of any of our subsidiaries that also may be PFICs. U.S. holders should consult their tax advisors regarding the application of the PFIC rules to our subsidiaries.

If a U.S. holder owns our ordinary shares or ADSs during any taxable year in which we are a PFIC, the U.S. holder generally will be required to file an IRS Form 8621 (Information Return by a Shareholder of a Passive Foreign Investment Company or Qualified Electing Fund) with respect to the company, generally with the U.S. holder's federal income tax return for that year. If our company were a PFIC for a given taxable year, then you should consult your tax advisor concerning your annual filing requirements.

The U.S. federal income tax rules relating to PFICs are complex. Prospective U.S. investors are urged to consult their own tax advisors with respect to the acquisition, ownership and disposition of our ordinary shares or ADSs, the consequences to them of an investment in a PFIC, any elections available with respect to our ordinary shares or ADSs and the IRS information reporting obligations with respect to the acquisition, ownership and disposition of our ordinary shares or ADSs.

Backup Withholding and Information Reporting. U.S. holders generally will be subject to information reporting requirements with respect to dividends on our ordinary shares or ADSs and on the proceeds from the sale, exchange or disposition of our ordinary shares or ADSs that are paid within the United States or through U.S.-related financial intermediaries, unless the U.S. holder is an "exempt recipient." In addition, U.S. holders may be subject to backup withholding on such payments, unless the U.S. holder provides a taxpayer identification number and a duly executed IRS Form W-9 or otherwise establishes an exemption. Backup withholding is not an additional tax, and the amount of any backup withholding will be allowed as a credit against a U.S. holder's U.S. federal income tax liability and may entitle such holder to a refund, provided that the required information is timely furnished to the IRS.

Foreign Asset Reporting. Certain individual U.S. holders are required to report information relating to an interest in our ordinary shares or ADSs, subject to certain exceptions (including an exception for shares held in accounts maintained by U.S. financial institutions) by filing IRS Form 8938 (Statement of Specified Foreign Financial Assets) with their federal income tax return. U.S. holders are urged to consult their tax advisors regarding their information reporting obligations, if any, with respect to their ownership and disposition of our ordinary shares or ADSs.

THE DISCUSSION ABOVE IS A SUMMARY OF THE U.S. FEDERAL INCOME TAX CONSEQUENCES OF AN INVESTMENT IN OUR ORDINARY SHARES OR ADSs AND IS BASED UPON LAWS AND RELEVANT INTERPRETATIONS THEREOF IN EFFECT AS OF THE DATE OF THIS ANNUAL REPORT, ALL OF WHICH ARE SUBJECT TO CHANGE, POSSIBLY WITH RETROACTIVE EFFECT. EACH PROSPECTIVE INVESTOR IS URGED TO CONSULT ITS OWN TAX ADVISOR ABOUT THE TAX CONSEQUENCES TO IT OF AN INVESTMENT IN OUR ORDINARY SHARES OR ADSs IN LIGHT OF THE INVESTOR'S OWN CIRCUMSTANCES.

Material French Tax Considerations

The following describes the material French income tax consequences to U.S. holders of purchasing, owning and disposing of our ADSs.

This discussion does not purport to be a complete analysis or listing of all potential tax effects of the acquisition, ownership or disposition of our ADSs to any particular investor, and does not discuss tax considerations that arise from rules of general application or that are generally assumed to be known by investors. All of the following is subject to change. Such changes could apply retroactively and could affect the consequences described below.

In 2011, France introduced a comprehensive set of tax rules applicable to French assets that are held by or in foreign trusts. These rules provide inter alia for the inclusion of trust assets in the settlor's net assets for the purpose of applying the former French wealth tax (replaced by the French real estate wealth tax as from January 1, 2018), for the application of French gift and death duties to French assets held in trust, for a specific tax on capital on the French assets of foreign trusts not already subject to the former French wealth tax (replaced by the French real estate wealth tax as from January 1, 2018) and for a number of French tax reporting and disclosure obligations. The following discussion does not address the French tax consequences applicable to securities (including ADSs) held in trusts. If ADSs are held in trust, the grantor, trustee and beneficiary are advised to consult their own tax advisor regarding the specific tax consequences of acquiring, owning and disposing of such securities.

The description of the French income tax and real estate wealth tax consequences set forth below is based on the double tax treaty entered into between the Government of the United States of America and the Government of the French Republic for the Avoidance of Double Taxation and the Prevention of Fiscal Evasion with Respect to Taxes on Income and Capital of August 31, 1994 (the "Treaty"), which came into force on December 30, 1995 (as amended by any subsequent protocols, including the protocol of January 13, 2009), and the tax guidelines issued by the French tax authorities in force as of the date of this Annual Report, or the Treaty.

This discussion applies only to investors that are entitled to Treaty benefits under the "Limitation on Benefits" provisions contained in the Treaty.

If a partnership holds ADSs, the tax treatment of the partnership and a partner in such partnership generally will depend on the status of the partner and the activities of the partnership. Such partner or partnership is urged to consult its own tax advisor regarding the specific tax consequences of acquiring, owning and disposing of ADSs.

This discussion applies only to investors that hold ADSs as capital assets that are entitled to Treaty benefits under the "Limitation on Benefits" provision contained in the Treaty, and whose ownership of the ADSs is not effectively connected to a permanent establishment or a fixed base in France. Certain U.S. holders may be subject to special rules not discussed below, and are advised to consult their usual tax advisor regarding the specific tax consequences which may apply to their particular situation.

U.S. holders are advised to consult their own tax advisor regarding the tax consequences of the purchase, ownership and disposition of ADSs in light of their particular circumstances, especially with regard to the "Limitations on Benefits" provision contained in the Treaty.

Tax on Sale or other Disposals

As a matter of principles, under French tax law, a U.S. holder should not be subject to any French tax on any capital gain from the sale, exchange, repurchase or redemption by us of ordinary shares or ADSs, provided such U.S. holder is not a French tax resident for French tax purposes and has not held more than 25% of our dividend rights, known as "*droits aux benefices sociaux*," at any time during the preceding five years, either directly or indirectly, and, as relates to individuals, alone or with relatives (as an exception, a U.S. holder resident, established or incorporated in certain non-cooperative States or territories as defined in Article 238-0 A of the French tax code (*Code général des impôts*, the "FTC") should be subject to a 75% withholding tax in France on any such capital gain, regardless of the fraction of the dividend rights it holds).

Under application of the Treaty, a U.S. holder who is a U.S. resident for purposes of the Treaty and entitled to Treaty benefits will not be subject to French tax on such capital gain unless the ordinary shares or the ADSs form part of the business property of a permanent establishment or fixed base that the U.S. holder has in France. U.S. holders who own ordinary shares or ADSs through U.S. partnerships that are not resident for Treaty purposes are advised to consult their own tax advisor regarding their French tax treatment and their eligibility for Treaty benefits in light of their own particular circumstances. A U.S. holder that is not a U.S. resident for Treaty purposes or is not entitled to Treaty benefits (and in both cases is not resident, established or incorporated in certain non-cooperative States or territories as defined in Article 238-0 A of the FTC) and has held more than 25% of our dividend rights, known as "droits aux bénéfices sociaux" at any time during the preceding five years, either directly or indirectly, and, as relates to individuals, alone or with relatives will be subject to a levy in France (i) at the rate of 12.8% for individuals, and (ii) a rate corresponding to the standard corporate income tax rate set forth in Article 219-I of the FTC for legal persons. Special rules apply to U.S. holders who are residents of more than one country.

Financial Transactions Tax and Registration Duties

Pursuant to Article 235 ter ZD of the FTC, purchases of shares or ADSs of a French company listed on a regulated market of the European Union or on a foreign regulated market formally acknowledged by the AMF are subject to a 0.3% French tax on financial transactions provided that the issuer's market capitalization exceeds 1 billion euros as of December 1 of the year preceding the taxation year. A list of companies whose market capitalization exceeds 1 billion euros as of December 1 of the year preceding the taxation year, within the meaning of Article 235 ter ZD of the FTC, is published annually by the French tax authorities in their official guidelines. As at 1 December 2019, our market capitalization did not exceed 1 billion euros, pursuant to BOI-ANNX-000467-20191218.

Moreover, Nasdaq Global Select Market, on which ADSs are listed, is not currently acknowledged by the AMF but this may change in the future.

As a consequence, neither the ADSs nor the ordinary shares are currently within the scope of the French tax on financial transactions.

Purchases of our ADSs may be subject to such tax in the future provided that our market capitalization exceeds 1 billion euros in the year preceding the taxation year and that the Nasdaq Global Select Market is acknowledged by the French AMF.

In the case where Article 235 ter ZD of the FTC is not applicable, transfers of shares issued by a French company which are listed on a regulated or organized market within the meaning of the French monetary code (*Code monétaire et financier*) are subject to uncapped registration duties at the rate of 0.1% if the transfer is evidenced by a written statement ("*acte*") executed either in France or outside France. As ordinary shares of our company are listed on Euronext Paris, which is an organized market within the meaning of the French monetary code, their transfer should be subject to uncapped registration duties at the rate of 0.1% subject to the existence of a written statement ("*acte*"), and provided that Article 235 ter ZD of the FTC is not applicable. Although there is no case law or official guidelines published by the French tax authorities on this point, transfer of ADSs should remain outside of the scope of the aforementioned 0.1% registration duties.

Taxation of Dividends

Dividends paid by a French corporation to non-residents of France are generally subject to French withholding tax at a rate of (i) 28% for fiscal years beginning on or after January 1st, 2020, 26.5% for fiscal years beginning on or after January 1st, 2021 and 25% for fiscal years beginning on or after January 1st, 2022, for payment benefiting legal persons which are not French tax residents, and (ii) 12.8% for payment benefiting individuals who are not French tax residents. Dividends paid by a French corporation in certain non-cooperative States or territories, as defined in Article 238-0 A of the FTC, will generally be subject to French withholding tax at a rate of 75%. However, eligible U.S. holders entitled to Treaty benefits under the "Limitation on Benefits" provision contained in the Treaty who are U.S. residents, as defined pursuant to the provisions of the Treaty, will not be subject to this 28% (to be decreased respectively to 26.5% and 25% in 2021 and 2022) or 75% withholding tax rate, but may be subject to the withholding tax at a reduced rate (as described below).

Under the Treaty, the rate of French withholding tax on dividends paid to an eligible U.S. holder who is a U.S. resident as defined pursuant to the provisions of the Treaty and whose ownership of the ordinary shares or ADSs is not effectively connected with a permanent establishment or fixed base that such U.S. holder has in France, is generally reduced to 15%, or to 5% if such U.S. holder is a corporation and owns directly or indirectly at least 10% of the share capital of the issuer; such U.S. holder may claim a refund from the French tax authorities of the amount withheld in excess of the Treaty rates of 15% or 5%, if any.

For U.S. holders that are not individuals but are U.S. residents, as defined pursuant to the provisions of the Treaty, the requirements for eligibility for Treaty benefits, including the reduced 5% or 15% withholding tax rates contained in the "Limitation on Benefits" provision of the Treaty, are complex, and certain technical changes were made to these requirements by the protocol of January 13, 2009. U.S. holders are advised to consult their own tax advisor regarding their eligibility for Treaty benefits in light of their own particular circumstances.

Dividends paid to an eligible U.S. holder may immediately be subject to the reduced rates of 5% or 15% provided that:

- such holder establishes before the date of payment that it is a U.S. resident under the Treaty by completing and providing the depositary with a treaty form (Form 5000) in accordance with French guidelines (BOI-INT-DG-20-20-20-20-20120912 dated September 12, 2012); or

- the depositary or other financial institution managing the securities account in the U.S. of such holder provides the French paying agent with a document listing certain information about the U.S. holder and its ordinary shares or ADSs and a certificate whereby the financial institution managing the U.S. holder's securities account in the United States takes full responsibility for the accuracy of the information provided in the document.

Otherwise, dividends paid to a U.S. holder, if such U.S. holder is a legal person, will be subject to French withholding tax at the rate of 28% (to be decreased respectively to 26.5% and 25% in 2021 and 2022), or 75% if paid in certain non-cooperative States or territories (as defined in Article 238-0 A of the FTC), and then reduced at a later date to 5% or 15%, provided that such holder duly completes and provides the French tax authorities with the treaty forms Form 5000 and Form 5001 before December 31 of the second calendar year following the year during which the dividend is paid. Certain qualifying pension funds and certain other tax-exempt entities are subject to the same general filing requirements as other U.S. holders except that they may have to supply additional documentation evidencing their entitlement to these benefits.

Form 5000 and Form 5001, together with instructions, will be provided by the depositary to all U.S. holders registered with the depositary. The depositary will arrange for the filing with the French tax authorities of all such forms properly completed and executed by U.S. holders of ordinary shares or ADSs and returned to the depositary in sufficient time so that they may be filed with the French tax authorities before the distribution in order to immediately obtain a reduced withholding tax rate. Otherwise, the depositary must withhold tax at the full rate of 28% (to be decreased respectively to 26.5% and 25% in 2021 and 2022) or 75% as applicable. In that case, the U.S. holders may claim a refund from the French tax authorities of the excess withholding tax.

In any case, individual taxpayers who are not fiscally domiciled in France should not have to comply with these procedures if the French withholding tax applying to them is lower than 15%.

Estate and Gift Taxes

In general, a transfer of securities by gift or by reason of death of a U.S. holder that would otherwise be subject to French gift or inheritance tax, respectively, will not be subject to such French tax by reason of the double tax treaty entered into between the Government of the United States of America and the Government of the French Republic for the Avoidance of Double Taxation and the Prevention of Fiscal Evasion with Respect to Taxes on Estates, Inheritances and Gifts, dated November 24, 1978, unless (i) the donor or the transferor is domiciled in France at the time of making the gift or at the time of his or her death, or (ii) the ADSs were used in, or held for use in, the conduct of a business through a permanent establishment or a fixed base in France.

Wealth Tax

As from January 1, 2018, the French wealth tax (*impôt de solidarité sur la fortune*) is repealed and replaced by the French real estate wealth tax (*impôt sur la fortune immobilière*). The scope of such new tax is narrowed to French real estate assets (and certain assets deemed to be real estate assets) or rights, held directly or indirectly through one or more legal entities and whose net taxable assets amount at least to €1,300,000.

Broadly, subject to provisions of double tax treaties and to certain exceptions, individuals who are not residents of France for tax purposes within the meaning of Article 4 B of the FTC, are subject to real estate wealth tax (*impôt sur la fortune immobilière*) in France in respect of the portion of the value of their shares of our company representing real estate assets (Article 965, 2° of the FTC). Some exceptions are provided by the FTC. For instance, any participations representing less than 10% of the share capital of an operational company and shares representing real estate for the professional use of the company considered shall not fall within the scope of the French real estate wealth tax (*impôt sur la fortune immobilière*).

Under the Treaty (the provisions of which should be applicable to this new real estate wealth tax (*impôt sur la fortune immobilière*) in France), the French real estate wealth tax (*impôt sur la fortune immobilière*) will however generally not apply to securities held by an eligible U.S. holder who is a U.S. resident, as defined pursuant to the provisions of the Treaty, provided that such U.S. holder (i) does not own directly or indirectly more than 25% of the issuer's financial rights and (ii) that the ADSs do not form part of the business property of a permanent establishment or fixed base in France.

U.S. holders are advised to consult their own tax advisor regarding the specific tax consequences which may apply to their particular situation with respect to such French real estate wealth tax (*impôt sur la fortune immobilière*).

F. Dividends and Paying Agents.

Not applicable.

G. Statement by Experts.

Not applicable.

H. Documents on Display.

We are subject to the information reporting requirements of the Exchange Act applicable to foreign private issuers and under those requirements will file reports with the SEC. Those reports may be inspected without charge at the locations described below. As a foreign private issuer, we are exempt from the rules under the Exchange Act related to the furnishing and content of proxy statements, and our officers, directors and principal shareholders are exempt from the reporting and short-swing profit recovery provisions contained in Section 16 of the Exchange Act. In addition, we are not required under the Exchange Act to file periodic reports and financial statements with the SEC as frequently or as promptly as United States companies whose securities are registered under the Exchange Act. Nevertheless, we will file with the SEC an Annual Report on Form 20-F containing financial statements that have been examined and reported on, with an opinion expressed by an independent registered public accounting firm.

We maintain a corporate website at *www.innate-pharma.com*. We intend to post our Annual Report on Form 20-F on our website promptly following it being filed with the SEC. Information contained on, or that can be accessed through, our website does not constitute a part of this Annual Report. We have included our website address in this Annual Report solely as an inactive textual reference.

The Securities and Exchange Commission maintains a website (*www.sec.gov*) that contains reports, proxy and information statements and other information regarding registrants, such as us, that file electronically with the SEC.

With respect to references made in this Annual Report to any contract or other document of our company, such references are not necessarily complete and you should refer to the exhibits attached or incorporated by reference to this Annual Report for copies of the actual contract or document.

I. Subsidiary Information.

Not required.

Item 11. Quantitative and Qualitative Disclosures About Market Risk.

Our activities are exposed to liquidity risk, foreign currency exchange risk, interest rate risk and credit risk.

Liquidity risk

We do not believe that we are exposed to short-term liquidity risk, considering our cash and cash equivalents of €202.9 million as of December 31, 2019, which consist primarily of cash and money market funds and term deposits that are convertible into cash immediately without penalty.

Foreign currency exchange rate risk

We are exposed to foreign exchange risk inherent in certain subcontracting activities related to our operations in the United States, which are invoiced in U.S. dollars. We do not currently have material recurring revenues in euro, dollars or in any other currency. As we further increase our business, particularly in the United States, we expect to face greater exposure to exchange rate risk.

Our revenue denominated in U.S. dollars has represented approximately 100% of revenue in the years ended December 31, 2017, 2018 and 2019. Our payments in U.S. dollars represented approximately 15.1% 31.9% and 64.1%, of our payments in the years ended December 31, 2017, 2018 and 2019, respectively. In order to cover this foreign currency exchange rate risk, we kept in U.S. dollars a part of the consideration received from AstraZeneca in June 2015 and January 2019. . We kept the entire U.S dollars portion of the proceeds received from our October 2019 global offering in U.S dollars. We do not use hedging instruments.

Interest rate risk

We have limited exposure to interest rate risk. Our exposure primarily relates to money market funds and time deposit accounts. Changes in interest rates have a direct impact on the rate of return on these investments and the cash flows generated. We do not have any credit facilities bearing variable interest rates. The repayment of the advances from BPI France is not subject to interest rate risk. The effect of an increase or decrease in interest rates would have an immaterial effect on profit or loss.

Credit risk

The credit risk related to our cash equivalents, short-term investments and non-current financial assets is not significant in light of the quality of the issuers. We deemed that no instrument of its portfolio is exposed to credit risk.

Item 12. Description of Securities Other than Equity Securities.

A. Debt Securities.

Not applicable.

B. Warrants and Rights.

Not applicable.

C. Other Securities.

Not applicable.

D. American Depositary Shares.

Citibank, N.A. acts as the depositary bank for the ADSs. Citibank's depositary offices are located at 388 Greenwich Street, New York, New York 10013. ADSs represent ownership interests in securities that are on deposit with the depositary bank. ADSs may be represented by certificates that are commonly known as American Depositary Receipts, or ADRs. The depositary bank typically appoints a custodian to safekeep the securities on deposit. In this case, the custodian is Citibank Europe plc, 1 North Wall Quay, Dublin 1, Ireland.

We have appointed Citibank, N.A. as depositary bank pursuant to a deposit agreement. A copy of the deposit agreement has been filed with the SEC under cover of a Registration Statement on Form F-6 (Registration No. 333-234063). You may obtain a copy of the deposit agreement from the SEC's website at www.sec.gov.

Each ADS represents the right to receive, and to exercise the beneficial ownership interests in, one ordinary share that is on deposit with the depositary bank and/or custodian. An ADS also represents the right to receive, and to exercise the beneficial interests in, any other property received by the depositary bank or the custodian on behalf of the owner of the ADS but that has not been distributed to the owners of ADSs because of legal restrictions or practical considerations. We and the depositary bank may agree to change the ADS-to-Share ratio by amending the deposit agreement. This amendment may give rise to, or change, the depositary fees payable by ADS owners. The custodian, the depositary bank and their respective nominees will hold all deposited property for the benefit of the holders and beneficial owners of ADSs. The deposited property does not constitute the proprietary assets of the depositary bank, the custodian or their nominees. Beneficial ownership in the deposited property will under the terms of the deposit agreement be vested in the beneficial owners of the ADSs. The depositary bank, the custodian and their respective nominees are the record holders of the deposited property represented by the ADSs for the benefit of the holders and beneficial owners of the corresponding ADSs. A beneficial owner of ADSs may or may not be the holder of ADSs. Beneficial owners of ADSs are able to receive, and to exercise beneficial ownership interests in, the deposited property only through the registered holders of the ADSs, the registered holders of the ADSs (on behalf of the applicable ADS owners) only through the depositary bank, and the depositary bank (on behalf of the owners of the corresponding ADSs) directly, or indirectly, through the custodian or their respective nominees, in each case upon the terms of the deposit agreement.

If you are or become an owner of ADSs, you are or will become a party to the deposit agreement and therefore are or will be bound to its terms and to the terms of any ADR that represents your ADSs. The deposit agreement and the ADR specify our rights and obligations as well as your rights and obligations as owner of ADSs and those of the depositary bank. As an ADS holder you appoint the depositary bank to act on your behalf in certain circumstances. The deposit agreement and the ADRs are governed by New York law. However, our obligations to the holders of ordinary shares will continue to be governed by the laws of France, which may be different from the laws in the United States.

In addition, applicable laws and regulations may require you to satisfy reporting requirements and obtain regulatory approvals in certain circumstances. You are solely responsible for complying with such reporting requirements and obtaining such approvals. Neither the depositary bank, the custodian, us or any of their or our respective agents or affiliates shall be required to take any actions whatsoever on your behalf to satisfy such reporting requirements or obtain such regulatory approvals under applicable laws and regulations.

Fees and Expenses

Pursuant to the terms of the amended and restated deposit agreement, the holders of our ADSs are required to pay the following fees to the depositary bank:

Service	Fees
Issuance of ADSs (e.g., an issuance of ADS upon a deposit of ordinary shares, upon a change in the ADSs-to-ordinary shares ratio, or for any other reason), excluding ADS issuances as a result of distributions of ordinary shares)	Up to U.S. 5¢ per ADS issued
Cancellation of ADSs (e.g., a cancellation of ADSs for delivery of deposited property, upon a change in the ADSs-to ordinary shares ratio, or for any other reason)	Up to U.S. 5¢ per ADS cancelled
Distribution of cash dividends or other cash distributions (e.g., upon a sale of rights and other entitlements)	Up to U.S. 5¢ per ADS held
Distribution of ADSs pursuant to (i) stock dividends or other free stock distributions, or (ii) exercise of rights to purchase additional ADSs	Up to U.S. 5¢ per ADS held
Distribution of securities other than ADSs or rights to purchase additional ADSs (e.g., upon a spin-off)	Up to U.S. 5¢ per ADS held
ADS Services	Up to U.S. 5¢ per ADS held on the applicable record date(s) established by the depositary bank
Registration of ADS transfers (e.g., upon a registration of the transfer of registered ownership of ADSs, upon a transfer of ADSs into DTC and *vice versa*, or for any other reason)	Up to U.S. 5¢ per ADS (or fraction thereof) transferred
Conversion of ADSs of one series for ADSs of another series (e.g., upon conversion of Partial Entitlement ADSs for Full Entitlement ADSs, or upon conversion of Restricted ADSs (each as defined in the Deposit Agreement) into freely transferable ADSs, and *vice versa*).	Up to U.S. 5¢ per ADS (or fraction thereof) converted

ADS holders are responsible to pay certain charges such as:

- taxes (including applicable interest and penalties) and other governmental charges;
- the registration fees as may from time to time be in effect for the registration of ordinary shares on the share register and applicable to transfers of ordinary shares to or from the name of the custodian, the depositary bank or any nominees upon the making of deposits and withdrawals, respectively;
- certain cable, telex and facsimile transmission and delivery expenses;
- the fees, expenses, spreads, taxes and other charges of the depositary bank and/or service providers (which may be a division, branch or affiliate of the depositary bank) in the conversion of foreign currency;
- the reasonable and customary out-of-pocket expenses incurred by the depositary bank in connection with compliance with exchange control regulations and other regulatory requirements applicable to ordinary shares, ADSs and ADRs; and
- the fees, charges, costs and expenses incurred by the depositary bank, the custodian, or any nominee in connection with the ADR program.

ADS fees and charges for (i) the issuance of ADSs, and (ii) the cancellation of ADSs are charged to the person for whom the ADSs are issued (in the case of ADS issuances) and to the person for whom ADSs are cancelled (in the case of ADS cancellations). In the case of ADSs issued by the depositary bank into DTC, the ADS issuance and cancellation fees and charges may be deducted from distributions made through DTC, and may be charged to the DTC participant(s) receiving the ADSs being issued or the DTC participant(s) holding the ADSs being cancelled, as the case may be, on behalf of the beneficial owner(s) and will be charged by the DTC participant(s) to the account of the applicable beneficial owner(s) in accordance with the procedures and practices of the DTC participants as in effect at the time. ADS fees and charges in respect of distributions and the ADS service fee are charged to the holders as of the applicable ADS record date. In the case of distributions of cash, the amount of the applicable ADS fees and charges is deducted from the funds being distributed. In the case of (i) distributions other than cash and (ii) the ADS service fee, holders as of the ADS record date will be invoiced for the amount of the ADS fees and charges and such ADS fees and charges may be deducted from distributions made to holders of ADSs. For ADSs held through DTC, the ADS fees and charges for distributions other than cash and the ADS service fee may be deducted from distributions made through DTC, and may be charged to the DTC participants in accordance with the procedures and practices prescribed by DTC and the DTC participants in turn charge the amount of such ADS fees and charges to the beneficial owners for whom they hold ADSs. In the case of (i) registration of ADS transfers, the ADS transfer fee will be payable by the ADS Holder whose ADSs are being transferred or by the person to whom the ADSs are transferred, and (ii) conversion of ADSs of one series for ADSs of another series, the ADS conversion fee will be payable by the Holder whose ADSs are converted or by the person to whom the converted ADSs are delivered.

In the event of refusal to pay the depositary bank fees, the depositary bank may, under the terms of the deposit agreement, refuse the requested service until payment is received or may set off the amount of the depositary bank fees from any distribution to be made to the ADS holder. Note that the fees and charges you may be required to pay may vary over time and may be changed by us and by the depositary bank. You will receive prior notice of such changes. The depositary bank may reimburse us for certain expenses incurred by us in respect of the ADR program, by making available a portion of the ADS fees charged in respect of the ADR program or otherwise, upon such terms and conditions as we and the depositary bank agree from time to time.

Payment of Taxes

ADS holders are responsible for the taxes and other governmental charges payable on the ADSs and the securities represented by the ADSs. We, the depositary bank and the custodian may deduct from any distribution the taxes and governmental charges payable by holders and may sell any and all property on deposit to pay the taxes and governmental charges payable by holders. You are be liable for any deficiency if the sale proceeds do not cover the taxes that are due.

The depositary bank may refuse to issue ADSs, to deliver, transfer, split and combine ADRs or to release securities on deposit until all taxes and charges are paid by the applicable holder. The depositary bank and the custodian may take reasonable administrative actions to obtain tax refunds and reduced tax withholding for any distributions on your behalf. However, you may be required to provide to the depositary bank and to the custodian proof of taxpayer status and residence and such other information as the depositary bank and the custodian may require to fulfill legal obligations. You are required to indemnify us, the depositary bank and the custodian for any claims with respect to taxes based on any tax benefit obtained for you.

Depositary Payments for 2019

From time to time, the depositary bank may make payments to us to reimburse and/or share revenue from the fees collected from ADS holders, or waive fees and expenses for services provided, generally relating to costs and expenses arising out of establishment and maintenance of the ADS program. In performing its duties under the deposit agreement, the depositary bank may use brokers, dealers or other service providers that are affiliates of the depositary bank and that may earn or share fees or commissions. For the year ended December 31, 2019, Citibank, N.A., as depositary bank, had made reimbursements to us of €700.7 million ($772.8 million).

PART II

Item 13. Defaults, Dividend Arrearages and Delinquencies.

Not applicable.

Item 14. Material Modifications to the Rights of Security Holders and Use of Proceeds.

October 2019 Global Offering

In October 2019, we completed a global offering of an aggregate of 14,375,000 ordinary shares, including the full exercise of the underwriters' option to purchase 1,875,000 additional ordinary shares. The October 2019 global offering consisted of a U.S. initial public offering of 8,047,227 ordinary shares in the form of American Depositary Shares, each representing one ordinary share, at an offering price of $5.50 per ADS and a concurrent private placement in Europe and other countries outside of the United States and Canada of 4,452,773 ordinary shares at an offering price of €4.97 per ordinary share for aggregate gross proceeds to us of approximately €79.1 million ($71.4 million). The net proceeds to us, after deducting underwriting discounts and commissions and offering expenses, were approximately €66.0 million. The offering commenced on October 17, 2019 and did not terminate before all of the securities registered in the registration statement were sold. The effective date of the registration statement, File No. 333-233865, for our October 2019 global offering was October 16, 2019.

Citigroup Global Markets Inc., SVB Leerink LLC and Evercore Group L.L.C. acted as representatives of the underwriters in the U.S. offering. Citigroup Global Markets Limited acted as a representative in the European private placement.

The net proceeds from our October 2019 global offering have been used, and are expected to continue to be used, as described in the final prospectus for the October 2019 global offering filed with the U.S. Securities and Exchange Commission on October 16, 2019.

None of the net proceeds of our October 2019 global offering were paid directly or indirectly to any director, officer, general partner of ours or to their associates, persons owning ten percent or more of any class of our equity securities, or to any of our affiliates.

Item 15. Controls and Procedures.

Disclosure Controls and Procedures

We maintain "disclosure controls and procedures," as such term is defined in Rules 13a-15(e) and 15d-15(e) under the Exchange Act, that are designed to ensure that information required to be disclosed in the reports that we file or submit under the Exchange Act is recorded, processed, summarized and reported within the time periods specified in the rules and forms of the Securities and Exchange Commission. Disclosure controls and procedures include, without limitation, controls and procedures designed to ensure that information required to be disclosed in our reports filed or submitted under the Exchange Act is accumulated and communicated to management, including our chief executive officer (*principal executive officer*) and chief financial officer (*principal financial officer*), as appropriate, to allow timely decisions regarding required disclosure.

Our principal executive officer and principal financial officer, after evaluating the effectiveness of our disclosure controls and procedures (as defined in Rules 13a-15(e) and 15d-15(e) of the Exchange Act) as of December 31, 2019, have concluded that, as of such date, our disclosure controls and procedures were not effective at the reasonable assurance level as a result of the material weaknesses described below. Notwithstanding these material weaknesses, our management has concluded that the financial statements included elsewhere in this Annual Report present fairly, in all material respects, our financial position, results of operations and cash flows in conformity with IFRS.

Internal Control Over Financial Reporting

As permitted by the rules of the Securities and Exchange Commission for newly public companies in the U.S., our management has not completed an assessment of the effectiveness of our internal control over financial reporting and our independent registered public accounting firm has not conducted an audit of our internal control over financial reporting.

During the audit of our consolidated financial statements as of and for the years ended December 31, 2019, we identified material weaknesses in our internal control over financial reporting. A company's internal control over financial reporting is a process designed by, or under the supervision of, a company's principal executive and principal financial officers, or persons performing similar functions, and effected by a company's executive board, management and other personnel to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements in accordance with generally accepted accounting principles. Under standards established by the Public Company Accounting Oversight Board, a material weakness is a deficiency or combination of deficiencies in internal control over financial reporting, such that there is a reasonable possibility that a material misstatement in our annual or interim financial statements will not be prevented or detected and corrected on a timely basis.

In the course of auditing the consolidated financial statements as of and for the year ended December 31, 2019, several material weaknesses in our internal control over financial reporting were identified. The material weaknesses related to (i) the accounting for subcontracting clinical costs for which there was insufficient control on the input data coming from clinical studies and used in assessing their advancement (input data mainly includes expected termination date of the study, overall budget and/or number of patient visits), and (ii) the recognition of the revenue from our collaboration and licensing agreement with AstraZeneca on monalizumab for which there was insufficient review of the calculation of the transaction price and percentage of completion of costs incurred. Errors not detected in relation to topic (i) have led to incorrect amounts of R&D expenses for the year ended December 31, 2019, which were subsequently corrected prior to the issuance of our audited financial statements. The material weakness in relation to topic (ii) has led to a material misstatement of revenue for the year ended December 31, 2019, which was subsequently corrected prior to the issuance of our audited financial statements. In addition our information system, supporting the production of our financial information, also raised material weaknesses in terms of "general IT controls" (GITC) related to the management of access rights, including segregation of duties and change management.

A number of significant deficiencies in our internal controls have also been identified for the years ended December 31, 2017, 2018 and 2019. Over the course of 2020, we continue to work to remediate these material weaknesses and strengthen our controls in these areas.

Management's Annual Report on Internal Control over Financial Reporting

This Annual Report on Form 20-F does not include a report of management's assessment regarding internal control over financial reporting due to a transition period established by rules of the Securities and Exchange Commission for newly public companies.

Attestation Report of the Registered Public Accounting Firm

This Annual Report on Form 20-F does not include an attestation report of our registered public accounting firm due to a transition period established by rules of the Securities and Exchange Commission for newly public companies.

Changes in Internal Control over Financial Reporting

In 2019, we initiated a significant upgrade of our information system to support our development, starting with the implementation of an Enterprise Resource Planning system to equip our company with robust and standard tools and reinforce the reliability of our financial operations and information. See "Item 3D.—Risk Factors—Risks Related to Our Organization and Operations—We may encounter difficulties in managing our growth, which could disrupt our operations."

Item 16. Reserved.

Not applicable.

Item 16A. Audit Committees Financial Expert.

Our Supervisory board has determined that Dr. Langlois is an audit committee financial expert as defined by SEC rules and regulations and each of the members of our board of directors has the requisite financial sophistication under the applicable rules and regulations of the Nasdaq Stock Market. Dr. Langlois and Dr. Staatz-Granzer are independent as such term is defined in Rule 10A-3 under the Exchange Act and under the listing standards of the Nasdaq Stock Market.

Item 16B. Code of Business Conduct and Ethics.

We have adopted a Code of Business Conduct and Ethics, or the Code of Ethics, that is applicable to all of our employees, executive officers and directors. A copy of the Code of Ethics is available on our website at *www. investors.innate-pharma.com*. The audit committee of our Supervisory board is responsible for overseeing the Code of Ethics and must approve any waivers of the Code of Ethics for employees, executive officers and directors. We expect that any amendments to the Code of Ethics, or any waivers of its requirements, will be disclosed on our website.

Item 16C. Principal Accountant Fees and Services.

Deloitte & Associés, has served as our independent registered public accounting firm for 2018 and 2019. Our accountants billed the following fees to us for professional services in each of those fiscal years, all of which were approved by our audit committee:

	Year ended December 31,			
	2018		2019	
(in thousands of euro)	Deloitte & Associés	Total	Deloitte & Associés	Total
Audit fees	599	**599**	1,190	**1,190**
Non-audit fees	6	**6**	2	**2**
Total	**605**	**605**	**1,192**	**1,192**

"**Audit fees**" are the aggregate fees billed for the audit of our annual financial statements. This category also includes services that Deloittes & Associés provides, such as consents and assistance with and review of documents filed with the SEC.

"**Non-audit fees**" are the aggregate fees billed for services related to the production of certification in the context of the declaration of expenses for the obtention of grants and the preparation of special reports relating to certain operations on the Company's capital.

Audit and Non-Audit Services Pre-Approval Policy

The audit committee has responsibility for appointing, setting compensation of and overseeing the work of the independent registered public accounting firm. In recognition of this responsibility, the audit committee has adopted a policy governing the pre-approval of all audit and permitted non-audit services performed by our independent registered public accounting firm to ensure that the provision of such services does not impair the independent registered public accounting firm's independence from us and our management. Unless a type of service to be provided by our independent registered public accounting firm has received general pre-approval from the audit committee, it requires specific pre-approval by the audit committee. The payment for any proposed services in excess of pre-approved cost levels requires specific pre-approval by the audit committee.

Pursuant to its pre-approval policy, the audit committee may delegate its authority to pre-approve services to the chairperson of the audit committee. The decisions of the chairperson to grant pre-approvals must be presented to the full audit committee at its next scheduled meeting. The audit committee may not delegate its responsibilities to pre-approve services to the management.

The audit committee has considered the non-audit services provided by Deloitte & Associés as described above and believes that they are compatible with maintaining Deloitte & Associés's independence as our independent registered public accounting firm.

Item 16D. Exemptions from the Listing Standards for Audit Committees.

Not applicable.

Item 16E. Purchases of Equity Securities by the Issuer and Affiliated Purchasers.

Not applicable.

Item 16F. Change in Registrant's Certifying Accountant.

Not applicable.

Item 16G. Corporate Governance.

As a French *société anonyme*, we are subject to various corporate governance requirements under French law. We are a "foreign private issuer" under the U.S. federal securities laws and the Nasdaq listing rules. The foreign private issuer exemption will permit us to follow home country corporate governance practices instead of certain Nasdaq listing requirements. A foreign private issuer that elects to follow a home country practice instead of Nasdaq listing requirements must submit to Nasdaq a written statement from an independent counsel in such issuer's home country certifying that the issuer's practices are not prohibited by the home country's laws.

We apply the AFEP/MEDEF code, which recommends that a majority of the members of the Supervisory Board be independent (as such term is defined under the code). Neither the corporate laws of France nor our bylaws requires that (i) our compensation committee include only independent members of the Supervisory Board, (ii) each committee of the Supervisory Board have a formal written charter or (iii) our independent members of the Supervisory Board hold regularly scheduled meetings at which only independent members of the Supervisory Board are present. We intend to follow French corporate governance practices in lieu of Nasdaq listing requirements for each of the foregoing.

These exemptions do not modify the independence requirements for the audit committee, we intend to comply with the requirements of the Sarbanes-Oxley Act and the Nasdaq listing rules, which require that our audit committee be composed of at least three independent members. Rule 10A-3 under the Exchange Act provides that the audit committee must have direct responsibility for the nomination, compensation and choice of our auditors, as well as control over the performance of their duties, management of complaints made, and selection of consultants. Under Rule 10A-3, if the laws of a foreign private issuer's home country require that any such matter be approved by the board of directors or the shareholders of the Company, the audit committee's responsibilities or powers with respect to such matter may instead be advisory. Under French law, the audit committee may only have an advisory role and appointment of our statutory auditors, in particular, must be decided by our shareholders at our annual meeting.

In addition, Nasdaq rules require that a listed company specify that the quorum for any meeting of the holders of share capital be at least 33 1/3% of the outstanding shares of the company's ordinary voting shares. We intend to follow our French home country practice, rather than complying with this Nasdaq rule. Consistent with French Law, our bylaws provide that when first convened, general meetings of shareholders may validly convene only if the shareholders present or represented hold at least (1) 20% of the voting shares in the case of an ordinary general meeting or of an extraordinary general meeting where shareholders are voting on a capital increase by capitalization of reserves, profits or share premium, or (2) 25% of the voting shares in the case of any other extraordinary general meeting. If such quorum required by French law is not met, the meeting is adjourned. There is no quorum requirement under French law when an ordinary general meeting or an extraordinary general meeting is reconvened where shareholders are voting on a capital increase by capitalization of reserves, profits or share premium, but the reconvened meeting may consider only questions that were on the agenda of the adjourned meeting. When any other extraordinary general meeting is reconvened, the required quorum under French law is 20% of the shares entitled to vote. If a quorum is not met at a reconvened meeting requiring a quorum, then the meeting may be adjourned for a maximum of two months.

Item 16H. Mine Safety Disclosure.

Not applicable.

PART III

Item 17. Financial Statements.

See the financial statements beginning on page F-l of this Annual Report.

Item 18. Financial Statements.

Not applicable.

Item 19. Exhibits.

The exhibits listed below are filed as exhibits to this Annual Report.

The following exhibits are filed as part of this Annual Report:

Exhibit Number	Description of Exhibit	Schedule/ Form	File Number	Exhibit	File Date
1.1*	By-laws (*status*) of the registrant (English translation)				
2.1	Form of Deposit Agreement	F-1	333-233865	4.1	10/04/2019
2.2	Form of American Depositary Receipt (included in Exhibit 2.1)	F-1	333-233865	4.2	10/04/2019
4.1†	Co-Development and License Agreement between Innate Pharma S.A. and MedImmune Limited, dated April 24, 2015, as amended to date.	F-1	333-233865	10.1	09/20/2019
4.2†	Lumoxiti License Agreement, between Innate Pharma S.A. and MedImmune Limited, dated October 22, 2018.	F-1	333-233865	10.2	09/20/2019
4.3†	Amendment and Restatement Agreement of the Collaboration and Option Agreement Relating to CD39, between Innate Pharma S.A. and MedImmune Limited, dated April 16, 2019.	F-1	333-233865	10.3	09/20/2019
4.4†	Joint Research, Development, Option and License Agreement between Innate Pharma S.A. and Novo Nordisk A/S, dated March 28, 2006, as amended to date.	F-1	333-233865	10.4	09/20/2019
4.5†	Finance Lease Agreement between Innate Pharma S.A. and Sogebail S.A., dated June 9, 2008 (English translation).	F-1	333-233865	10.5	09/20/2019
4.6†	Amendment to Finance Lease Agreement between Innate Pharma S.A. and Sogebail S.A., dated September 29, 2016 (English translation).	F-1	333-233865	10.6	09/20/2019
8.1	List of subsidiaries of the registrant	F-1	333-233865	21.1	09/20/2019
12.1*	Certificate of Principal Executive Officer pursuant to Securities Exchange Act Rules 13a-14(a) and 15d-14(a) as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002				
12.2*	Certification by the Principal Financial Officer pursuant to Securities Exchange Act Rules 13a-14(a) and 15d-14(a) as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002				
13.1**	Certification by the Principal Executive Officer and the Principal Financial Officer pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002				
101.INS*	XBRL Instance Document				
101.SCH*	XBRL Taxonomy Extension Schema Document				
101.CAL*	XBRL Taxonomy Extension Calculation Linkbase Document				
101.DEF*	XBRL Taxonomy Extension Definition Linkbase Document				
101.LAB*	XBRL Taxonomy Extension Label Linkbase Document				
101.PRE*	XBRL Taxonomy Extension Presentation Linkbase Document				

* Filed herewith.
** Furnished herewith.
† Certain portions of this exhibit have been omitted because they are not material and would likely cause competitive harm to the registrant if disclosed

SIGNATURES

The registrant hereby certifies that it meets all of the requirements for filing on Form 20-F and that it has duly caused and authorized the undersigned to sign this annual report on its behalf.

Innate Pharma S.A.

By: /s/ Mondher Mahjoubi, M.D.

Name: Mondher Mahjoubi, M.D.

Title: Chief Executive Officer

Date: April 24, 2020

INDEX TO CONSOLIDATED FINANCIAL STATEMENTS

Consolidated Financial Statements as of and for the Years Ended December 31, 2017, 2018 and 2019

Report of Independent Registered Public Accounting Firm	F-2
Consolidated Statements of Financial Position as of December 31, 2017, 2018 and 2019	F-3
Consolidated Statements of Income (Loss) for the Years Ended December 31, 2017, 2018 and 2019	F-4
Consolidated Statements of Comprehensive Income (Loss) for the Years Ended December 31, 2017, 2018 and 2019	F-5
Consolidated Statements of Cash Flows for the Years Ended December 31, 2017, 2018 and 2019	F-6
Consolidated Statements of Changes in Shareholders' Equity for the Years Ended December 31, 2017, 2018 and 2019	F-8
Notes to the Consolidated Financial Statements	F-9

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the shareholders and the Board of Directors of Innate Pharma

Opinion on the Financial Statements

We have audited the accompanying consolidated statements of financial position of Innate Pharma S.A. and subsidiaries (the "Company") as of December 31, 2019, 2018 and 2017, the related consolidated statements of income (loss), comprehensive income (loss), cash flows and changes in shareholders' equity, for each of the three years in the period ended December 31, 2019, and the related notes (collectively referred to as the "financial statements"). In our opinion, the financial statements present fairly, in all material respects, the financial position of the Company as of December 31, 2019, 2018 and 2017, and the results of its operations and its cash flows for each of the three years in the period ended December 31, 2019, in conformity with International Financial Reporting Standards as issued by the International Accounting Standards Board (IASB).

Basis for Opinion

These financial statements are the responsibility of the Company's management. Our responsibility is to express an opinion on the Company's financial statements based on our audits. We are a public accounting firm registered with the Public Company Accounting Oversight Board (United States) (PCAOB) and are required to be independent with respect to the Company in accordance with the U.S. federal securities laws and the applicable rules and regulations of the Securities and Exchange Commission and the PCAOB.

We conducted our audits in accordance with the standards of the PCAOB. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement, whether due to error or fraud. The Company is not required to have, nor were we engaged to perform, an audit of its internal control over financial reporting. As part of our audits, we are required to obtain an understanding of internal control over financial reporting but not for the purpose of expressing an opinion on the effectiveness of the Company’s internal control over financial reporting. Accordingly, we express no such opinion.

Our audits included performing procedures to assess the risks of material misstatement of the financial statements, whether due to error or fraud, and performing procedures that respond to those risks. Such procedures included examining, on a test basis, evidence regarding the amounts and disclosures in the financial statements. Our audits also included evaluating the accounting principles used and significant estimates made by management, as well as evaluating the overall presentation of the financial statements. We believe that our audits provide a reasonable basis for our opinion.

/s/ Deloitte & Associés

Marseille, France
April 24, 2020

We have served as the Company's auditor since 2014.

CONSOLIDATED STATEMENTS OF FINANCIAL POSITION
(amounts in thousands of euro)

		Year Ended December 31,		
	Note	2017	2018[1]	2019[2]
ASSETS				
Non-current assets				
Intangible assets	6	46,192	84,529	96,968
Property and equipment	7	10,729	10,216	11,672
Non-current financial assets	4	60,469	35,181	37,005
Other non-current assets		111	86	89
Trade receivables and other - non-current	5	-	-	16,737
Deferred tax assets	17	-	1,561	1,286
Total non-current assets		**117,501**	**131,574**	**163,756**
Current assets				
Cash and cash equivalents	4	99,367	152,314	202,887
Short-term investments	4	16,743	15,217	15,978
Trade receivables and other - current	5	21,412	152,112	18,740
Total current assets		**137,521**	**319,643**	**237,605**
TOTAL ASSETS		**255,023**	**451,216**	**401,361**
LIABILITIES AND SHAREHOLDERS' EQUITY				
Shareholders' equity				
Share capital	11	2,880	3,197	3,941
Share premium	11	234,874	299,932	369,617
Retained earnings		(103,595)	(137,840)	(134,912)
Other reserves		180	(1,099)	(472)
Net income (loss)		(48,385)	3,049	(20,759)
Total shareholders' equity		**85,956**	**167,240**	**217,416**
Non-current liabilities				
Collaboration liabilities – non-current portion	13	-	10,669	-
Financial liabilities – non-current portion	9	4,521	3,175	16,593
Defined benefit obligations	10	2,621	3,697	3,760
Deferred revenue – non-current portion	13	87,005	68,098	40,342
Provisions – non-current portion	18	1,012	38	142
Deferred tax liabilities	17	-	1,561	1,286
Total non-current liabilities		**95,158**	**87,238**	**62,123**
Current liabilities				
Trade payables and others	8	24,657	91,655	49,504
Collaboration liabilities – current portion	13	-	20,987	21,304
Financial liabilities – current portion	9	1,343	1,347	2,130
Deferred revenue – current portion	13	47,909	82,096	48,770
Provisions – current portion	18	-	652	114
Total current liabilities		**73,909**	**196,737**	**121,822**
TOTAL LIABILITIES AND SHAREHOLDERS' EQUITY		**255,023**	**451,216**	**401,361**

(1) The consolidated financial statements as of and for the year ended December 31, 2018 include the impacts of the first application of IFRS 9 and IFRS 15 standards that became applicable on January 1, 2018. The comparative consolidated financial information as of and for the year ended December 31, 2017 has not been restated. See Note 2.d and 2.e for more details on transition measures.

(2) The consolidated financial statements as of and for the year ended December 31, 2019 reflect the impacts of the adoption of IFRS 16 that became applicable on January 1, 2019. The Company applied the modified retrospective transition method. As a consequence, the comparative consolidated financial information as of and for the years ended December 31, 2017 and 2018 have not been restated. See Note 2.f for more details on the impact of the transition.

CONSOLIDATED STATEMENTS OF INCOME (LOSS)

(amounts in thousands of euro, except share and per share data)

		Year ended December 31,		
	Note	2017	2018[1]	2019[2]
Revenue and other income				
Revenue from collaboration and licensing agreements	13	32,631	79,892	68,974
Government financing for research expenditures	13	11,402	14,060	16,840
Total revenue and other income		**44,033**	**93,952**	**85,814**
Operating expenses				
Research and development expenses	14	(67,000)	(69,555)	(78,844)
Selling, general and administrative expenses	14	(17,015)	(18,142)	(25,803)
Total operating expenses		**(84,015)**	**(87,697)**	**(104,647)**
Net income (loss) from distribution agreements	15	-	(1,109)	(8,219)
Operating income (loss)		**(39,983)**	**5,146**	**(27,052)**
Financial income	16	2,501	6,002	11,269
Financial expenses	16	(10,535)	(8,429)	(4,976)
Net financial income (loss)		**(8,034)**	**(2,427)**	**6,293**
Net income (loss) before tax		**(48,016)**	**2,718**	**(20,759)**
Income tax expense	17	(368)	333	-
Net income (loss)		**(48,385)**	**3,049**	**(20,759)**
Basic income (loss) per share (€/share)	20	**(0.89)**	**0.05**	**(0.31)**
Diluted income (loss) per share (€/share)	20	**(0.89)**	**0.05**	**(0.31)**

(1) The consolidated financial statements as of and for the year ended December 31, 2018 include the impacts of the first application of IFRS 9 and IFRS 15 standards that became applicable on January 1, 2018. The comparative consolidated financial information as of and for the year ended December 31, 2017 have not been restated. See Note 2.d and 2.e for more details on transition measures.

(2) The consolidated financial statements as of and for the year ended December 31, 2019 reflect the impacts of the adoption of IFRS 16 that became applicable on January 1, 2019. The Company applied the modified retrospective transition method. As a consequence, the comparative consolidated financial information as of and for the years ended December 31, 2017 and 2018 have not been restated. See Note 2.f for more details on the impact of the transition.

CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME (LOSS)

(amounts in thousands of euro)

(In thousands of euro)		Year Ended December 31,		
	Note	2017	2018[1]	2019[2]
Net income (loss) for the period		**(48,385)**	**3,049**	**(20,759)**
Elements which will be reclassified in the consolidated statement of income (loss):				
Change in fair value of short-term investments and non-current financial assets	4	437		
Foreign currency translation gain (loss)		68	(26)	5
Items which will not be reclassified in the consolidated statement of income (loss):				
Actuarial gains and (losses) related to defined benefit obligations	10	178	(599)	622
Other comprehensive income (loss)		**683**	**(625)**	**627**
Total comprehensive income (loss)		**(47,702)**	**2,424**	**(20,132)**

(1) The consolidated financial statements as of and for the year ended December 31, 2018 include the impacts of the first application of IFRS 9 and IFRS 15 standards that became applicable on January 1, 2018. The comparative consolidated financial information as of and for the year ended December 31, 2017 have not been restated. See Note 2.d and 2.e for more details on transition measures.

(2) The consolidated financial statements as of and for the year ended December 31, 2019 reflect the impacts of the adoption of IFRS 16 that became applicable on January 1, 2019. The Company applied the modified retrospective transition method. As a consequence, the comparative consolidated financial information as of and for the years ended December 31, 2017 and 2018 have not been restated. See Note 2.f for more details on the impact of the transition.

CONSOLIDATED STATEMENT OF CASH FLOWS

(amounts in thousands of euro)

		Year Ended December 31,		
	Note	2017	2018[1]	2019[2]
Net income (loss)		**(48,385)**	**3,049**	**(20,759)**
Reconciliation of the net income (loss) and the cash generated from (used for) the operating activities				
Depreciation and amortization	6, 7	4,393	7,401	16,529
Employee benefits costs	10	381	477	685
Provisions for charges		877	(322)	(484)
Share-based compensation expense	14	9,829	2,707	3,826
Change in fair value of financial assets	4	(26)	3,786	(4,065)
Foreign exchange (gains) losses on financial assets	4	3,381	(1,341)	(280)
Change in accrued interests on financial assets	4	(204)	152	(237)
Interest received on financial assets		(1,442)	(1,445)	(1,290)
Interest paid	16	113	102	204
Other profit or loss items with no cash effect		-	-	550
Operating cash flow before change in working capital		**(31,080)**	**14,566**	**(5,321)**
Change in working capital		(16,980)	(47,096)	40,245
Net cash generated from / (used in) operating activities		**(48,060)**	**(32,529)**	**34,924**
Acquisition of intangible assets	6,8	(3,062)	(556)	(64,130)
Acquisition of property and equipment, net	7,8	(2,964)	(873)	(1,271)
Purchase of current financial instruments	4	(2,543)	-	-
Purchase of non-current financial instruments	4	(40,728)	-	-
Disposal of property and equipment		50	22	-
Disposal of other assets		-	25	(10)
Disposal of current financial instruments	4	5,646	2,704	-
Disposal of non-current financial instruments	4	11,895	21,513	2,000
Interest received on financial assets		1,442	1,445	1,290
Net cash generated from / (used in) investing activities		**(29,460)**	**24,279**	**(62,121)**
Proceeds from the exercise / subscription of equity instruments		491	111	44
Increase in capital, net			62,557	66,006
Proceeds from borrowings	9	1,739	-	13,900
Repayment of borrowings	9	(1,202)	(1,343)	(1,982)
Net interest paid		(113)	(102)	(204)
Net cash generated from financing activities		**915**	**61,222**	**77,765**
Effect of the exchange rate changes		66	(26)	5
Net increase / (decrease) in cash and cash equivalents		**(76,539)**	**52,947**	**50,572**
Cash and cash equivalents at the beginning of the year	4	175,906	99,367	152,314
Cash and cash equivalents at the end of the year	4	**99,367**	**152,314**	**202,887**

(1) The consolidated financial statements as of and for the year ended December 31, 2018 include the impacts of the first application of IFRS 9 and IFRS 15 standards that became applicable on January 1, 2018. The comparative consolidated financial information as of and for the year ended December 31, 2017 have not been restated. See Note 2.d and 2.e for more details on transition measures.

(2) The consolidated financial statements as of and for the year ended December 31, 2019 reflect the impacts of the adoption of IFRS 16 that became applicable on January 1, 2019. The Company applied the modified retrospective transition method. As a consequence,; the comparative consolidated financial information as of and for the years ended December 31, 2017 and 2018 have not been restated. See Note 2.f for more details on the impact of the transition.

Change in working capital	Note	December 31, 2018	December 31, 2019	Variance
Trade receivables and others (excluding rebates related to capital expenditures)	5	139,012	28,716	110,296
Trade payables and others (excluding payables related to capital expenditures)	8	(34,662)	(36,047)	1,385
Collaboration liabilities - current and non-current portion	13	(31,656)	(21,304)	(10,352)
Deferred revenue - current and non-current portion	13	(150,195)	(89,112)	(61,083)
Change in working capital		**(77,501)**	**(117,747)**	**40,246**

Change in working capital	Note	December 31, 2017	December 31, 2018	Variance	IFRS 15 restatements (1)	Variance excluding IFRS 15
Trade receivables and others (excluding rebates related to capital expenditures)	5	21,412	139,012	(117,6)	-	(117,600)
Trade payables and others (excluding payables related to capital expenditures)	8	(24,583)	(34,662)	10,079	5,156	15,235
Collaboration liabilities - current and non-current portion	13	-	(31,656)	31,656	(44,751)	(13,095)
Deferred revenue - current and non-current portion	13	(134,914)	(150,195)	15,281	53,083	68,364
Change in working capital		**(138,085)**	**(77,501)**	**(60,584)**	**13,488**	**(47,096)**

CONSOLIDATED STATEMENT OF CHANGES IN SHAREHOLDERS' EQUITY

(amounts in thousands of euro, except share data)

	Note	Number of shares	Share capital	Share premium	Retained earnings	Other reserves	Net income (loss)	Total Equity
January 1, 2017		**53,921,304**	**2,696**	**187,571**	**(116,235)**	**(503)**	**12,640**	**86,169**
Net loss		-	-	-	-	-	(48,385)	(48,385)
Change in fair value of short-term investments and non-current financials assets	4	-	-	-	-	437	-	437
Actuarial gains on defined benefit obligations	10	-	-	-	-	178	-	178
Foreign currency translation gain		-	-	-	-	68	-	68
Total comprehensive loss		**-**	**-**	**-**	**-**	**683**	**(48,385)**	**(47,702)**
Allocation of prior period income		-	-	-	12,640	-	(12,640)	-
Exercise and subscription of equity instruments	11	341,979	17	474	-	-	-	491
Shares issued for the acquisition of C5aR intangible asset	11,1,1	3,343,748	167	36,999	-	-	-	37,166
Share-based payment	11,14	-	-	9,829	-	-	-	9,829
December 31, 2017		**57,607,031**	**2,880**	**234,874**	**(103,593)**	**180**	**(48,385)**	**85,956**
Impact related to the first application of IFRS 9		-	-	-	653	(653)	-	-
Impact related to the first application of IFRS 15		-	-	-	13,488	-	-	13,488
January 1, 2018 (after impact related to the first application of IFRS 9 and IFRS 15) [(1)]		**57,607,031**	**2,880**	**234,874**	**(89,454)**	**(473)**	**(48,385)**	**99,444**
Net income		-	-	-		-	3,049	3,049
Actuarial losses on defined benefit obligations		-	-	-	-	(599)	-	(599)
Foreign currency translation loss		-	-	-	-	(26)	-	(26)
Total comprehensive income		**-**	**-**	**-**	**-**	**(625)**	**3,049**	**2,424**
Allocation of prior period loss		-	-	-	(48,385)	-	48,385	-
Exercise and subscription of equity instruments		72,055	4	107	-	-	-	111
Increase in capital, net		6,260,500	313	62,244	-	-	-	62,557
Share-based payment	11,14	-	-	2,707	-	-	-	2,707
December 31, 2018		**63,939,586**	**3,197**	**299,932**	**(137,840)**	**(1,099)**	**3,049**	**167,240**
Impact related to the first application of IFRS 16		-	-		(121)	-	-	(121)
January 1, 2019 (after impact related to the first application of IFRS 16) [(2)]		**63,939,586**	**3,197**	**299,932**	**(137,961)**	**(1,099)**	**3,049**	**167,119**
Net loss		-	-	-	-	-	(20,759)	(20,759)
Actuarial losses on defined benefit obligations		-	-	-	-	622	-	622
Foreign currency translation gain		-	-	-	-	5	-	5
Total comprehensive loss		**-**	**-**	**-**	**-**	**627**	**(20,759)**	**(20,132)**
Allocation of prior period income		-	-	-	3,049	-	(3,049)	-
Exercise and subscription of equity instruments	11	511,035	26	20	-	-	-	46
Increase capital, net	11	14,375,000	719	65,839	-	-	-	66,558
Share-based payment	11,14	-	-	3,826	-	-	-	3,826
December 31, 2019		**78,825,621**	**3,941**	**369,617**	**(134,912)**	**(472)**	**(20,759)**	**217,416**

(1) The consolidated financial statements as of and for the year ended December 31, 2018 include the impacts of the first application of IFRS 9 and IFRS 15 standards that became applicable on January 1, 2018. The comparative consolidated financial information as of and for the year ended December 31, 2017 have not been restated. See Note 2.d et 2.e for more details on transition measures.

(2) The consolidated financial statements as of and for the year ended December 31, 2019 reflect the impacts of the adoption of IFRS 16 that became applicable on January 1, 2019. The Company applied the modified retrospective transition method. As a consequence, the comparative consolidated financial information as of and for the years ended December 31, 2017 and 2018 have not been restated. See Note 2.f for more details on the impact of the transition.

NOTES TO FINANCIAL STATEMENTS

Note 1: The company

Innate Pharma S.A. (the "Company" and together with its subsidiaries, referred to as the "Group") is a biotechnology company focused on discovering, developing and commercializing first-in-class therapeutic antibodies designed to harness the immune system for the treatment of oncology indications with significant unmet medical need.

The Company has extensive experience in research and development in immuno-oncology, having been pioneers in the understanding of natural killer cell, or NK cell, biology, and later expanding its expertise in the tumor microenvironment, tumor antigens and antibody engineering fields. The Company has built, internally and through its business development strategy, a broad and diversified portfolio including an approved product, three clinical product candidates and a robust preclinical pipeline. The Company has entered into collaborations with leaders in the biopharmaceutical industry, such as AstraZeneca and Sanofi.

From its inception, the Company has incurred losses due to its research and development ("R&D") activity. The financial year ended December 31, 2019 generated a €20,759 thousand net loss. As of December 31, 2019, the shareholders' equity amounted to €217,416 thousand. Subject to potential new milestone payments related to its collaboration agreements, the Company anticipates incurring additional losses until such time, if ever, that it can generate significant revenue from its product candidates in development.

The Company's future operations are highly dependent on a combination of factors, including: (i) the success of its R&D; (ii) regulatory approval and market acceptance of the Company's future product candidates; (iii) the timely and successful completion of additional financing; and (iv) the development of competitive therapies by other biotechnology and pharmaceutical companies. As a result, the Company is and should continue, in the short to mid-term, to be financed through partnership agreements for the development and commercialization of its drug candidates and through the issuance of new equity instruments.

The Company's activity is not subject to seasonal fluctuations.

As of December 31, 2019, the Company had two wholly owned subsidiaries: Innate Pharma, Inc., incorporated under the laws of Delaware in 2009, and Innate Pharma France SAS, incorporated under the laws of France in 2018.

Innate Inc.'s vocation is to market Innate Pharma's products in the United States, in particular Lumoxiti.

Innate Pharma France SAS aims in particular to:

(i) exploit any commercial license granted by a third-party;

(ii) to carry out, on its behalf or on behalf of third parties, all research, development, studies, development of production and marketing processes for products of pharmaceutical interest and more generally relevant the health sector;

(iii) the registration or granting of any patent or license relating directly or indirectly to its activity;

(iv) manufacture, import and distribute drugs intended for human experimentation;

(v) manufacture, use and import medicines and other products whose sale is reserved for pharmacists.

These two subsidiaries are fully consolidated.

1. 1. Significant contracts

The following paragraphs describe the key provisions of significant contracts.

a) Agreements related to monalizumab with Novo Nordisk A/S and with AstraZeneca

2014 Novo Nordisk A/S monalizumab agreement

On February 5, 2014, the Company acquired from Novo Nordisk A/S full development and commercialization rights to monalizumab. Novo Nordisk A/S received €2.0 million in cash and 600,000 ordinary shares at a price of €8.33 per share (€5.0 million). Novo Nordisk A/S is eligible to receive up to €20.0 million in potential regulatory milestones and single-digit tiered royalties on sales of monalizumab products. The agreement with Novo Nordisk A/S included a right to additional consideration in the event of an out-licensing agreement. Consequently, following the agreement signed with AstraZeneca in April 2015 (as described below), the Company paid to Novo Nordisk A/S additional consideration of €6.5 million (paid in April 2016). Following the exercise of the option by AstraZeneca in October 2018 (as described below), Novo Nordisk A/S became entitled to a second and final additional payment amounting to $15.0 million (€13.1 million) which was recognized as a liability as of December 31, 2018 and was paid in February 2019. There are no other potential additional milestones payments due to Novo Nordisk A/S. These amounts were added to the net book value of the intangible asset and are amortized according to the same amortization plan as the initial €7.0 million recognized in 2014. The net book value of the license amounted to €7.9 million as of December 31, 2019.

Refer to Notes 2.k, 2.l and 6 for accounting description.

2015 AstraZeneca monalizumab agreements

Under co-development and option agreements signed with AstraZeneca in 2015, the Company granted to AstraZeneca an exclusive license, subject to certain exclusions, to certain of its patents and know-how to develop, manufacture and commercialize licensed products, including monalizumab, in the field of diagnosis, prevention and treatment of oncology diseases and conditions. The Company further granted to AstraZeneca a worldwide, non-exclusive license to certain of its other patents to develop, manufacture and commercialize licensed products, including monalizumab, in the field of diagnosis, prevention and treatment of oncology diseases and conditions.

The Company received an initial payment of $250 million under these agreements in June 2015, of which $100 million was paid to the Company as an initial payment for the co-development agreement and $150 million was paid to the Company as consideration for the option agreement. On October 22, 2018, AstraZeneca exercised this option, triggering the payment of $100.0 million, which was received by the Company in January 2019.

Following the option exercise, AstraZeneca became the lead party in developing the licensed products and must use commercially reasonable efforts to develop, obtain regulatory approval for and commercialize each licensed product in certain major markets.

In addition to the initial payment and option exercise payment, AstraZeneca is obligated to pay the Company up to $925 million in the aggregate upon the achievement of certain development and regulatory milestones ($500 million) and commercialization milestones ($425 million). The Company is eligible to receive tiered royalties ranging from a low double-digit to mid-teen percentage on net sales of licensed products outside of Europe. The Company is required for a defined period of time to co-fund 30% of the Phase III clinical trials of licensed products, subject to an aggregate cap, in order to receive 50% of the profits in Europe.

In July 31, 2019, the Company notified AstraZeneca of its decision to co-fund a future monalizumab Phase III clinical development program.

If the Company had chosen not to exercise its option of co-promoting licensed products in certain European countries, it would have forfeited the option to co-promote licensed products under the agreement, and its right to share in 50% of such profits would terminate and sales in Europe would have been instead be factored into net sales used to calculate royalty and milestone payments to it. Additionally, Phase III and regulatory milestone payments that may be payable to the Company would have been reduced and AstraZeneca would have been responsible for the promotion of licensed products worldwide, subject to the Company's option to co-promote the licensed products in certain European countries. In addition, its share of profits in Europe would have been reduced by a specified amount of percentage points not to exceed the mid-single digits

Refer to Notes 2.a, 2.s and 13.a for accounting description.

b) Agreement related to Lumoxiti with AstraZeneca

In October 2018, the Company obtained an exclusive license from AstraZeneca under certain patents and know-how to develop, manufacture and commercialize Lumoxiti for all uses in humans and animals in the United States, the European Union and Switzerland. Under this Agreement, AstraZeneca is obligated to provide support for the continued development and commercialization of Lumoxiti in the European Union and Switzerland prior to regulatory submission and approval as well as support for the continued commercialization of Lumoxiti in the United States for a specified period. The Company initiated in 2019 to transition to full commercialization responsibilities, which is expected to be completed by the end of 2020. Under the agreement, the Company was obligated to pay a $50.0 million initial payment (€43.8 million), which it paid in January 2019, and a $15.0 million regulatory milestone (€13.4 million), which was paid in January 2020. The Company has reimbursed and will reimburse AstraZeneca for the development, production and commercialization costs it incurs during the transition period.

Refer to Notes 2.t and 15 for accounting description.

c) Agreement related to IPH5201 with AstraZeneca

In October 2018, the Company signed a collaboration and option agreement with AstraZeneca for co-development and co-commercialization of IPH5201. Under the agreement, AstraZeneca paid the Company a $50.0 million upfront payment ($26.0 million paid in October 2018 and $24.0 million paid in January 2019), and is obligated to pay the Company up to an aggregate of $10.0 million upon the achievement of certain development milestones. Upon exercise of its option under the agreement, AstraZeneca is committed to pay an option exercise fee of $25.0 million and up to $800.0 million in the aggregate upon the achievement of certain development and regulatory milestones ($300 million) and commercialization milestones ($500 million). The arrangement also provides for a 50% profit share in Europe if the Company opts into certain co-promoting and late stage co-funding obligations. In addition, we would be eligible to receive tiered royalties ranging from a high-single digit to mid-teen percentage on net sales of IPH5201, or from a mid-single digit to low-double digit percentage on net sales of other types of licensed products, outside of Europe. The royalties payable to us under the agreement may be reduced under certain circumstances, including loss of exclusivity or lack of patent protection. The Company recognized €18.8 million as revenue from proceeds related to this agreement for the year ended December 31, 2019, and was also reimbursed by AstraZeneca for certain research and development expenses related to IPH5201. The Company has the option to co-fund 30% of the shared development expenses related to the Phase III clinical trials in order to acquire co-promotion rights and to share in 50% of the profits and losses of licensed products in Europe. If the Company does not opt into the co-funding obligations, among other things, its right to share in 50% of the profits and losses in Europe and right to co-promote in certain European countries will terminate and will be replaced by rights to receive royalties on net sales at the rates applicable to outside of Europe. Additionally, certain milestone payments that may be payable to the Company would be materially reduced.

Refer to Notes 2.s and 13.b for accounting description.

d) Agreement related to additional preclinical molecules with AstraZeneca

In October 2018, the Company granted to AstraZeneca four exclusive options that are exercisable until IND approval to obtain a worldwide, royalty-bearing, exclusive license to certain of the Company's patents and know-how relating to certain specified pipeline candidates to develop and commercialize optioned products in all fields of use. Pursuant to the agreement, AstraZeneca paid the Company a $20.0 million upfront payment (€17.5 million) in October 2018. The Company recognizes this upfront payment in the consolidated statement of financial position as deferred revenue as of December 31, 2018, until the exercise or the termination of each option at the earliest. Upon exercise of an option, the Company would be entitled to an option exercise payment of $35 million, as well as development and regulatory milestone payments ($320 million) and commercialization milestone payments ($500 million) and tiered, mid-single digit to mid-teen percentage royalties on net sales of the applicable product. The royalties payable to the Company may be reduced under certain circumstances, including loss of exclusivity, lack of patent protection or the specific nature of the compound included within the applicable product. Additionally, the Company would have rights to co-fund certain development costs in order to obtain profit and loss sharing in Europe. So long as the Company elects to co-fund such development costs, it will have a right to co-promote optioned products in Europe.

Refer to Notes 2.s and 13.c for accounting description.

e) Agreements related to avdoralimab with Novo Nordisk and with AstraZeneca

2017 avdoralimab in-licensing agreement with Novo Nordisk A/S

In July 2017, the Company signed an exclusive license agreement with Novo Nordisk A/S relating to avdoralimab. Under the agreement, Novo Nordisk A/S granted the Company a worldwide, exclusive license to develop, manufacture and commercialize pharmaceutical products that contain or comprise an anti-C5aR antibody, including avdoralimab. The Company made an upfront payment of €40.0 million, €37.2 million of which was contributed in new shares and €2.8 million of which in cash. The Company is obligated to pay up to an aggregate of €370.0 million upon the achievement of development, regulatory and sales milestones and tiered royalties ranging from a low double-digit to low-teen percentage of net sales.

Refer to Notes 2.g, 2.i and 6 for accounting description.

2018 avdoralimab AstraZeneca agreement

On January 1, 2018, the Company entered into a clinical trial collaboration agreement with AstraZeneca to sponsor a Phase I/II clinical trial (STELLAR-001) to evaluate the safety and efficacy of durvalumab, an anti-PD-L1 immune checkpoint inhibitor, in combination with avdoralimab, as a treatment for patients with select solid tumors. The Company is the sponsor of the trial and the costs are equally shared between the two partners. This collaboration is a non-exclusive agreement and does not include any licensing rights on avdoralimab to AstraZeneca.

Refer to Notes 2.s and 13.d for accounting description.

1.2 Key events

a) Key events for the year ended December 31, 2019

In January 2019, the Company has received $100 million (€87.7 million) from AstraZeneca in relation to monalizumab agreement and $24 million (€21.1 million) from AstraZeneca in relation to IPH5201 agreement. Both payments were recorded as trade receivables as of December 31, 2018.

In January 2019 and February 2019, the Company has paid $50 million (€43.8 million) to AstraZeneca in relation to Lumoxiti agreement and $15million (€13.1million) to Novo Nordisk A/S in relation to monalizumab rights, respectively. Both amounts were recorded as trade payables - payables related to capital expenditures as of December 31, 2018.

On June 3, 2019, the Company signed an agreement with Orega Biotech amending the license agreement signed on January 4, 2016. Pursuant to this agreement, the Company was required to pay Orega Biotech an amount of €7million as consideration following the collaboration and option agreement signed on October 22, 2018 with AstraZeneca regarding IPH5201(anti-CD39). The payment was made in June 2019 and has been accounted for as an increase of the Company's intangible asset related to IPH5201. The agreement also includes potential additional payments in the aggregate of €51.5million by the Company to Orega Biotech in connection with the completion of development and regulatory milestones, as well mid-single digit to low-teen percentage payments, depending on determinations relating to Orega Biotech's intellectual property rights for certain patents, on sublicensing revenues the Company receives pursuant to its agreement with AstraZeneca relating to IPH5201.

On July 31, 2019, the Company notified AstraZeneca of its decision to co-fund a future monalizumab Phase III clinical development program.

On September 26, 2019, the Company announced that AstraZeneca will advance monalizumab into a Phase III randomized clinical trial evaluating monalizumab in combination with cetuximab in patients suffering from recurrent or metastatic squamous cell carcinoma of the head and neck (SCCHN), and both partners will co-fund the trial. The trial initiation is expected in 2020, subject to regulatory and compliance approvals, and will generate to the Company a $100 million milestone payment at dosing of the first patient.

On August 30, 2019, the Company drew down the remaining portion of the €15.2 million loan granted in July 2017 by Société Générale, for an amount of €13.9 million. The repayment schedule started on August 30, 2019.

In October 2019, Innate Pharma successfully completed its global offering, including its initial public offering on the Nasdaq Global Select Market raising approximately $79.1 million (€71.4 million)) in gross proceeds (€66.0 million net proceeds) from the sale of American Depositary Shares (ADS) in the United States and a European Private Placement of ordinary shares. The global offering resulted in the issuance of 14,375,000 new ordinary shares, comprising 9,922,227 ADSs, at an offering price of $5.50 per ADS, and 4,452,773 ordinary shares in a concurrent European private placement (including France) at an offering price of €4.97 per ordinary share. Each ADS represents one ordinary share.

On November 22, 2019, AstraZeneca submitted to the European Medicines Agency (EMA) the Marketing Authorization Application (MAA) relating to the commercialization of Lumoxiti in Europe. According to the agreement related to Lumoxiti with AstraZeneca. According to the related agreement, AstraZeneca is entitled to a $15.0 million milestone that was paid by the Company in January 2020.

2) Accounting policies and statement of compliance

a) Basis of preparation

Consolidated financial statements of the Company for the years ended December 31, 2017, 2018 and 2019 (the "Consolidated Financial Statements") have been prepared under the responsibility of the management of the Company in accordance with the underlying assumptions of going concern as the Company's loss-making situation is explained by the innovative nature of the products developed, therefore involving a multi-year research and development phase.

The general accounting conventions were applied in compliance with the principle of prudence, in accordance with the underlying assumptions namely (i) going concern, (ii) permanence of accounting methods from one year to the next and (iii) independence of financial years, and in conformity with the general rules for the preparation and presentation of consolidated financial statements in accordance with IFRS, as defined below.

Except for share data and per share amounts, the Consolidated Financial Statements are presented in thousands of euro. Amounts are rounded up or down to the nearest whole number for the calculation of certain financial data and other information contained in these accounts. Accordingly, the total amounts presented in certain tables may not be the exact sum of the preceding figures

b) Statement of compliance

The Consolidated Financial Statements have been prepared in accordance with International Financial Reporting Standards ("**IFRS**") as issued by the International Accounting Standard Board ("**IASB**") and were approved and authorized for issuance by the Board of Directors of the Company on March 9, 2020.

Due to the listing of ordinary shares of the Company on Euronext Paris and in accordance with the European Union's regulation No. 1606/2002 of July 19, 2002, the Consolidated Financial Statements of the Company for the years ended December 31, 2017, 2018 and 2019 are also prepared in accordance with IFRS, as adopted by the European Union (EU). For the years ended December 31, 2017, 2018 and 2019, all IFRS that the IASB had published and that are mandatory are the same as those endorsed by the EU and mandatory in the EU. As a result, the Consolidated Financial Statements comply with International Financial Reporting Standards as published by the IASB and as adopted by the EU.

IFRS include International Financial Reporting Standards (IFRS), International Accounting Standards ("**IAS**"), as well as the interpretations issued by the Standing Interpretations Committee ("**SIC**"), and the International Financial Reporting Interpretations Committee ("**IFRIC**"). The main accounting methods used to prepare the Consolidated Financial Statements are described below. These methods were used for all periods presented.

c) Recently issued accounting standards and interpretations

Application of the following new and amended standards was mandatory for the first time for the financial period beginning on January 1, 2018 and, as such, they have been adopted by the Company:

- IFRS 9, which supersedes IAS 39; and
- IFRS 15, which supersedes IAS 11, IAS 18 and the corresponding interpretations (IFRIC 13, IFRIC 15, IFRIC 18 and SIC 31).

Application of the following new and amended standards is mandatory for the first time for the financial period beginning on January 1, 2019 and, as such, they have been adopted by the Company:

- IFRS 16 “Leases”, which supersedes IAS 17 and the corresponding interpretations (IFRIC 4, SIC 15 and SIC 27).
- Amendments to IAS 19 “Employee benefits—Plan Amendment, Curtailment or Settlement”, mandatory for annual periods beginning on or after January 1, 2019.
- Amendments to IAS 28 regarding “Long-term interests in associates and Joint-Ventures”.
- Amendments to IFRS 9 “Financial instruments—Prepayment features with negative compensation”.
- IFRIC 23 “Uncertainty over income tax treatments”.
- Annual improvements of the cycle 2015-2017 (amendments to IAS 12, IAS 23, IFRS 3 and IFRS 11).

Those standards and interpretations have no impact on the Consolidated Financial statements, except as noted below following IFRS 9, IFRS 15 and IFRS 16 application.

New standards, amendments to existing standards and subsequent interpretations have been published but are not applicable in 2019.

- IFRS 17 "Insurance Contracts", published on May 18, 2017 and which will come into force on January 1, 2021.
- Amendment to IFRS 3 "Definition of a business", published on October 22, 2018 and applicable from January 1, 2020.
- Amendments to IAS 1 and IAS 8 relating to the modification of the definition of the term “significant”, published on October 31, 2018 and applicable on January 1, 2020.
- Modification of references to the Conceptual Framework in IFRS standards, applicable from January 1, 2020.

The Company has not early adopted these new accounting standards, amendments and interpretations. These new accounting standards, amendments and interpretations will not have significant impact on our financial statements.

d) Adoption of IFRS 15

IFRS 15 *Revenue from contracts with customers*, or IFRS 15, which supersedes IAS 11 *Construction contracts*, or IAS 11, and IAS 18 *Revenue*, or IAS 18, came into effect on January 1, 2018. The amended accounting policy applied to revenue is presented in Note 2.ss.

The Company decided to apply the modified retrospective approach without any of the practical expedients allowed by IFRS 15. According to this approach, the comparative information is not restated and the cumulative impact of the first application is presented as an adjustment of the opening equity of the year of first application. The modified retrospective approach does not present comparative information, but requires a comparison for the first application year of each financial statement line item affected by the application of this standard as compared to IAS 11, IAS 18 and related interpretations that were in effect before the change. This comparison is presented below.

The impact of the adoption of IFRS 15 is limited to the accounting treatment of the contributions paid by the Company pursuant to its co-financing under the collaboration agreement with AstraZeneca related to monalizumab. Until December 31, 2017, under IAS 18, the Company's co-financing share of R&D expenses incurred by AstraZeneca were recognized as R&D expenses.

In the context of the collaboration agreement with AstraZeneca, the Company and AstraZeneca make quarterly-cost sharing payments to one another to ensure that each party co-finances the R&D performed by AstraZeneca. Consequently, under IFRS 15, amounts due to the partner:

- Are no longer recognized as R&D expenses, but are recorded as a reduction of the transaction price recorded as revenue following the identified performance obligation under the collaboration agreement; and
- Are classified in collaboration liability in the consolidated statement of financial position (instead of a classification in deferred revenue under IAS 18).

When a collaboration liability is denominated in a foreign currency, which is the case in the context of this AstraZeneca agreement, it is translated at each reporting date with the appropriate exchange rate, resulting in foreign exchange gains or losses recorded in the consolidated statement of income (loss).

Application of IFRS 15 generated a deferred tax liability of €3,098 thousand as of January 1, 2018. The Company recorded a deferred tax asset equaling the amount of deferred tax liability as of January 1, 2018 as a result of tax losses carryforward.

The impact of the first adoption of IFRS 15 on the statement of financial position and the consolidated statement of income (loss) as of January 1, 2018 are presented below:

(amounts in thousands of euro)	December 31, 2017 as published	IFRS 15 restatement	January 1, 2018 restated
ASSETS			
Non-current assets			
Deferred tax assets	-	3,098	3,098
Total non-current assets	**117,501**	**3,098**	**120,599**
Total current assets	**137,521**	-	**137,521**
TOTAL ASSETS	**255,023**	**3,098**	**258,121**
LIABILITIES AND SHAREHOLDERS'S EQUITY			
Shareholder's Equity			
Reserves	(103,595)	13,488	(90,107)
Total shareholders' equity	**85,956**	**13,488**	**99,444**
Non-current liabilities			
Collaboration liabilities—non-current portion	-	17,314	17,314
Deferred revenue—non-current portion	87,005	(25,246)	61,759
Deferred tax liabilities	-	3,098	3,098
Total non-current liabilities	**95,158**	**(4,834)**	**90,324**
Current liabilities			
Trade payables and others	24,657	(5,156)	19,501
Collaboration liabilities—current portion	-	27,437	27,437
Deferred revenue—current portion	47,909	(27,837)	20,072
Total current liabilities	**73,909**	**(5,556)**	**68,353**
TOTAL LIABILITIES AND SHAREHOLDERS'S EQUITY	**255,023**	**3,098**	**258,121**

(amounts in thousands of euro)	As of December 31, 2018 as published	IFRS 15 impact	As of December 31, 2018, excluding IFRS 15 impacts
ASSETS			
Non-current assets			
Deferred tax assets	1,561	(1,561)	-
Total non-current assets	**131,574**	**(1,561)**	**130,013**
Total current assets	**319,643**	**-**	**319,643**
TOTAL ASSETS	**451,216**	**(1,561)**	**449,655**
LIABILITIES AND SHAREHOLDERS'S EQUITY			
Shareholder's Equity			
Retained earnings	(138,939)	(13,488)	(152,427)
Net result	3,049	7,349	10,398
Total shareholders' equity	**167,240**	**(6,139)**	**161,101**
Non-current liabilities			
Collaboration liabilities—non-current portion	10,669	(10,669)	-
Deferred revenue—non-current portion	68,098	7,958	76,056
Deferred tax liabilities	1,561	(1,561)	-
Total non-current liabilities	**87,238**	**(4,272)**	**82,966**
Current liabilities			
Trade payables and others	91,655	3,382	95,037
Collaboration liabilities—current portion	20,987	(20,987)	-
Deferred revenue—current portion	82,096	26,455	108,551
Total current liabilities	**196,737**	**8,850**	**205,587**
TOTAL LIABILITIES AND SHAREHOLDERS'S EQUITY	**451,216**	**(1,561)**	**449,655**

(amounts in thousands of euro)	Year ended December 31, 2018 as published	IFRS 15	Year ended December 31, 2018, excluding IFRS 15 impact
Revenue from collaboration and licensing agreements	79,892	21,033	100,925
Government financing for research expenditures	14,060	-	14,060
Revenue and other income	**93,952**	**21,033**	**114,985**
Research and development expenses	(69,555)	(15,542)	(85,097)
Selling, general and administrative expenses	(18,142)	-	(18,142)
Operating expenses	**(87,697)**	**(15,542)**	**(103,239)**
Net income (loss) from distribution agreements	(1,109)	-	(1,109)
Operating income	**5,146**	**5,491**	**10,637**
Financial income	6,002	-	6,002
Financial expenses	(8,429)	1,858	(6,571)
Net financial income (loss)	**(2,427)**	**1,858**	**(569)**
Net income before tax	**2,718**	**7,349**	**10,067**
Income tax	333	-	333
Net income	**3,049**	**7,349**	**10,397**
(in € per share)			
Basic income per share	0.05		0.18
Diluted income per share	0.05		0.18

e) Adoption of IFRS 9

IFRS 9 *Financial instruments*, or IFRS 9, which supersedes IAS 39 *Financial instruments: recognition and measurement*, or IAS 39, came into effect on January 1, 2018. IFRS 9 defines new principles covering the classification and measurement of financial instruments, the recognition of impairment provisions for credit risk on financial assets and hedge accounting. The Company has applied IFRS 9 as of January 1, 2018 by recording the cumulative impact in opening equity at this transition date.

Regarding financial instruments, IFRS 9 requires, for non-derivative financial assets, a change of name of the sub-categories of financial assets without, however, modifying the valuation principles of these assets, which remain either at fair value or amortized cost. The valuation models used by the Company remain unchanged.

The modification of the impairment principles for financial assets measured at amortized cost, which now consists of adopting an approach based on expected losses, in practice has resulted in the Company not recognizing impairment and mainly impacts trade receivables, which were nil as of January 1, 2018.

The only impact of IFRS 9 on the financial statements of the Company concerns the recognition of the variance in fair value of the mutual funds. Under IAS 39, the variance in fair value of these financial assets was recognized in other comprehensive income. Under IFRS 9, it will be recognized in the statement of income. Following the application of the standard, the impact on the opening statement of financial position is a reclassification from the cumulated comprehensive income to retained earnings in an amount of €653 thousand.

The amended accounting policy applied to financial instruments is presented in Note 2.j.

f) Adoption of IFRS 16

IFRS 16 was issued in January 2016 and it replaces IAS 17—*Leases*, IFRIC 4 "Determining whether an Arrangement contains a Lease", SIC-15 "Operating Leases-Incentives" and SIC-27 "Evaluating the Substance of Transactions Involving the Legal Form of a Lease." IFRS 16 sets out the principles for the recognition, measurement, presentation and disclosure of leases and requires lessees to account for all leases under a single on-balance sheet model similar to the accounting for finance leases under IAS 17. The standard includes two recognition exemptions for lessees—leases of "low-value" assets (e.g., personal computers) and short-term leases (including leases with a lease term of 12 months or less). At the commencement date of a lease, a lessee recognizes a liability to make lease payments, or the lease liability, and an asset representing the right to use the underlying asset during the lease term, or the right-of-use asset. Lessees are required to separately recognize the interest expense on the lease liability and the depreciation expense on the right-of-use asset. The change in presentation of operating lease expenses results in a corresponding increase in cash flows from operating activities and a decrease in cash flows from financing activities.

According to the new standard, the Company determined the lease term including any lessee's extension or termination option that is deemed reasonably certain. The assessment of such options was performed at the commencement of a lease and required judgment by the management. Measuring the lease liability at the present value of the remaining lease payments required using an appropriate discount rate in accordance with IFRS 16. The discount rate is the interest rate implicit in the lease or if that cannot be determined, the incremental borrowing rate at the date of the lease commencement. The incremental borrowing rate can have a significant impact on the net present value of the right-of use asset and lease liability recognized and requires judgement.

Lessees remeasure the lease liability upon the occurrence of certain events (e.g., a change in the lease term, a change in future lease payments resulting from a change in an index or rate used to determine those payments). The lessee generally recognizes the amount of the remeasurement of the lease liability as an adjustment to the right-of-use asset.

Following analysis carried out by the Company, the contracts impacted by this new standard mainly relate to the rental of premises.

With respect to the transition method, the Company has opted for the modified retrospective approach to contracts previously reported as leases under IAS 17 or IFRIC 4, and, therefore, will only recognize leases on its statement of financial position as of January 1, 2019. Accordingly, comparative information is not restated and the cumulative effect of initially applying IFRS 16 is presented as an adjustment to retained earnings. As of January 1, 2019, the right of use is recognized as assets for their net value (as if IFRS 16 had always been applied) and the present value of the remaining payments is recognized as a liability.

The Company applies the following practical expedients as allowed by IFRS 16:

- Apply a single discount rate to the assets with similar characteristics;
- Use of hindsight in determining the lease term where the contract contains options to extend or terminate the lease;
- Exclude lease contracts for which the lease term ends within 12 months as of the date of initial application, thus considering them short-term lease contracts; and
- Exclude leases of assets with a replacement value of less than approximately €5 thousand.

The impact of the first adoption of IFRS 16 on the statement of financial position as of January 1, 2019 is presented below:

(amounts in thousands of euro)	December 31, 2018 as published	IFRS 16 restatement	January 1, 2019 restated
ASSETS			
Total current assets	**319,643**	**-**	**319,643**
Property and equipment	10,216	1,097	11,313
Total non-current assets	**131,574**	**1,097**	**132,671**
TOTAL ASSETS	**451,216**	**1,097**	**452,313**
LIABILITIES AND SHAREHOLDERS' EQUITY			
Financial liabilities - current portion	1,347	320	1,667
Total current liabilities	**196,737**	**320**	**197,057**
Financial liabilities - non-current portion	3,175	848	4,023
Provision - non-current portion	38	50	88
Total non-current liabilities	**87,238**	**898**	**88,136**
Retained earnings	(137,840)	(121)	(137,961)
Total shareholders' equity	**167,240**	**(121)**	**167,119**
TOTAL LIABILITIES AND SHAREHOLDER'S EQUITY	**451,216**	**1,097**	**452,313**

The weighted average incremental borrowing rate applied by the Company to lease liabilities recognized in the consolidated financial statements as of January 1, 2019 was 2.01%.

The reconciliation between the lease liabilities accounted for at January 1, 2019 and the non-cancellable lease commitments disclosed as of December 31, 2018 is as follow:

Commitments related to operating leases agreements as of December 31, 2018	**769**
Lease liabilities related to financial leases as of December 31, 2018	2,098
Lease extension (Building "Le Virage")	445
Discount effect	(46)
Exemption	0
Lease liabilities as of January 1, 2019	**3,266**

IFRS 16 application has no material impact on the consolidated statements of cash flows and the consolidated statements of income (loss) for the year ended December 31, 2019.

g) Change in accounting policies

Except for the adoption of IFRS 9 and IFRS 15 as of January 1, 2018 and the adoption of IFRS 16 as of January 2019, there has been no change in accounting policies for any of the years presented.

h) Translation of transactions denominated in foreign currency

Pursuant to IAS 21 *The effects of changes in foreign exchange rates*, transactions performed by consolidated entities in currencies other than their functional currency are translated at the prevailing exchange rate on the transaction date.

Trade receivables and payables and liabilities denominated in a currency other than the functional currency are translated at the period-end exchange rate. Unrealized gains and losses arising from translation are recognized in net operating income.

Foreign exchange gains and losses arising from the translation of inter-Group transactions or receivables or payables denominated in currencies other than the functional currency of the entity are recognized in the line "net financial income (loss)" of the consolidated statements of income (loss).

Foreign currency transactions are translated into the presentation currency using the following exchange rates:

	December 31, 2017		December 31, 2018		December 31, 2019	
€1 EQUALS TO	**AVERAGE RATE**	**CLOSING RATE**	**AVERAGE RATE**	**CLOSING RATE**	**AVERAGE RATE**	**CLOSING RATE**
USD	1.1297	1.1993	1.1810	1.1450	1.1195	1.1234

i) Consolidation method

The Group applies IFRS 10 *Consolidated financial statements*. IFRS 10 presents a single consolidation model identifying control as the criteria for consolidating an entity. An investor controls an investee if it has the power over the entity, is exposed or has rights to variable returns from its involvement with the entity and has the ability to use its power over the entity to affect the amount of the investor's returns. Subsidiaries are entities over which the Company exercises control. They are fully consolidated from the date the Group obtains control and are deconsolidated from the date the Group ceases to exercise control. Intercompany balances and transactions are eliminated.

j) Financial instruments

Financial assets

Financial assets are initially measured at fair value plus directly attributable transaction costs in the case of instruments not measured at fair value through profit or loss. Directly attributable transaction costs of financial assets measured at fair value through profit or loss are recorded in the consolidated statement of income (loss).

Under IFRS 9, financial assets are classified in the following three categories:

- Financial assets at amortized cost;
- Financial assets at fair value through other comprehensive income ("FVOCI"); and
- Financial assets at fair value through profit or loss.

The classification of financial assets depends on:

- The characteristics of the contractual cash flows of the financial assets; and
- The business model that the entity follows for the management of the financial asset.

Financial assets at amortized cost

Financial assets are measured at amortized cost when (i) they are not designated as financial assets at fair value through profit or loss, (ii) they are held within a business model whose objective is to hold assets in order to collect contractual cash flows and (iii) they give rise to cash flows that are solely payments of principal and interest on the principal amount outstanding ("SPPI" criterion). They are subsequently measured at amortized cost, determined using the effective interest method ("EIR"), less any expected impairment losses in relation to the credit risk. Interest income, exchange gains and losses, impairment losses and gains and losses arising on derecognition are all recorded in the consolidated statement of income (loss).

This category primarily includes trade receivables, as well as other loans and receivables. Long-term loans and receivables that are not interest-bearing or that bear interest at a below-market rate are discounted when the amounts involved are material.

Financial assets at fair value through other comprehensive income

Financial assets at fair value through other comprehensive income is mainly comprised is composed of debt instruments whose contractual cash flows represent payments of interest or repayments of principal, and which are managed with a view to collecting cash flows and selling the asset. Gains and losses arising from changes in fair value are recognized in equity within the statement of comprehensive income in the period in which they occur. When such assets are derecognized, the cumulative gains and losses previously recognized in equity are reclassified to profit or loss for the period within the line items Financial income or Financial expenses. The Company did not hold this type of instrument as of January 1, 2019 or as of December 31, 2019.

Financial assets at fair value through profit or loss

Financial assets at fair value through profit or loss is comprised of:

- financial assets that are not part of the above categories; and
- instruments that management has designated as “fair value through profit or loss” on initial recognition.

Gains and losses arising from changes in fair value are recognized in profit or loss within the line items financial income or financial expenses.

Impairment of financial assets measured at amortized cost

The main assets involved are trade receivables and others. Trade receivables are recognized when the Company has an unconditional right to payment by the customer. Impairment losses on trade receivables and others are estimated using the expected loss method, in order to take account of the risk of payment default throughout the lifetime of the receivables. The expected credit loss is estimated collectively for all accounts receivable at each reporting date using an average expected loss rate, determined primarily on the basis of historical credit loss rates. However, that average expected loss rate may be adjusted if there are indications of a likely significant increase in credit risk. If a receivable is subject to a known credit risk, a specific impairment loss is recognized for that receivable. The amount of expected losses is recognized in the balance sheet as a reduction in the gross amount of accounts receivable. Impairment losses on accounts receivable are recognized within Operating expenses in the consolidated statement of income (loss).

Financial liabilities

Financial liabilities comprise deferred revenue, collaboration liabilities, loans and trade and other payables.

Financial liabilities are initially recognized on the transaction date, which is the date that the Company becomes a party to the contractual provisions of the instrument. They are derecognized when the Company's contractual obligations are discharged, cancelled or expire.

Loans are initially measured at fair value of the consideration received, net of directly attributable transaction costs. Subsequently, they are measured at amortized cost using the EIR method. All costs related to the issuance of loans, and all differences between the issuance proceeds net of transaction costs and the value on redemption, are recognized within financial expenses in the consolidated statement of income (loss) over the term of the debt using the EIR method.

Other financial liabilities include trade accounts payable, which are measured at fair value (which in most cases equates to face value) on initial recognition, and subsequently at amortized cost.

Cash and cash equivalents

Cash equivalents are short-term, highly liquid investments, that are readily convertible to known amounts of cash and which are subject to an insignificant risk of changes in value. Cash and cash equivalents comprise the cash that is held at the bank and petty cash as well as the short-term fixed deposits for which the maturity is less than three months.

For the purpose of establishing the statement of cash flows, cash and cash equivalents include cash in hand, demand deposits and short fixed-term deposits with banks and short-term highly liquid investments with original maturities of three months or less, net of bank overdrafts.

Cash and cash equivalents are initially recognized at their purchase costs on the transaction date, and are subsequently measured at fair value. Changes in fair value are recognized in profit or loss.

Fair value of financial instruments

Under IFRS 13 *Fair value measurement* and IFRS 7 *Financial instruments: disclosures*, or IFRS 7, fair value measurements must be classified using a hierarchy based on the inputs used to measure the fair value of the instrument. This hierarchy has three levels:

- level 1: fair value calculated using quoted prices in an active market for identical assets and liabilities;
- level 2: fair value calculated using valuation techniques based on observable market data such as prices of similar assets and liabilities or parameters quoted in an active market; and
- level 3: fair value calculated using valuation techniques based wholly or partly on unobservable inputs such as prices in an inactive market or a valuation based on multiples for unlisted securities.

k) Intangible assets

Research and development (R&D) expenses

In accordance with IAS 38 *Intangible assets*, or IAS 38, expenses on research activities are recognized as an expense in the period in which it is incurred.

An internally generated intangible asset arising from the Company's development activities is recognized only if all of the following conditions are met:

- Technically feasible to complete the intangible asset so that it will be available for use or sale;
- The Company has the intention to complete the intangible assets and use or sell it;
- The Company has the ability to use or sell the intangible assets;
- The intangible asset will generate probable future economic benefits, or indicate the existence of a market;
- Adequate technical, financial and other resources to complete the development are available; and
- The Company is able to measure reliably the expenditure attributable to the intangible asset during its development.

Because of the risks and uncertainties related to regulatory approval, the R&D process and the availability of technical, financial and human resources necessary to complete the development phases of the product candidates, the six criteria for capitalization are usually considered not to have been met until the product candidate has obtained marketing approval from the regulatory authorities. Consequently, internally generated development expenses arising before marketing approval has been obtained, mainly the cost of clinical trials, are generally expensed as incurred within Research and development expenses.

However, some clinical trials, for example those undertaken to obtain a geographical extension for a molecule that has already obtained marketing approval in a major market, may in certain circumstances meet the six capitalization criteria under IAS 38, in which case the related expenses are recognized as an intangible asset. These related costs are capitalized when they are incurred and amortized on a straight line basis over their useful lives beginning when marketing approval is obtained.

Licenses

Payments for separately acquired research and development are capitalized within "Other intangible assets" provided that they meet the definition of an intangible asset: a resource that is (i) controlled by the Group, (ii) expected to provide future economic benefits for the Group and (iii) identifiable (i.e. it is either separable or arises from contractual or legal rights).

In accordance with paragraph 25 of IAS 38, the first recognition criterion, relating to the likelihood of future economic benefits generated by the intangible asset, is presumed to be achieved for research and development activities when they are acquired separately.

In this context, amounts paid to third parties in the form of initial payments or milestone payments relating to product candidates that have not yet obtained a regulatory approval are recognized as intangible assets. These rights are amortized on a straight-line basis:

(i) after obtaining the regulatory approval, over their useful life; or
(ii) after entering in an out-license collaboration agreement with a third-party partner, over their estimated useful life. This estimated useful life takes into consideration the period of protection of the out-licensed exclusivity rights and the anticipated period over which the Company will receive the economic benefits of the asset.

Unamortized rights (before marketing authorization) are subject to impairment tests in accordance with the method defined in Note 6.

When intangible assets acquired separately are acquired through variable or conditional payments, these payments are recognized as an increase of the carrying amount of the intangible asset when they become due. Royalties due by the Company related to acquired licenses are recognized as operating expenses when the Company recognizes sales subject to royalties.

Other intangible assets

Other intangible assets consist of acquired software. Costs related to the acquisition of software licenses are recognized as assets based on the costs incurred to acquire and set up the related software. Software is amortized using the straight-line method over a period of one to three years depending on the anticipated period of use.

l) Property and equipment

Property and equipment are carried at acquisition cost. Major renewals and improvements are capitalized while repairs and maintenance are expensed as incurred.

Property and equipment are depreciated over their estimated useful lives using the straight-line depreciation method. Leasehold improvements are depreciated over the life of the improvement or the remaining lease term, whichever is shorter.

The headquarters of the Company was split into several components (e.g., foundations, structure, electricity, heating and ventilation systems) which are depreciated over different useful lives according to the anticipated useful life of these elements.

Depreciation periods are as follows:

Buildings and improvements on buildings (years)	20	to	40
Installations (years)	5	to	20
Technical installations and equipment (years)		8	
Equipment and office furniture (years)		5	
Computers and IT equipment (years)		3	

m) Impairment of intangible assets, property, and equipment,

The Group assesses at the end of each reporting period whether there is an indication that intangible assets, property and equipment may be impaired. If any indication exists, the Group estimates the recoverable amount of the related asset.

Whether or not there is any indication of impairment, intangible assets not yet available for use are tested for impairment annually by comparing their carrying amount with their recoverable amount.

Pursuant to IAS 36—*Impairment of Assets*, criteria for assessing indication of loss in value may notably include performance levels lower than forecast, a significant change in market data or the regulatory environment, or obsolescence or physical damage of the asset not included in the amortization/depreciation schedule. The recognition of an impairment loss alters the amortizable/depreciable amount and potentially, the amortization/depreciation schedule of the relevant asset.

Impairment losses on intangible assets, property and equipment shall be reversed subsequently if the impairment loss no longer exists or has decreased. In such case, the recoverable amount of the asset is to be determined again so that the reversal can be quantified. The asset value after reversal of the impairment loss may not exceed the carrying amount net of depreciation/amortization that would have been recognized if no impairment loss had been recognized in prior periods.

The Group does not have any intangible assets with an indefinite useful life. However, as explained in Note 2.kk, the Group recognized intangible assets in progress, which will be amortized once marketing authorization is received.

n) Employee benefits

Long-term pension benefits

Company employees are entitled to pension benefits required by French law:

- Pension benefit, paid by the Company upon retirement (i.e. defined benefit plan); and
- Pension payments from social security entities, financed by contributions from businesses and employees (i.e. defined contribution plan").

In addition, the Company has implemented an additional, non-mandatory, pension plan ("Article 83"), initially for the benefit of executives only. This plan was extended to the non-executive employees starting on January 1, 2014. This plan meets the definition of defined contribution plan and is financed through a contribution that corresponds to 2.2% of the employee's annual wage, with the Company paying 1.4% and the employee paying 0.8%.

For the defined benefit plan, the costs of the pension benefit are estimated using the "projected unit credit" method. According to this method, the pension cost is accounted for in the consolidated statement of income (loss), so that it is distributed uniformly over the term of the services of the employees. The pension benefit commitments are valued using the actual present value of estimated future payments, adopting the rate of interest of long-term bonds in the private sector (i.e. Euro zone AA or higher rated corporate bonds + 10 years). The difference between the amount of the provision at the beginning of a period and at the close of that period is recognized in the consolidated statement of income (loss) for the portion representing the costs of services rendered and the net interest costs, and through other comprehensive income for the portion representing the actuarial gains and losses. The Company's commitments under the defined benefit plan are not covered by any plan assets.

Payments made by the Company for defined contribution plans are accounted for as expenses in the consolidated statement of income (loss) in the period in which they are incurred.

Other long-term benefits

The Company pays seniority bonuses to employees reaching 10, 15 and 20 years of seniority. These bonuses represent long-term employee benefits. Under IAS 19R "Employee benefits", they are recording as a defined benefit obligation in the consolidated statement of financial position, but their remeasurements is not recognized in the consolidated statement of other comprehensive income (loss).

Other short-term benefits

An accrued expense is recorded for the amount the Company expects to pay its eligible employees in relation to services rendered during the reporting period (actual legal or implicit obligation to make to these payments on a short-term basis).

o) Leases

The Company assesses whether a contract is or contains a lease, at inception of the contract. The Company recognizes a right-of-use asset and a corresponding lease liability with respect to all lease arrangements in which it is the lessee, except for short-term leases (defined as leases with a lease term of 12 months or less) and leases of low value assets (such as tablets and personal computers, small items of office furniture and telephones). For these leases, the Company recognizes the lease payments as an operating expense on a straight-line basis over the term of the lease unless another systematic basis is more representative of the time pattern in which economic benefits from the leased assets are consumed.

The lease liability is initially measured at the present value of the lease payments that are not paid at the commencement date, discounted by using the rate implicit in the lease. If this rate cannot be readily determined, the Company uses its incremental borrowing rate. Lease payments included in the measurement of the lease liability comprise:

- fixed lease payments (including in-substance fixed payments), less any lease incentives receivable;
- variable lease payments that depend on an index or rate, initially measured using the index or rate at the commencement date;
- the amount expected to be payable by the lessee under residual value guarantees;
- the exercise price of purchase options, if the lessee is reasonably certain to exercise the options; and
- payment of penalties for terminating the lease, if the lease term reflects the exercise of an option to terminate the lease.

The lease liability is included in the financial liabilities in the consolidated statement of financial position and is subsequently measured by increasing the carrying amount to reflect interest on the lease liability (using the effective interest method) and by reducing the carrying amount to reflect the lease payments made.

The right-of-use assets comprise the initial measurement of the corresponding lease liability, lease payments made at or before the commencement day, less any lease incentives received and any initial direct costs. They are subsequently measured at cost less accumulated depreciation and impairment losses.

Whenever the Company incurs an obligation for costs to dismantle and remove a leased asset, restore the site on which it is located or restore the underlying asset to the condition required by the terms and conditions of the lease, a provision is recognized and measured under IAS 37. To the extent that the costs relate to a right-of-use asset, the costs are included in the related right-of-use asset, unless those costs are incurred to produce inventories.

Right-of-use assets are depreciated over the shorter period of lease term and useful life of the underlying asset. If a lease transfers ownership of the underlying asset or the cost of the right-of-use asset reflects that the Company expects to exercise a purchase option, the related right-of-use asset is depreciated over the useful life of the underlying asset. The depreciation starts at the commencement date of the lease.

The right-of-use assets are included in the property and equipment line item in the consolidated statement of financial position.

The Company applies IAS 36 to determine whether a right-of-use asset is impaired and accounts for any identified impairment loss.

p) Provisions

In the course of its business, the Company could be exposed to certain risks and litigations, notably in relation to contractual arrangements. Provisions are recognized when the Company has a present legal or constructive obligation as a result of past events, it is probable that the Company is subject to a release of outflow representatives of economic benefits to settle the obligation and a reliable estimate of the amount of the obligation can be made. Management of the Company estimates the probability and the expected amount of a cash outflow associated with risks, together with the other information to be provided on possible liabilities. Where the Company expects a provision to be reimbursed, for example under an insurance contract, the reimbursement is recognized as a separate asset but only when the reimbursement is certain.

q) Capital

Ordinary shares are classified in shareholders' equity. Costs associated with the issuance of new shares are directly accounted for in shareholders' equity in diminution of issuance premium.

The Company's own shares bought in the context of a brokering/liquidity agreement are presented as a reduction in shareholders' equity until their cancellation, their reissuance or their disposal.

r) Share-based compensation

Since its inception, the Company has established several plans for compensation paid in equity instruments in the form of free shares ("*Attributions gratuites d'actions*," or "AGA"), free preferred shares convertible into ordinary shares ("*Attributions gratuites d'actions de préférence convertibles en actions ordinaires*," or "AGAP"), free performance shares ("*Attributions gratuites d'actions de performance*," or "AGA Perf"), share subscription warrants ("*Bons de souscription d'actions*," or "BSA"), redeemable share subscription warrants ("*Bons de Souscription et/ou d'Acquisition d'Actions Remboursables*," or "BSAAR"), granted to its employees, executives, members of the Executive Board and scientific consultants.

Pursuant to IFRS 2—*Share-based Payment,* these awards are measured at their fair value on the date of grant. The fair value is calculated with the most relevant formula regarding the conditions and the settlement of each plan.

For share-based compensation granted to employees, executives, members of the Executive Board and scientific consultants, the Company uses the Black-Scholes and Monte Carlo approach pricing models to determine the fair value of the share-based compensation. For scientific consultants providing similar services, as the Company cannot estimate reliably the fair value of the goods or services received, it measures the value of share-based compensation and the corresponding increase in equity, indirectly, by reference to the fair value of the equity instruments granted also using the Black-Scholes option pricing model. The fair value of free shares included in the model is determined using the value of the shares at the time of their distribution.

In calculating the fair value of share-based compensation, the Company also considers the vesting period and the employee turnover weighted average probability as described in Note 14. Other assumptions used are also detailed in Note 14.

The Company recognizes the fair value of these awards as a share-based compensation expense over the period in which the related services are received with a corresponding increase in shareholders' equity. Share-based compensation is recognized using the straight-line method. The share compensation expense is based on awards ultimately expected to vest and is reduced by expected forfeitures.

s) Revenue

Revenue from collaboration and license agreements

To date, the Company's revenue results primarily from payments received in relation to research, collaboration and licensing agreements signed with pharmaceutical companies. These contracts generally provide for components such as:

- non-refundable upfront payments upon signature;
- payments for the exercise of the option to acquire licenses of drug candidates;
- milestones payments triggered following stages of development (scientific results obtained by the Company or by the partner, obtaining regulatory marketing approvals);
- payments related to the Company's R&D activities;
- payments triggered by the start of the commercialization of products resulting from development work or by crossing cumulative thresholds of product sales, as well as the allocation of royalties on future sales of products or a sharing of profits on sales.

Under collaboration and license agreements, the Company may promise its partners licenses on intellectual property, as well as research and development services. According to IFRS 15, the Company has to determine if the promises included in the contract are distinct (therefore recognized separately as revenue) or if they have to be combined as a single performance obligation.

When promises in a collaboration and license agreement are considered as a single performance obligation, the Company has to determine if the combined performance obligation is satisfied over time or at point in time. If the combined performance obligation is satisfied over time, revenue recognition is based on the percentage of completion of the costs to be incurred. Non-refundable initial payments are deferred and recognized as revenue during the period the Company is engaged to deliver services to the customer on the basis of the corresponding costs.

When promises in a collaboration and license agreement are considered as separate performance obligations, revenue is allocated to each obligation proportionally to its transaction price, which corresponds to a price each performance obligation would have been sold in the context of a separate transaction.

In accordance with IFRS 15, variable considerations cannot be included in the estimated transaction price as long as it not highly probable that the related revenue will not be reversed in the future. According to the level of uncertainty relating to the results of preclinical and clinical trials and the decisions relating to the regulatory approvals, variable considerations depending on these events are excluded from the transaction price as long as the trigger event is not highly probable. When the trigger event occurs, the corresponding milestone is added to the transaction price. Such adjustments are recorded on a cumulative catch-up basis, which would affect revenues and net income (loss) in the period of adjustment.

Revenues based on royalties, completion of commercialization steps or co-sharing profit from sales are recognized when the corresponding sales of products are carried out by the partner.

When a collaboration contract grants a partner an option to acquire a licensed intellectual property ("IP"), the Company determines the date of the transfer of control over the licensed IP. Depending on the Company analysis, revenue related to the option fee will be recognized (i) when control over the licensed IP transfers (payment related to the exercise of the option being therefore considered as a variable consideration), or, (ii) deferred until the exercise of the option or its expiration period.

When an agreement only promises development services, the Company will recognize the related revenue when the costs are incurred.

Up-front and milestones payments and fees are recorded as deferred revenue upon receipt or when due, and may require deferral of revenue recognition to a future period until the Company performs its obligations under these arrangements. Amounts due by the Company in relation to cost-sharing are recorded as collaboration liability. Amounts payable to the Company are recorded as accounts receivable when the Company's right to consideration is unconditional.

See Note 13 for accounting description of significant agreements.

t) Net income (expenses) from distribution agreements

When product sales are made by a partner in the context of collaboration or transition agreements, the Company must determine whether it acts as agent or principal. A party is recognized as a principal when it has the ability to conduct the use of the products and to obtain all the residual economic benefits previously to the transfer of the control of the products to the customers. If the Company is a principal, sales are recognized as revenue. If the Company is an agent, it recognizes as a gain or a loss, the part of the revenue it is entitled to, which is the case under the agreement with AstraZeneca in relation to Lumoxiti (see Note 15). Therefore, income (loss) under the agreement are recognized in the statement of income (loss) on the line item "Net income (loss) from distribution agreements".

u) Government financing for research expenditures

Research tax credit

The research tax credit (*Crédit d'Impôt Recherche*) (the "Research Tax Credit" or "CIR") granted by the French tax authorities in order to encourage Companies to conduct technical and scientific research. Companies that can justify that these expenses meet the required criteria receive such grants in the form of a refundable tax credit that can be used for the payment of taxes due for the period in which the expense was incurred and for the next three years. These grants are presented under other income, in "government financing for research expenditures" line item in the consolidated statements of income (loss), as soon as these eligible expenses were conducted.

The Company has benefited from a Research Tax Credit since its inception.

The Company received the reimbursements of the Research Tax Credits for the year 2017 and 2018, during the year 2018 and 2019 respectively. These reimbursements were made under the European Community tax rules for small and medium sized enterprises ("SME") in compliance with the applicable regulations in effect. Only companies that meet the definition of SME according to European Union criteria are eligible for early reimbursement of their CIR. Management ensured that the Company was a SME according to European Union criteria as of December 31, 2017 and 2019, and can therefore benefit from this early reimbursement. As of December 31, 2019, the Company no longer meets the eligibility criteria for this status. Thus, the CIR for the years 2019 and after will represent a receivable against the French Treasury which will in principle be offset against the French corporate income tax due by the company with respect to the three following years. The remaining portion of tax credit not being offset upon expiry of such a period may then be refunded to the Company.

The CIR is presented under other income, in "government financing for research expenditures" line item in the consolidated statements of income (loss) as it meets the definition of government grant as defined in IAS 20 *Accounting for government grants and disclosure of government assistanc*e.

Subsidies

Government grants are recognized when there is a reasonable assurance that:

- The Company will comply with the conditions attached to the grants; and that
- The grants will be received.

A government grant that becomes receivable as compensation for expenses or losses already incurred, or for the purpose of providing immediate financial support to the Company with no future related costs, is recognized as other income of the period in which it becomes receivable.

Government grants to subsidize capital expenditures are presented in the statement of financial position as deferred income and are recognized as income on a straight line basis over the useful life of those assets that have been financed through the grants.

A non-repayable loan from the government is treated as a government grant when there is a reasonable assurance that the Company will meet the terms for non-repayment of the loan. When there is no such assurance, the loan is recorded as a liability under borrowings.

v) Income tax

Deferred income tax is provided in full, using the liability method, on temporary differences arising between the tax bases of assets and liabilities and their carrying amounts in the financial statements. Main temporary differences are generally associated with the depreciation of property and equipment, provisions for pension benefits and tax losses carried forward and also with the deferred tax liabilities / assets generated by the application of IFRS 15 (see Note 2.dd “Adoption of IFRS 15”). Currently enacted tax rates are used in the determination of deferred income tax.

Deferred tax assets are recognized to the extent that it is probable that future taxable profit will be available against which the temporary differences can be utilized. Due to Company’s early stage of development, it is not probable that future taxable profit will be available against which the unused tax losses can be utilized. As a consequence, deferred tax assets are recognized up to deferred tax liabilities.

w) Earnings (loss) per share

In accordance with IAS 33 *Earnings per share*, basic income (loss) per share is calculated by dividing the income (loss) attributable to equity holders of the Group by the weighted average number of outstanding shares for the period.

Diluted income (loss) per share is measured by dividing the income (loss) attributable to holders of equity and dilutive instruments by the weighted average number of outstanding shares and dilutive instruments for the period.

If in the calculation of diluted income (loss) per share, instruments giving deferred rights to capital such as warrants generates an antidilutive effect, then these instruments are not taken into account.

x) Other comprehensive income

Items of income and expenses for the period that are recognized directly in equity are presented under “other comprehensive income.” The items mainly include :

- Foreign currency translation gain (loss); and
- Actuarial gains and (losses) related to defined benefit obligations.

y) Segment information

For internal reporting purposes, and in order to comply with IFRS 8 *Operating segments*, the Company performed an analysis of operating segments. Following this analysis, the Company considers that it operates within a single operating segment being the R&D of pharmaceutical products in order to market them in the future. All R&D activities of the Company are located in France. Key decision makers (the executive committee of the Company) monitor the Company's performance based on the cash consumption of its activities. For these reasons, the Management of the Group considers it not appropriate to set up separate business segments in its internal reporting.

In 2017 and 2018 and 2019, revenue was entirely generated by one customer.

z) Critical accounting estimates and assumptions

The preparation of the consolidated financial statements under IFRS requires management to make estimates, assumptions and judgments that affect the reported amounts of assets, liabilities, income and expenses during the reporting period. The Company bases estimates and assumptions on historical experience when available and on various factors that it believes to be reasonable under the circumstances. The Company's actual results may differ from these estimates under different assumptions or conditions.

These estimates and judgments involve mainly:

- **the accounting for collaboration and licensing agreements**: the revenue results primarily from payments based on several components (e.g., upfront payments, milestone payments) received in relation to research, collaboration and licensing agreements signed with pharmaceutical or other companies. When the Company is committed to perform R&D services, revenue is spread over the period the Company is engaged to deliver these services, more particularly on the basis of the Company's inputs to the satisfaction of a performance obligation relative to the total expected inputs to the satisfaction of that performance obligation.

  Milestone payments are dependent upon the achievement of certain scientific, regulatory, or commercial milestones. These variable payments are recognized when the triggering event has occurred, there are no further contingencies or services to be provided with respect to that event, and the counterparty has no right to refund of the payment.

  The changes in estimate regarding the completion of the works and the variable consideration relating to the contracts signed with customers are described in Note 13.

- **the measurement of the subcontracting costs relating to the clinical trial costs**: the completion of the subcontracting costs related to clinical trials is based on two allocation keys: (i) time, for the services defined as permanent and linear: completion is then measured based on total duration of the clinical trial, and/or (ii) the number of patients visits for services provided to patients: completion is then measured based on the projected number of patients visits for the clinical trial, and/or (iii) if the Company is not sponsor of the trial, the criteria number of patients visits is replaced by the criteria number of patients: completion is then measured based on the projected number of patients for the clinical trial. For each clinical trial, these allocation keys are applied to the budget of the clinical trial.

- **the estimation of shared development costs and transition costs under the 2015 AstraZeneca monalizumab agreement and the AstraZeneca Lumoxiti in-licensing agreement**: quarterly invoices submitted by AstraZeneca under these agreements are based on estimates made by AstraZeneca management as a result of its accounting work. This implies estimates from AstraZeneca regarding the advancement of their clinical costs. AstraZeneca submits to the Company an update of their budgets which is reviewed by the Company in order to identify potential deviations. These estimates of shared development costs and transition costs have a significant impact on the Company's operating income (loss), trade payables and collaboration liabilities.

- **the measurement of the fair value of warrants**: the measurement of the fair value of warrants granted to employees, non-employee members of the Executive Board, scientific consultants, determined on the basis of Black-Scholes option and Monte Carlo approach pricing models; these models require the use by the Company of certain calculation assumptions such as the expected volatility of the underlying share or the employee turnover weighted average rate.

- **the estimate of the recoverable amount of the acquired and under progress licenses**: impairment tests are performed on a yearly basis for the intangible assets which are not amortized (such as intangible assets in progress). Amortizable intangible assets are tested for impairment when there is an indicator of impairment. Impairment tests involve comparing the recoverable amount of the licenses to their net book value. The recoverable amount of an asset is the higher of its fair value less costs to sell and its value in use. If the carrying amount of any asset is below its recoverable amount, an impairment loss is recognized to reduce the carrying amount to the recoverable amount. The main assumptions used for the impairment test include (a) the amount of cash flows that are set on the basis of the development and commercialization plans and budgets approved by Management, (b) assumptions related to the achievement of the clinical trials and the launch of the commercialization, (c) the discount rate, (d) assumptions on risk related to the development and (e) for the commercialization, selling price and volume of sales, Any change in these assumptions could lead to the recognition of an impairment charge that could have a significant impact on the Company's consolidated financial statements.

- **the estimate of the useful life of the acquired licenses**: intangible assets are amortized on a straight line basis over their anticipated useful life. The estimated useful life is the period over which the asset provides future economic benefits. It is estimated by management and is regularly revised by taking into consideration the period of development over which it expects to receive economic benefits such as collaboration revenues, royalties, product of sales, etc. However, given the uncertainty surrounding the duration of the R&D activities for the programs in development and their likelihood to generate future economic benefits to the Company, the estimated useful life of the rights related to these programs is rarely longer than the actual development phase of the product candidate. When a program is in commercialization phases, the useful life takes into account the protection of the exclusivity rights and the anticipated period of commercialization without taking into account any extension or additional patents. The prospective amendment of the amortization plan of the monalizumab intangible asset, which is modified according to the estimate ending date of the Phase II clinical trial is described in Note 6.

3) Management of financial risks and fair value

The principal financial instruments held by the Company are cash, cash equivalents and marketable securities. The purpose of holding these instruments is to finance the ongoing business activities of the Company. It is not the Company's policy to invest in financial instruments for speculative purposes. The Company does not utilize derivatives.

The principal risks to which the Company is exposed are liquidity risk, foreign currency exchange risk, interest rate risk and credit risk.

Liquidity risk

The Company's cash management is performed by the Finance department, in charge of monitoring the day-to-day financing and the short-term forecast and enabling the Company to face its financial commitments by maintaining an amount of available cash consistent with the maturities of its liabilities. As of December 31, 2019, cash, cash equivalents and short-term investments were €218,865 thousand, which represents more than a year of cash consumption.

The main characteristics of the financial instruments owned by the Company (including liquidity) are presented in Note 4.

Foreign currency exchange risk

The Company is exposed to foreign exchange risk inherent in certain subcontracting activities relating to its operations in the United States, which have been invoiced in U.S. dollars. The Company does not currently have recurring revenues in euros, dollars or in any other currency. As the Company further increases its business, particularly in the United States, it is expected to face greater exposure to exchange rate risk.

The revenue denominated in U.S. dollars has represented approximately 100% of revenue in the years ended December 31, 2017, 2018 and 2019, respectively. Payments in U.S. dollars represented approximately 15.1%, 31.9%, 64.1% of the payments in the years ended December 31, 2017, 2018 and 2019, respectively. In order to cover this risk, the Company kept in U.S. dollars a part of the consideration received from AstraZeneca in June 2015 and January 2019. We entirely kept the U.S dollars portion of the proceeds received from our Global Offering in October 2019.

The Company's foreign exchange policy does not include the use of hedging instruments.

Interest rate risk

The Company has very low exposure to interest rate risk. Such exposure primarily involves money market funds and time deposit accounts. Changes in interest rates have a direct impact on the rate of return on these investments and the cash flows generated. The Company has no credit facilities. The repayment flows of the advances from *Banque Publique d'Investissement* ("BPI France") and the borrowings subscribed in 2017 are not subject to interest rate risk.

Credit risk

The credit risk related to the Company's cash equivalents, short-term investments and non-current financial assets is not significant in light of the quality of the issuers. The Company deemed that none of the instruments in its portfolio are exposed to credit risk.

Fair value

The fair value of financial instruments traded on an active market is based on the market rate as of December 31, 2019. The market prices used for the financial assets owned by the Company are the bid prices in effect on the market as of the valuation date.

4) Cash, cash equivalents and financial assets

	December 31,		
(in thousands of euro)	**2017**	**2018**	**2019**
Cash and cash equivalents	99,367	152,314	202,887
Short-term investments	16,743	15,217	15,978
Cash and cash equivalents and short-term investments	***116,110***	***167,531***	***218,865***
Non-current financial assets	60,469	35,181	37,005
Total cash, cash equivalents and financial assets	**176,578**	**202,712**	**255,869**

Cash and cash equivalents are mainly composed of current bank accounts, interest-bearing accounts and fixed-term accounts.

In the year ended December 31, 2017, shares in mutual funds are defined by the Company as assets available for sale measured at fair value through other comprehensive income. From January 1, 2018 and the first application of IFRS 9, they are accounted for as financial assets at fair value through profit and loss. The Company only invests into funds with a very low level of risk. As of December 31, 2019, the Company owns shares of four mutual funds. The risk profiles of these funds are rated 1 to 7 by the financial institution who manages and commercializes these funds (1 being the lowest risk profile). When the maturity of shares in mutual funds is longer than one year, they are classified as non-current financial instruments.

Other non-current financial assets generally include a guarantee of capital at the maturity date (which is always longer than one year). These instruments are defined by the Company as financial assets at fair value through profit or loss and classified as non-current due to their maturity.

As of December 31, 2017, 2018 and 2019 the amount of cash, cash equivalents and financials assets denominated in US dollars amounted respectively to €59,348 thousand, €74,442 thousand and €97,688 thousand

The variation of short-term investments and non-current financial assets for the periods presented, are the following:

(in thousands of euro)	December 31, 2017	Acquisitions	Disposals	Variance of fair value through the consolidated statement of income (loss)	Variance of accrued interests	Foreign currency effect	December 31, 2018
Short-term investments	16,743	-	(2,704)	383	-	794	15,217
Non-current financial assets	60,469	-	(21,513)	(4,169)	(152)	547	35,181
Total	**77,212**	**-**	**(24,217)**	**(3,786)**	**(152)**	**1341**	**50,398**

(in thousands of euro)	December 31, 2018	Acquisitions	Disposals	Variance of fair value through the consolidated statement of income (loss)	Variance of accrued interests	Foreign currency effect	December 31, 2019
Short-term investments	15,217	-	-	481	-	280	15,978
Non-current financial assets	35,181	-	(2,000)	3,585	237	-	37,005
Total	**50,398**	**-**	**(2,000)**	**4,065**	**237**	**280**	**52,983**

5) Trade receivables and others

Trade receivables and others are analyzed as follows:

	Year ended December 31,		
(in thousands of euro)	**2017**	**2018**	**2019**
Other receivables[1]	139	108,585	544
Accrued receivables excluding rebates related to capital expenditures	730	5,539	691
Research tax credit[2]	11,022	13,503	-
Other tax credits	251	538	333
Prepaid expenses	5,898	4,211	5,403
VAT refund	2,675	2,807	1,995
Trade account receivables	-	2,522	2,816
Prepayments made to suppliers	430	1,264	197
Refund to be received ("CVAE")	267	43	-
Rebate related to capital expenditures[3])	-	13,100	6,762
Receivables and others - current	**21,412**	**152,112**	**18,741**
Research tax credit[2]	-	-	16,737
Receivables and others - non-current	**-**	**-**	**16,737**
Trade receivables and others - excluding rebates related to capital expenditures	*21,412*	*139,012*	*28,716*

(1) "Other receivables" as of December 31, 2018, mainly related to AstraZeneca as a result of the exercise of the monalizumab exclusive license option ($100,000 thousand or €87,655 thousand) and option granted on IPH5201 ($24,000 thousand or €20,961 thousand). These amounts were paid in the first quarter of 2019, see Note 1.1.a and Note 1.1.c for agreements description.

(2) In accordance with the principles described in Note 2.u, the research tax credit (*Crédit d'Impôt Recherche* or "CIR") is recognized as other operating income in the year to which the eligible research expenditure relates. The Company obtained the repayment of the CIR for the tax year 2017 in the amount of €11,022 thousand in 2018 and the repayment of the CIR for the tax year 2018 in the amount of €13,503 thousand in July 2019. The CIR for the tax year 2019 amounted to 16,737 thousand. Following the fact that the Company no longer meets the eligibility criteria for the SME status as of December 31, 2019, the CIR for the tax year 2019 will in principle be offset against the French corporate income tax due by the company with respect to the three following years, or refunded if necessary upon expiry of such a period (see note 2.u).

(3) The rebate refers to a definitive rebate of $7,580 thousand as of December 31, 2019 ($15,000 thousand as of December 31, 2018) granted by AstraZeneca in connection with the acquisition of Lumoxiti rights and that will be paid in 2020. This decrease of $ 7,420 thousand (€6,455 thousand) is based on the final cost figures for the 2019 financial year for Lumoxiti and invoiced by AstraZeneca. The carrying amount of the intangible asset has been adjusted accordingly (see note 6).

Trade receivables and others have payment terms of less than one year. No valuation allowance was recognized on trade receivables and others as the credit risk of each of debtors was considered as not significant.

6) Intangible assets

Intangible assets can be broken down as follows:

(in thousands of euro)	Purchased licenses	Other intangible assets	In progress	Total
January 1, 2017	**9,022**	**44**	**9**	**9,075**
Acquisitions (amended)[1]	-	227	40,000 [1]	40,227
Disposals	-	-	-	-
Transfers	-	9	(9)	-
Depreciation	(3,009)	(101)	-	(3,110)
December 31, 2017 (amended)[1]	**6,013**	**179**	**40,000**	**46,192**

(in thousands of euro)	Purchased licenses	Other intangible assets	In progress	Total
January 1, 2018	**6,013**	**179**	**40,000**	**46,192**
Acquisitions	43,801 [2]	405	-	44,206
Disposals	-	(64)	-	(64)
Depreciation	(5,630)	(175)	-	(5,805)
December 31, 2018	**44,184**	**345**	**40,000**	**84,529**

(in thousands of euro)	Purchased licenses	Other intangible assets	In progress	Total
January 1, 2019	**44,184**	**345**	**40,000**	**84,529**
Acquisitions	-	59	-	59
Additional considerations	27,020 [(3)]	-	-	27,020
Disposals	-	-	-	-
Depreciation	(14,353)[(4)]	(149)	-	(14,502)
Transfers	-	(139)	-	(139)
December 31, 2019	**56,851**	**116**	**40,000**	**96,968**

(1) This amount is an upfront payment for acquisition of avdoralimab rights under the in-licensing agreement signed in 2017 with Novo Nordisk A/S. The classification of this amount has been amended compared to the 2017 consolidated financial statements since it is in progress and thus not amortized.

(2) This amount mainly includes (i) an upfront payment of €43,501 thousand, less an estimate rebate of €13,050 thousand relating to the rights acquired from AstraZeneca in 2018 under the Lumoxiti in-licensing agreement and (ii) a €13,050 thousand additional consideration to be paid to Novo Nordisk A/S following the exercise of the option by AstraZeneca for the monalizumab rights.

(3) This amount includes (i) an additional consideration of €7,000 thousand paid to Orega Biotech in June 2019 in relation to the anti-CD39 program as consideration following the collaboration and option agreement signed in October 22, 2018 with AstraZeneca regarding IPH5201 (see Note 1.c), (ii) the decrease of the rebate granted by AstraZeneca in connection with the acquisition of Lumoxiti rights for an amount of €6,455 thousand (see Note 5 and (2) above), and (iii) an additional consideration of €13,565 thousand paid to AstraZeneca in January 2020 following the submission to the European Medicines Agency (EMA) of the Marketing Authorization Application (MAA) relating to the commercialization of Lumoxiti in Europe (see Note 1.2).

(4) This amount includes the amortization of rights related to monalizumab (€4,792 thousand), IPH5201 (€6,831 thousand) and Lumoxiti (€2,730 thousand).

Monalizumab rights under the 2014 monalizumab (NKG2A) Novo Nordisk agreement

At the agreement inception, acquired rights were recorded as intangible asset for an amount of €7,000 thousand. The Company recorded an additional consideration of €6,325 thousand in 2015 and a final consideration of $15,000 thousand (€13,050 thousand) due in 2018 (see Note 1.1.a).

Since their acquisition by the Company, monalizumab rights are amortized on a straight-line basis over the anticipated residual duration of the Phase II trials. The Company has reassessed the anticipated residual duration of the Phase II trials as of December 31, 2019 and estimated that it would be fully amortized by the end of 2021, compared to end of 2019 as estimated as of December 31, 2018, as a result of the completion of some trials and initiation of new cohorts. The impact of this revision for the fiscal year ended December 31, 2019 amounts to €4,452 thousand.

The net book values of the monalizumab rights were €7,941 thousand and €12,733 thousand as of December 31, 2019 and December 31, 2018, respectively.

IPH5201 (Anti-CD39) rights acquired from Orega Biotech

On January 4, 2016, the Company and Orega Biotech entered into an exclusive licensing agreement by which Orega Biotech granted the Company full worldwide rights to its program of first-in-class anti-CD39 checkpoint inhibitors. The undisclosed upfront payment paid by the Company to Orega Biotech has been recognized as an intangible asset in the consolidated financial statements for the year ended December 31, 2016. Criteria relating to the first development milestone were reached in December 2016. Consequently, the amount of this milestone was recognized as an intangible asset in addition to the initial payment, for a total of €1.8 million as of December 31, 2018. In June of 2019, the Company also paid Orega Biotech €7.0 million in relation to the anti-CD39 program as consideration following the collaboration and option agreement signed on October 22, 2018 with AstraZeneca regarding IPH5201.

This asset is amortized on a straight-line basis since November 1, 2018 (corresponding to the effective beginning date of the collaboration) until the date the Company expects to fulfill its commitment (end of fiscal year 2020).

The Company may also be obligated to pay Orega Biotech up to €51,500 thousand upon the achievement of development and regulatory milestones. In addition, the Company will be obligated to pay mid-single digit to low-teen percentage payments, depending on determinations relating to Orega Biotech's intellectual property rights for certain patents, on sublicensing revenues the Company receives pursuant to its agreement with AstraZeneca relating to IPH5201.

Avdoralimab (IPH5401) (anti-C5aR) rights acquired from Novo Nordisk A/S

At the agreement inception, an upfront payment of €40 million for acquired rights were recorded as intangible asset. As avdoralimab is still in clinical trial, the acquired rights are classified as intangible asset in progress. They were subject to annual impairment test. No impairment were recorded since inception. These acquired rights will be amortized when the Company obtains economic benefits.

According to the agreement, the Company will pay additional payments according to the reach of specific steps. As of December 31, 2019, according to the uncertainty of these potential payments, no liability was recognized.

Development costs incurred by the Company are recognized as research and development expenses.

The main assumptions used for the impairment test are the following:

- Cash flows are set on the basis of the development and commercialization plans and budgets approved by Management;
- A discount rate of 12%;
- A risk of development is taken into consideration by applying probabilities of success of reaching future phases of development to cash flows related to each development phases Those average probabilities of success of R&D projects are based on an article published in Nature Biotechnology journal;

- For the commercialization phase, selling price and sales volume are estimated on the basis of the potential market and the observed performances of comparable drugs currently on the market. Decrease in sales volume applied to the forecasted revenue once the related rights fall off-patent.

In case of failure of the clinical trials in progress, the Company may have to depreciate the intangible asset corresponding to the avdoralimab rights.

The Company did not identify any reasonable potential variance in the key assumptions that may generate an impairment.

Sensitivity testing regarding these following assumptions and other assumptions such as: discount rate (+/- 3%), selling price (+/- 10%) and decrease in sales volume once the related rights fall off-patent (+/- 5%) were performed. These tests did not reveal any impairment.

Avdoralimab does not generate economic benefits yet for the Company. In accordance with IAS 38, it will be amortized when it generates economic benefits, which can result from:

- The commercialization the drug candidate; or,
- An out-licensed agreement.

If the Company commercialize the drug product on its own, it will have to determine the amortization period of the related capitalized rights. It will have to estimate their useful life, considering the date when they fall off patent. Those capitalized rights will be amortized on a straight line basis during the estimated useful life.

If the Company entered in an out-licensed agreement, the Company will have to perform an analysis to determine if the control of the rights are transferred to a third-party, and thus will have to derecognize the capitalized rights. If the Company conclude that it keeps the control of the rights, it will determine their useful life and will amortize them on a straight line basis during this useful life.

Lumoxiti rights acquired from AstraZeneca under the 2018 AstraZeneca multi-term agreement

The license by which the Company acquired Lumoxiti rights is amortized on a straight-line basis through July 31, 2031, which corresponds to the expiration of the current composition of matter patent, not including any additional patent extensions or patents. The net book value of the Lumoxiti rights was €47,276 thousand and €29,987 thousand as of December 31, 2019 and December 31, 2018, respectively. This increase in the net book value resulting from (i) the decrease of the rebate granted by AstraZeneca in connection with the acquisition of Lumoxiti rights for an amount of €6,455 thousand (see Note 6), and (ii) an additional consideration of €13,565 thousand paid to AstraZeneca in January 2020 following the submission to the European Medicines Agency (EMA) of the Marketing Authorization Application (MAA) relating to the commercialization of Lumoxiti in Europe. These additional considerations are partly offset by the period amortization (€2,730 thousand).

The Company applied IAS 36- Impairment of assets and assessed whether there was any indication that an asset may be impaired. The Company estimated the recoverable amount of Lumoxiti intangible assets using a discounting cash flow model which confirmed that these assets were not impaired. The following assumptions were used to determine the recoverable amount, based on the cash flows determined from the commercialization plan and the budget approved by Management:

- A discount rate of 12%
- Assumptions related to selling price increase and sales volume based on the potential market and comparable products; and
- Decrease in sales volume applied to the forecasted revenue once the related rights fall off-patent.

Sensitivity testing regarding the following assumptions and other assumptions such as: discount rate (+/- 3%), selling price (+/- 10%) and decrease in sales volume once the related rights fall off-patent (+/- 5%) were performed. These tests did not reveal any impairment.

7) Property and equipment

(in thousands of euro)	**Land and buildings**	**Laboratory equipment and other**	**In progress**	**Total**	*Of which finance leases*
January 1, 2017	**3,900**	**5,164**	**30**	**9,094**	***6,030***
Acquisitions	491	2446	34	2,971	
Disposals	-	(50)	-	(50)	
Transfers	-	30	(30)	-	
Depreciation	(297)	(987)	-	(1,284)	*(552)*
December 31, 2017	**4,093**	**6,602**	**34**	**10,729**	***5,478***

(in thousands of euro)	**Land and buildings**	**Laboratory equipment and other**	**In progress**	**Total**	*Of which finance leases*
January 1, 2018	**4,093**	**6,602**	**34**	**10,729**	***5,478***
Acquisitions	-	725	316	1,041	-
Disposals	-	(22)	-	(22)	-
Transfers	-	30	(30)	-	-
Depreciation	(298)	(1,234)	-	(1,532)	*(555)*
December 31, 2018	**3,795**	**6,101**	**320**	**10,216**	***4,923***

(in thousands of euro)	**Land and buildings**	**Laboratory equipment and other**	**In progress**	**Total**	*Of which right of use assets*
December 31, 2018	**3,795**	**6,101**	**320**	**10,216**	***4,923***
Impact of 1st application of IFRS 16	1,028	69	0	1,097	*1,097*
January 1, 2019	**4,823**	**6,170**	**320**	**11,313**	***6,020***
Acquisitions	1,102	1,031	212	2,345	*1,102*
Disposals	(1)	(96)	-	(97)	-
Depreciation	(568)	(1,460)	-	(2,028)	*(852)*
Transfers		302	(163)	139	-
December 31, 2019	**5,356**	**5,947**	**369**	**11,672**	***6,270***

8) Trade payables and others

This line item is analyzed as follows:

	December 31,		
(in thousands of euro)	**2017**	**2018**	**2019**
Suppliers (excluding payables related to capital expenditures)	19,970	28,576	27,936
Tax and employee-related payables	4,404	5,661	6,999
Other payables	209	425	1,111
Trade payables and others excluding payables related to capital expenditures	*24,583*	*34,662*	*36,047*
Payables related to capital expenditures	74	56,993	13,458
Payables and others	**24,657**	**91,655**	**49,504**

The book value of trade payables and others is considered to be a reasonable approximation of their fair value.

9) Financial liabilities

This line item was broken down per maturity and is analyzed as follows:

In thousand euros	**December 31, 2016**	**Proceeds from borrowing**	**Repayments of borrowings and lease liabilities**	**December 31, 2017**
BPI PTZI IPH41 (1)	1,425	-	(300)	1,125
Lease liabilities – Real estate property	3,100	-	(861)	2,239
Property transaction (down-payment)	(530)	-	144	(386)
Lease liabilities – Laboratory equipment	1,332	-	(172)	1,160
Loans – Equipment	-	439	(13)	426
Loans – Building	-	1,300	-	1,300
Total	**5,327**	**1,739**	**(1,201)**	**5,864**

(1) Interest-free loan

In thousand euros	December 31, 2017	Proceeds from borrowing	Repayments of borrowings and lease liabilities	December 31, 2018
BPI PTZI IPH41 [1]	1,125	-	(375)	750
Lease liabilities – Real estate property	2,239	-	(894)	1,345
Property transaction (down-payment)	(386)	-	152	(234)
Lease liabilities – Laboratory equipment	1,160	-	(173)	987
Loans – Equipment	426	-	(54)	372
Loans – Building	1,300	-	-	1,300
Total	**5,864**	**-**	**(1,342)**	**4,522**

(1) Interest-free loan

In thousand euros	December 31, 2018	Impact of first application of IFRS16 (non cash)	January 1, 2019, (restated)	Proceeds from borrowing	Proceeds from lease liabilities (non cash)	Repayments of borrowings and lease liabilities	December 31, 2019
BPI PTZI IPH41 [1]	750	-	750	-	-	(300)	450
Lease liabilities – Real estate property	1,345	-	1,345	-	-	(927)	418
Property transaction (down-payment)	(234)	-	(234)	-	-	161	(74)
Lease liabilities – Building "Le Virage"	-	1,099	1,099	-	623	(285)	1,437
Lease liabilities – Premises Innate Inc	-	-	-	-	496	-	496
Lease liabilities – Laboratory equipment	987	-	987	-	-	(172)	815
Lease liabilities – Vehicles	-	69	69	-	-	(32)	37
Loans – Equipment	372	-	372	-	-	(53)	319
Loans – Building	1,300	-	1,300	13,900	-	(374)	14,826
Total	**4,522**	**1,168**	**5,690**	**13,900**	**1,119**	**(1,982)**	**18,723**

(1) Interest-free loan

In 2013, the Company was granted an interest-*free loan* for innovation ("PTZI") by BPI France relating to the program lacutamab IPH4102 for an amount of €1,500 thousand.

Finance lease obligations relate primarily to real estate property in relation to the acquisition in 2008 of the Company's headquarters and main laboratories. They are presented in the above table net of the cash collateral paid to Sogebail, the lessor. In the context of this operation, the Company paid a guarantee in the form of a down-payment. This down-payment amounts to €74 thousand as of December 31, 92019 (€234 thousand as of December 31, 2018).

On July 3, 2017, the Company borrowed from the Bank "Société Générale" in order to finance the construction of its future headquarters. This loan amounting to a maximum of €15,200 thousand will be raised during the period of the construction in order to pay the supplier payments as they become due. As of December 31, 2017 and 2018, the loan was raised at an amount of €1,300 thousand.

The loan release period was limited to August 30, 2019. On August 30, 2019, the Company drew down the remaining portion of the €15,200 thousand loan granted, for an amount of €13,900 thousand. The reimbursement of the capital has begun in August 30, 2019 and will proceed until August 30, 2031 (12 years). As of December 31, 2019, the remaining capital of the loan amounted to €14,826 thousand. The Company authorized collateral over financial "Société Générale" instruments amounting to €15,200 thousand. The security interest on the pledge financial instruments will be released in accordance with the following schedule: €4,200 thousand in July 2024, €5,000 thousand in July 2027 and €6,000 thousand in July 2031.

This loan bears a fixed interest rate of 2.01%. It is subject to a covenant based on the assumption that the total cash, cash equivalents and current and non-current financial assets are at least equal to principal as of financial year end.

In thousand euros	**Year ended December 31,**		
Current financial liabilities	**2017**	**2018**	**2019**
BPI PTZI IPH41	375	300	300
Lease finance obligations – Real estate property	741	766	344
Lease finance obligations – Rent Le Virage	-	-	77
Lease liabilities – Premises Innate Inc	-	-	25
Lease finance obligations – Laboratory equipment	173	187	175
Lease liabilities – Vehicles	-	-	16
Loans - Equipment	54	54	55
Loans - Building	-	40	1,139
Total – Current financial liabilities	**1,343**	**1,347**	**2,130**

In thousand euros	**Year ended December 31,**		
Non-Current financial liabilities	**2017**	**2018**	**2019**
BPI PTZI IPH41(1)	750	450	150
Lease finance obligations – Real estate property	1,112	344	-
Lease finance obligations – Building Le Virage	-	-	1,360
Lease liabilities – Premises Innate Inc	-	-	471
Lease finance obligations – Laboratory equipment	989	800	640
Lease finance obligations – Vehicles	-	-	21
Loans - Equipment	372	318	264
Loans - Building	1,300	1,260	13,687
Total – Non-Current financial liabilities	**4,521**	**3,172**	**16,593**

The table below shows the schedule for the contractual flows (being principal and interest payments):

(in thousands of euro)	≤1 year	2 to 5 years included	≥ 5 years	Total
BPI PTZI IPH41	300	150	-	450
Lease finance obligations – Real estate property	420	-	-	420
Down-payment	(74)	-	-	(74)
Lease finance obligations – Rent Le Virage	106	1,272	159	1,537
Lease liabilities – Premises Innate Inc.	34	355	144	533
Lease liabilities – Laboratory equipment	179	647	-	826
Lease liabilities – Vehicles	19	22	-	41
Loans – Equipment	57	228	43	328
Loan – Building	1,427	5,706	9,391	16,524
Total	**2,468**	**8,380**	**9,737**	**20,585**

Fair value of financial liabilities

The fair value of financial liabilities, calculated on the basis of discounted future cash flow, was €5,402 thousand,€4,427 thousand and €16,825thousand as of December 31, 2017, 2018 and 2019 respectively, using level 3 fair value measurements.

10) Employee benefits

Defined benefit obligations

	Year ended December 31,		
(in thousands of euro)	2017	2018	2019
Allowance for retirement defined benefit	2,255	3,282	3,281
Allowance for seniority awards	366	415	479
Total Defined benefit obligations	**2,621**	**3,697**	**3,760**

French law requires payment of a lump sum retirement indemnity to employees based on years of service and annual compensation at retirement. Benefits do not vest prior to retirement. The Company pays for this defined benefit plan. It is calculated as the present value of estimated future benefits to be paid, applying the projected unit credit method whereby each period of service is seen as giving rise to an additional unit of benefit entitlement, each unit being measured separately to build up the final.

On March 24, 2016, the Company entered into an internal labor agreement with the employees representatives whereby the Company is committed to paying a seniority award after 15 years and 20 years of employment. This award is paid on the anniversary date. A similar award existed for employees having a seniority of 10 years but was not booked due to its insignificant amount. As such, in 2016 the Company recorded a provision for seniority awards and a corresponding charge included in “Personnel costs other than share-based payments” (see Note 14) other than payments in shares. These awards meet the definition of other long-term benefits under IAS 19. This provision is determined by an external actuary firm based on the assumptions disclosed hereafter and amounts to €479 thousand as of December 31, 2019 (€415 thousand as of December 31, 2018).

The main actuarial assumptions used to evaluate retirement benefits are the following:

	Year ended December 31,		
	2017	**2018**	**2019**
Economic assumptions			
Discount rate (iBoxx Corporate AA) for retirement	1.70%	1.80%	1.05%
Annual rate of increase in wages	3.00%	4.50%	3.00%
Demographical assumptions			
Type of retirement	At the initiative of the employee	At the initiative of the employee	At the initiative of the employee
Annual mobility rate	1.6%	2.0%	1.9%
Rate of contributions	45.20%	45.20%	47.07%
Rate of wages costs	23.29%	23.29%	22.54%
Age at retirement			
- Executives (years)	64	64	64
- Non executives (years)	62	62	62
Mortality table	TH-TF 00-02	TH-TF 00-02	TH-TF 00-02
Annual turnover by tranche of age	All personnel	All personnel	All personnel
16-24 years	4.0%	5.0%	5.0%
25-29 years	2.5%	3.0%	3.5%
30-34 years	2.0%	2.5%	2.5%
35-39 years	1.5%	2.0%	2.0%
40-44 years	1.0%	1.5%	1.5%
45-49 years	0.5%	1.0%	1.0%
+50 years	0%	0%	0%

Changes in the projected benefit obligation for the periods presented were as follows (in thousands of euro):

As of January 1, 2017	**2,418**
Service cost	363
Interest costs	36
Actuarial gain	(196)
As of December 31, 2017	**2,621**
Service cost	434
Interest costs	43
Actuarial loss	599
As of December 31, 2018	**3,697**
Service cost	630
Interest costs	55
Actuarial gain	(622)
As of December 31, 2019	**3,760**

There is no asset covering the defined benefit obligations.

An increase/decrease of +/- 50 basis point of the discount rate would result in a decrease/increase of the total benefit obligation of €286 thousand.

In France, pension funds are generally financed by employer and employee contributions and are accounted for as defined contribution plans with the employer contributions recognized as expensed as incurred. They amounted to €982 thousand, €1,277 thousand and €1,375 thousand in the years ended December 31, 2017, 2018 and 2019, respectively.

11) Share capital and share base payments

a) Share capital

The Company manages its capital to ensure that the Company will be able to continue as a going concern while maximizing the return to shareholders through the optimization of the debt and equity balance.

We have never declared or paid any dividends on our ordinary shares. We do not anticipate paying cash dividends on our equity securities in the foreseeable future and intend to retain all available funds and any future earnings for use in the operation and expansion of our business, given our state of development.

As of December 31, 2019, the Company's share capital amounted to €3,941,281.05 divided into (i) 78,811,114 ordinary shares, each with a nominal value of €0.05, (ii) 6,926 "2016" free preferred shares, each with a nominal value of €0.05 and (iii) 7,581 "2017" free preferred shares, each with a nominal value of €0.05, respectively fully paid up.

Share capital does not include BSAs, BSAAR,AGAs and AGAPs that have been granted to certain investors or natural persons, both employees and non-employees of the Company, but not yet exercised.

In October 21, 2019 and December 30, 2019, the retention period for the "2016 free preferred shares" has ended. The number of ordinary shares to which the conversion of one preferred share entitle has been determined according to the fulfilment of the performance criteria. Holders of "2016" preferred shares" are entitled to vote at our shareholders' meetings, to dividends and to preferential subscription rights, on the basis of the number of ordinary shares to which they are entitled if they convert their preferred shares.

The Group issued preferred shares "2017 free preferred shares" which will become convertible into ordinary shares following a vesting period of one year and a retention period of two years if the performance criteria and presence are met at the end of the retention period. The number of ordinary shares to which the conversion of one preferred share will entitle will be determined according to the fulfilment of the performance criteria. During the retention period, holders of the 2017 preferred shares are entitled to vote the general shareholders' meetings, to dividends and to preferential subscription rights, as if they held the same number of ordinary shares as their number of vested 2017 free preferred shares. The 2017 preferred shares are not transferrable during the retention period except under certain circumstances. After the end of the retention period, holders of all of preferred shares that have not yet converted them into our ordinary shares, are entitled to vote at our shareholders' meetings, to dividends and to preferential subscription rights, on the basis of the number of ordinary shares to which they are entitled if they convert their preferred shares.

The table below presents the historical changes in the share capital of the Company as of December 31, 2017, 2018 and 2019:

Date	Nature of the Transactions	Share Capital	Share premium	Number of Common shares	Number of Preferred shares	Nominal value
	Balance as of January 1, 2017	**2,696,065**	**187,571,429**	**53,921,304**	**-**	**€ 0.05**
January 24, 2017	Capital increase by issuance of common shares (exercise of share warrants)	1,948	325,197	38,950	-	0.05
February 10, 2017	Capital increase by issuance of common shares (exercise of share warrants)	2,525	116,495	50,500	-	0.05
June 14, 2017	Capital increase by issuance of common shares (exercise of share warrants)	93	3,682	1,850	-	0.05
July 13, 2017	Contribution in kind in the context of the acquisition of C5aR	167,187	36,999,480	3,343,748	-	0.05
October 21, 2017	Capital increase by issuance of ordinary and preferred shares (definitive acquisition of free shares and free preferred shares)	5,135	(5,135)	98,770	3,931	0.05
December 7, 2017	Subscription of share warrants	-	41,243	-	-	-
December 30, 2017	Capital increase by issuance of ordinary and preferred shares (definitive acquisition of free shares and free preferred shares)	7,399	(7,399)	144,978	3,000	0.05
December 31, 2017	Share based payments	-	9,829,400	-	-	-
	Balance as of December 31, 2017	**2,880,352**	**234,874,392**	**57,600,100**	**6,931**	**€ 0.05**

Date	Nature of the Transactions	Share Capital	Share premium	Number of Common shares	Number of Preferred shares	Nominal value
	Balance as of January 1, 2018	**2,880,352**	**234,874,392**	**57,600,100**	**6,931**	**€ 0.05**
September 20, 2018	Capital increase by issuance of common shares (definitive acquisition of free shares)	1,103	(1,103)	22,055	-	€ 0.05
October 25, 2018	Capital increase by issuance of ordinary shares to AstraZeneca	313,025	62,291,975	6,260,500	-	€ 0.05
October 25, 2018	Share issuance costs	-	(48,078)	-	-	-
November 29, 2018	Capital increase by issuance of common shares (Exercise of shares warrants)	2,500	108,125	50,000	-	€ 0.05
December 31, 2018	Share based payments	-	2,706,910	-	-	-
	Balance as of December 31, 2018	**3,196,979**	**299,932,221**	**63,932,655**	**6,931**	**€ 0.05**

Date	Nature of the Transactions	Share Capital	Share premium	Number of Common shares	Number of Preferred shares	Nominal value
	Balance as of January 1, 2019	**3,196,979**	**299,932,221**	**63,932,655**	**6,931**	**€ 0.05**
February 8, 2019	Capital increase by issuance of common shares (exercise of share warrants)	38	1,493	750	-	€ 0.05
April 18, 2019	Capital increase by issuance of common shares (definitive acquisition of free shares)	5,904	(5,904)	110,500	7,581	€ 0.05
July 5, 2019	Capital increase by issuance of common shares (exercise of share warrants)	1,250	43,000	25,000	-	€ 0.05
July 17, 2019	Capital increase by issuance of common shares (definitive acquisition of free shares)	3,328	(3,328)	66,559	-	€ 0.05
October 21, 2019	Capital increase by issuance of ordinary shares	718,750	66,459,716	14,375,000	-	€ 0.05
October 21, 2019	Share issuance costs	-	(621,121)	-	-	-
October 22, 2019	Capital increase by issuance of common shares (definitive acquisition of free shares)	2,500	(2,500)	50,000	-	€ 0.05
December 31, 2019	Capital increase by issuance of common shares (conversion of preferred shares in common shares)	32	(32)	650	(5)	€ 0.05
December 31, 2019	Capital increase by issuance of common shares (definitive acquisition of free shares)	12,500	(12,500)	250,000	-	€ 0.05
December 31, 2019	Share based payments		3,825,973		-	-
	Balance as of December 31, 2019	**3,941,281**	**369,617,017**	**78,811,114**	**14,507**	**€ 0.05**

(1) Share issuance costs representing incremental expenses directly attributable to the offering of new shares in the IPO on the Nasdaq and in the European Private Placement (together the "Global Offering") were recorded through equity for an amount of €621 thousands. They consist mainly of legal, financial, accounting and printing fees associated with drafting and filing the registration statement of Innate Pharma. The other incremental costs incurred in the Global Offering were expensed for an amount of €2,150 thousands.

Holding by the Company of its own shares

The Company held 18,575 of its own shares as of December 31, 2019.

b) Share based payments

The Company has issued BSAs, BSAARs, stock options, AGAs and AGAPs as follows:

Date	Types	Number of warrants issued as of 12/31/2017	Number of warrants void as of 12/31/2017	Number of warrants exercised as of 12/31/2017	Number of warrants outstanding as of 12/31/2017	Maximum number of shares to be issued as of 12/31/2017	Exercise price per share
Sept. 9, 2011	BSAAR 2011	650,000	-	395,000	255,000	255,000	€ 2.04
May 27, 2013	BSAAR 2012	146,050	-	83,700	62,350	62,350	€ 2.04
July 1, 2015	BSAAR 2015	1,050,382	2,720	1,940	1,045,722	1,045,722	€ 7.20
October 21, 2016	AGAP Management 2016-1	2,000	450	-	1,550	310,000	-
October 21, 2016	AGAP Employees 2016-1	2,486	105	-	2,381	476,200	-
October 21, 2016	AGA Management 2016-1	50,000	-	-	50,000	50,000	-
October 21, 2016	AGA Employees 2016-1	99,932	1,162	98,770	-	-	-
December 30, 2016	AGAP 2016-2	3,000	-	-	3,000	600,000	-
December 30, 2016	AGA Management 2016-2	250,000	-	-	250,000	250,000	-
December 30, 2016	AGA Employees 2016-2	149,943	4,965	144,978	-	-	-
September 20, 2017	AGA Bonus 2017	28,556	3,577	-	24,979	24,979	-
July 29, 2011	BSA 2011	225,000	-	120,560	104,440	104,440	€ 1.77
July 17, 2013	BSA 2013	237,500	-	153,640	83,860	83,860	€ 2.36
July 16, 2014	BSA 2014	150,000	-	75,000	75,000	75,000	€ 8.65
April 27, 2015	BSA 2015-1	70,000	-	-	70,000	70,000	€ 9.59
July 1, 2015	BSA 2015-2	14,200	-	-	14,200	14,200	€ 14.05
September 20, 2017	BSA 2017	37,000	-	-	37,000	37,000	€ 11.00
	Total	**3,166,049**	**12,979**	**1,073,588**	**2,079,482**	**3,458,751**	

Date	Types	Number of warrants issued as of 12/31/2018	Number of warrants void as of 12/31/2018	Number of warrants exercised as of 12/31/2018	Number of warrants outstanding as of 12/31/2018	Maximum number of shares to be issued as of 12/31/2018		Exercise price per share
Sept. 9, 2011	BSAAR 2011	650,000	-	395,000	255,000	255,000	€	2.04
May 27, 2013	BSAAR 2012	146,050	-	83,700	62,350	62,350	€	2.04
July 1, 2015	BSAAR 2015	1,050,382	2,720	1,940	1,045,722	1,045,722	€	7.20
October 21, 2016	AGAP Management 2016-1	2,000	450	-	1,550	310,000		-
October 21, 2016	AGAP Employees 2016-1	2,486	179	-	2,307	461,400		-
October 21, 2016	AGA Management 2016-1	50,000	-	-	50,000	50,000		-
October 21, 2016	AGA Employees 2016-1	99,932	1,162	98,770	-	-		-
December 30, 2016	AGAP 2016-2	3,000	-	-	3,000	600,000		-
December 30, 2016	AGA Management 2016-2	250,000	-	-	250,000	250,000		-
December 30, 2016	AGA Employees 2016-2	149,943	4,965	144,978	-	-		-
September 20, 2017	AGA Bonus 2017	28,556	6,501	22,055	-	-		-
April 3,2018	AGAP Employees 2017	5,725	144	-	5,581	558,100		-
April 3,2018	AGAP Management 2017	2,400	400	-	2,000	200,000		-
April 3,2018	AGA Employees 2017	114,500	4,000	-	110,500	110,500		-
July 3, 2018	AGA Bonus Management 2018	67,028	-	-	67,028	67,028		-
November 20, 2018	AGA Perf Employees 2018	327,500	-	-	327,500	327,500		-
November 20, 2018	AGA Perf Management 2018	260,000	30,000	-	230,000	230,000		-
July 29, 2011	BSA 2011	225,000	-	133,060	91,940	91,940	€	1.77
July 17, 2013	BSA 2013	237,500	-	191,140	46,360	46,360	€	2.36
July 16, 2014	BSA 2014	150,000	-	75,000	75,000	75,000	€	8.65
April 27, 2015	BSA 2015-1	70,000	-	-	70,000	70,000	€	9.59
July 1, 2015	BSA 2015-2	14 200	-	-	14,200	14,200	€	14.05
September 20, 2017	BSA 2017	37,000	-	-	37,000	37,000	€	11.00
	Total	**3,943,202**	**50,521**	**1,145,643**	**2,747,038**	**4,862,100**		

Date	Types	Number of warrants issued as of 12/31/2019	Number of warrants void as of 12/31/2019	Number of warrants exercised as of 12/31/2019	Number of warrants outstanding as of 12/31/2019	Maximum number of shares to be issued as of 12/31/2019	Exercise price per share (in €)
Sept. 9, 2011	BSAAR 2011	650,000	-	395,000	255,000	255,000	€ 2.04
May 27, 2013	BSAAR 2012	146,050	-	84,450	61,600	61,600	€ 2.04
July 1, 2015	BSAAR 2015	1,050,382	2,720	1,940	1,045,722	1,045,722	€ 7.20
October 21, 2016	AGAP Management 2016-1	2,000	550	-	1,450	188,500	-
October 21, 2016	AGAP Employees 2016-1	2,486	251	5	2,230	289,900	-
October 21, 2016	AGA Management 2016-1	50,000	-	50,000	-	-	-
December 30, 2016	AGAP Management 2016-2	3,000	-	-	3,000	333,000	-
December 30, 2016	AGA Management 2016-2	250,000	-	250,000	-	-	-
April 3,2018	AGAP Employees 2017-1	5,725	386	-	5,339	533,900	-
April 3,2018	AGAP Management 2017-1	2,400	400	-	2,000	200,000	-
April 3,2018	AGA Employees 2017	114,500	4,000	110,500	-	-	-
July 3, 2018	AGA Bonus 2018-1	67,028	469	66,559	-	-	-
November 20, 2018	AGAP Perf Employees 2018-1	327,500	20,000	-	307,500	307,500	-
November 20, 2018	AGAP Perf Management 2018-1	260,000	30,000	-	230,000	230,000	-
January 14, 2019	AGA Employees 2018	90,650	5,000	-	85,650	85,650	-
April 29, 2019	AGA New Members 2017-1	25,000	-	-	25,000	25,000	-
July 3, 2019	AGA Bonus 2019-1	57,376	-	-	57,376	57,376	-
November 4, 2019	AGAP 2019 Employees 2019	546,700	13,900	-	532,800	532,800	-
November 4, 2019	AGAP 2019 Management 2019	355,000	-	-	355,000	355,000	-
July 29, 2011	BSA 2011-2	225,000	-	158,060	66,940	66,940	€ 1.77
July 17, 2013	BSA 2013	237,500	-	191,140	46,360	46,360	€ 2.36
July 16, 2014	BSA 2014	150,000	-	75,000	75,000	75,000	€ 8.65
April 27, 2015	BSA 2015-1	70,000	-	-	70,000	70,000	€ 9.59
July 1, 2015	BSA 2015-2	14,200	-	-	14,200	14,200	€ 14.05
September 20, 2017	BSA 2017	37,000	-	-	37,000	37,000	€ 11.00
	Total	**4,739,497**	**77,676**	**1,382,654**	**3,279,167**	**4,810,448**	

AGA

Details of AGA

	AGAP Management 2016-1	AGAP Employees 2016-1	AGA Management 2016-1	AGA Employees 2016-1	AGAP Management 2016-2
Date of grant (Board of Directors)	October 21, 2016	October 21, 2016	October 21, 2016	October 21, 2016	October 21, 2016
Vesting period (years)	1	1	3	1	1
Non transferability period	2 years after vesting period end	2 years after vesting period end	None	2 years after vesting period end	2 years after vesting period end
Number of free shares granted	2,000	2,486	50,000	99,932	3,000
Share entitlement per free share	130 (1)	130 (1)	1	1	111 (2)
Grant date share fair value	€ 10.87	€ 10.87	€ 10.87	€ 10.87	€ 12.73
Expected dividends	None	None	None	None	None
Performance conditions	Yes	Yes	None	None	Yes
Expected turnover (yearly basis)	5%	5%	-	5%	9%
Volatility	40%	40%	-	-	40%
Fair value per AGA	€ 911	€ 911	€ 10.55	€ 10.55	€ 956

In October 21, 2019 and December 30, 2019, the retention period for the “2016 free preferred shares” has ended. The number of ordinary shares to which the conversion of one preferred share entitle has been determined according to the fulfilment of the performance criteria. Holders of “2016” preferred shares” are entitled to vote at our shareholders’ meetings, to dividends and to preferential subscription rights, on the basis of the number of ordinary shares to which they are entitled if they convert their preferred shares.

	AGA Management 2016-2	AGA Employees 2016-2	AGA Bonus 2017	AGA Employee 2017	AGAP Employees 2017
Date of grant (Board of Directors)	December 30, 2016	December 30, 2016	September 20, 2017	April 3, 2018	April 3, 2018
Vesting period (years)	3	1	1	1	1
Non transferability period	None	2 years after vesting period end	1 year	1 year after vesting period	2 years after vesting period end
Number of free shares granted	250,000	149,943	28,556	114,500	5,725
Share entitlement per free share	1	1	1	1	100
Grant date share fair value	€ 12,73	€ 12,73	€ 10,90	€ 5,52	€ 5,52
Expected dividends	None	None	None	None	None
Performance conditions	None	None	Yes	None	Yes
Expected turnover (yearly basis)	-	5%	-	3,70%	5%
Volatility	-	-	-	55%	55%
Fair value per AGA	€ 14.61	€ 10.55	€ 10.30	€ 5.83	€ 90

	AGAP Management 2017	AGA Bonus 2018	AGA Perf Employees 2018	AGA Perf Management 2018	AGA New Members 2017-1
Date of grant (Board of Directors)	April 3,2018	July 3, 2018	November 20, 2018	November 20, 2018	April 29, 2019
Vesting period (years)	1	1	3	3	3
Non transferability period	2 years after vesting period end	1 year after vesting period	None	None	None
Number of free shares granted	2,400	67,028	327,500	260,000	25,000
Share entitlement per free share	100	1	1	1	1
Grant date share fair value	€ 5.52	€ 5.06	€ 8.00	€ 8.00	€ 5.74
Expected dividends	None	None	None	None	None
Performance conditions	Yes	Yes	Yes	Yes	No
Expected turnover (yearly basis)	11%	-	4%	10%	10%
Volatility	55%	-	45%	45%	-
Fair value per AGA	€ 90	€ 4.69	€ 3.81	€ 3.81	€ 5.74

	AGA Employees 2018	AGA Bonus 2019-1	AGA Perf Employees 2019	AGA Perf Management 2019
Date of grant (Board of Directors)	January 14, 2019	July 3, 2019	November 4, 2019	November 4, 2019
Vesting period (years)	1	1	3	3
Non transferability period	1 year	1 year after vesting period	None	None
Number of free shares granted	90,650	57,376	546,700	355,000
Share entitlement per free share	1	1	1	1
Grant date share fair value	€ 7.31	€ 5.90	€ 3.13	€ 3.13
Expected dividends	None	None	None	None
Performance conditions	No	No	Yes	Yes
Expected turnover (yearly basis)	4.03%	-	10%	10%
Volatility	N/A	-	45%	45%
Fair value per AGA	€ 7.31	€ 5.72	€ 3.13	€ 3.13

Change in Number of AGAs Outstanding

	Year ended December 31,		
Number of AGAs	2017	2018	2019
Balance at beginning of period	**557,361**	**331,910**	**1,049,466**
Granted during the period	28,556	777,153	1,074,726
Forfeited during the period	(3,577)	(37,542)	(39,783)
Exercised during the period	(243,748)	(22,055)	(477,064)
Expired during the period	(6,682)	-	-
Balance at end of period	**331,910**	**1,049,466**	**1,607,345**

Breakdown of the Closing Balance

	Year ended December 31,		
	2017	2018	2019
Number of AGAs	**Outstanding**	**Outstanding**	**Outstanding**
AGAP Management 2016-1	1,550	1,550	1,450
AGAP Employees 2016-1	2,381	2,307	2,230
AGA Management 2016-1	50,000	50,000	-
AGAP 2016-2	3,000	3,000	3,000
AGA Management 2016-2	250,000	250,000	-
AGA Bonus 2017	24,979	-	-
AGA Employees 2017	-	110,500	-
AGAP Employees 2017	-	5,581	5,339
AGAP Management 2017	-	2,000	2,000
AGA Bonus 2018	-	67,028	-
AGAP Perf Employees 2018	-	327,500	307,500
AGAP Perf Management 2018	-	230,000	230,000
AGA Employees 2018	-	-	85,650
AGA New Members 2017-1	-	-	25,000
AGA Bonus 2019-1	-	-	57,376
AGA Perf Employees 2019-1	-	-	532,800
AGA Perf Management 2019-1	-	-	355,000
TOTAL	**331,910**	**1,049,466**	**1,607,345**

The fair value of granted free shares is based on the closing price of the Company's share at grant date, reduced when necessary by an estimated turn-over rate. This estimated fair value is recognized as operating expenses on a straight-line basis over the vesting period.

The fair value of granted free shares is based on the closing price of the Company's share at grant date, reduced when necessary by an estimated turn-over rate. This estimated fair value is recognized as operating expenses on a straight-line basis over the vesting period.

AGA Management 2016-1 / AGA Management 2016-2 / AGA Employees 2016-1 / AGA Employees 2016-2

Expenses related to those plans were €4,383 thousand, €1,392 thousand and €1,351 thousand for the financial years ended December 31, 2017, 2018 and 2019, respectively.

AGA 2017-1 (Employees)

Expenses were €456 thousand €52152 thousand for the financial year ended December 31, 2018 and 2019, respectively.

Free preferred shares convertible into ordinary shares: AGAP Management 2016-1 / AGAP Employees 2016-1 / AGAP Management 2016-2 / AGAP Management 2017 / AGAP Employees 2017

AGAP Management 2016-1, 2016-2 and AGAP Employees 2016-1 are subject to internal and share price conditions. AGAP Management 2017-1 and AGAP Employees 2017-1 are subject to share value condition.

The fair value of these free preferred shares is based on a third-party valuation report. The valuation method used to estimate the fair value of these free preferred shares is presented below:

- Estimation of the expectation of gain associated with internal and share price conditions, made on the basis of a Capital Asset Pricing ("CAPM") model of the share price using a Monte Carlo approach;
- Adjustment of the estimation by applying expected turnover rates;

Changes in internal conditions are taken into account in the revision of the estimated number of free shares expected to vest during the vesting period.

The Company has recognized an expense over a period of one year on a straight-line basis, this period being the vesting period. Expenses were €5,327 thousand, €567 thousand and €252 thousand for the financial year ended December 31, 2017, 2018 and 2019, respectively.

AGA Bonus 2017 and AGA Bonus 2018

AGA Bonus 2017, and 2018 were granted to the Executive members Committee who opted for these compensation plans. For each recipient, the number of shares definitely acquired is equal to the cash equivalent of 50% of the annual variable compensation increased by a 30% premium. In the event of an over-performance (i.e. achieved target above 100%), the surplus is paid in cash.

Expenses were €189 thousand, €208 thousand and €190 thousand for the financial years ended December 31, 2017, 2018 and 2019, respectively.

Free performance shares 2018 (AGA Perf Employees 2018 and AGA Perf Management 2018)

Free performance shares granted in 2018 are subject to share price conditions and a vesting kicker triggered by the performance of an internal condition, which is the success of certain clinical trials.

The fair value of these free performance shares is based on a third-party valuation report. The valuation method used to estimate the fair value of these free performance shares is presented below:

- Estimation of the expectation of gain associated with internal and share price conditions, made on the basis of a CAPM model of the share price using a Monte Carlo approach;
- Adjustment of the estimation by applying expected turnover rates.

Changes in internal conditions are taken into account in the revision of the estimated number of free performance shares expected to vest during the vesting period.

Expenses were €84 thousand and €782 thousand the financial year ended 31, 2018 and 2019, respectively

AGA 2018-1 (Employees)

Expenses were €579 thousand for the financial year ended December 31, 2019.

AGA 2017-1 Management (New Members)

Expenses were €29 thousand for the financial year ended December 31, 2019.

Free performance shares 2019 (AGA Perf Employees 2019-1 / AGA Perf Management 2019)

Free performance shares granted in 2019 are subject to share price conditions and a vesting kicker triggered by the performance of an internal condition, which is Lumoxiti's market penetration rate in the United States.

The fair value of these free performance shares is based on a third-party valuation report. The valuation method used to estimate the fair value of these free performance shares is presented below:

- Estimation of the expectation of gain associated with internal and share price conditions, made on the basis of a CAPM model of the share price using a Monte Carlo approach;
- Adjustment of the estimation by applying expected turnover rates.

Expenses were €152 thousand for the financial year ended December 31, 2019.

AGA Bonus 2019-1

AGA Bonus 2019 were granted to the Executive members Committee who opted for these compensation plans. For each recipient, the number of shares definitely acquired is equal to the cash equivalent of 50% of the annual variable compensation increased by a 30% premium. In the event of an over-performance (i.e. achieved target above 100%), the surplus is paid in cash.

Expenses were €339 thousand for the financial year ended December 31, 2019.

BSA

Details of BSA

	BSA 2013	BSA 2014	BSA 2015-1	BSA 2015-2	BSA 2017
Date of grant (Board of directors)	July 17, 2013	July 16, 2014	April 27, 2015	July 1, 2015	September 20, 2017
Vesting period (years)	2	2	2	2	2
Plan expiration date	July 17, 2023	July 16, 2024	April 26, 2025	June 30, 2025	September 20, 2027
Number of BSA granted	237,500	150,000	70,000	14,200	37,000
Share entitlement per BSA	1	1	1	1	1
Exercise price	€ 2.36	€ 8.65	€ 9.59	€ 14.05	€ 11.00
Valuation method used	Black & Scholes	Black & Scholes	Black & Scholes	Black & Scholes	Black & Scholes
Grant date share fair value	€ 2.45	€ 6.85	€ 13.65	€ 13.64	€ 10.41
Expected volatility	31.83%	46.72%	54.08%	47.83%	61.74%
Average life of BSA (years)	5.5	5.5	5.5	5.5	6
Risk-free interest rate	2.42%	1.00%	0.25%	0.25%	0.20%
Expected dividends	None	None	None	None	None
Performance conditions	None	None	None	None	None
Fair value per BSA	€ 0.87	€ 2.51	€ 6.59	€ 4.73	€ 0.57

Change in Number of BSA Outstanding

	Year ended December 31,		
Number of BSA	**2017**	**2018**	**2019**
Balance at beginning of period	**435,700**	**384,500**	**334,500**
Granted during the period	37,000	-	-
Forfeited during the period	-	-	-
Exercised during the period	(88,200)	(50,000)	(25,000)
Expired during the period	-	-	-
Balance at end of period	**384,500**	**334,500**	**309,500**

Breakdown of the Closing Balance

	Year ended December 31,					
	2017		**2018**		**2019**	
Number of BSA	**Outstanding**	**Exercisable**	**Outstanding**	**Exercisable**	**Outstanding**	**Exercisable**
BSA 2011-2	104,440	104,440	91,940	91,940	66,940	66,940
BSA 2013	83,860	83,860	46,360	46,360	46,360	46,360
BSA 2014	75,000	75,000	75,000	75,000	75,000	75,000
BSA 2015-1	70,000	70,000	70,000	70,000	70,000	70,000
BSA 2015-2	14,200	14,200	14,200	14,200	14,200	14,200
BSA 2017	37,000	37,000	37,000	37,000	37,000	37,000
TOTAL	**384,500**	**384,500**	**334,500**	**334,500**	**309,500**	**309,500**

BSAAR

BSAAR are securities whose subscription price and exercise price are fixed at their fair value as determined by an expert. The BSAAR subscription therefore represents an investment on the part of the beneficiary. At the end of the exercise period, if they have not been exercised, the BSAAR becomes void. The Company benefits from a clause called «forcing» making it possible to encourage holders to exercise their redeemable equity warrants when the market price exceeds the exercise price and reaches a threshold defined in the BSAAR issuance agreement. The Company may, then, subject to a time period for notifying holders that will permit them to exercise the BSAAR, decide to reimburse the warrants not exercised at a unit price equal to the BSAAR acquisition price paid by its holder.

Details of BSAAR

BSAAR. The methodology used to estimate the fair value of the BSAAR is similar to the one used to estimate the fair value of the BSA, except for the following:

Expected Term. Unlike the BSA, the Company does not have sufficient historical experience for the BSAAR. Consequently, the expected term used for the valuation of the fair value is the legal maturity of the instrument (10 years).

No share-based payment compensation expense was recognized relating to the BSAAR since the amount paid by the beneficiaries is equal to the fair value.

		BSAAR 2015
Date of grant (Board of directors)		July 1, 2015
Vesting period (years)		2
Plan expiration date		June 30, 2025
Number of BSAAR granted		1,050,382
Share entitlement per BSAAR		1
Exercise price	€	7.20
Valuation method used		Black & Scholes
Grant date share fair value	€	13.77
Expected volatility		41%
Average life of BSAAR		10
Risk-free interest rate		1.22%
Expected dividends		None
Performance conditions		No
Fair value per BSA	€	1.15

Change in Number of BSAAR Outstanding

	Year ended December 31,		
Number of BSAAR	**2017**	**2018**	**2019**
Balance at beginning of period	**1,366,172**	**1,363,072**	**1,363,072**
Granted during the period	-	-	-
Forfeited during the period	-	-	-
Exercised during the period	(3,100)	-	(750)
Expired during the period	-	-	-
Balance at end of period	**1,363,072**	**1,363,072**	**1,362,322**

Breakdown of the Closing Balance

	Year ended December 31,					
	2017		2018		2019	
Number of BSAAR	Outstanding	Exercisable	Outstanding	Exercisable	Outstanding	Exercisable
BSAAR 2011	255,000	255,000	255,000	255,000	255,000	255,000
BSAAR 2012	62,350	62,350	62,350	62,350	61,600	61,600
BSAAR 2015	1,045,722	1,045,722	1,045,722	1,045,722	1,045,722	1,045,722
TOTAL	**1,363,072**	**1,363,072**	**1,363,072**	**1,363,072**	**1,362,322**	**1,362,322**

Breakdown of expenses per financial year

The share-based compensation expenses are broken down as follows (in thousands of euro):

	Year ended December 31,		
(in thousands of euro)	2017	2018	2019
BSA 2017	21	-	-
AGA Employees 2016-1&2	2,990	-	-
AGA Management 2016-1&2	1,393	1,392	1,351
AGAP Management 2016-1&2 / AGAP Employees 2016-1	5,237	-	-
AGA Employees 2017	-	456	152
AGAP Management 2017 / AGAP Employees 2017	-	567	252
AGA Bonus 2017 / AGA Bonus 2018	189	208	190
AGA Perf Management 2018 / AGA Perf Employees 2018	-	84	782
AGA 2018-1 Employees	-	-	579
AGA 2017-1 Management (New Members)	-	-	29
AGAP Employee 2019 / AGAP Management 2019	-	-	152
AGA Bonus 2019-1	-	-	338
Share based compensation	**9,830**	**2,707**	**3,826**

As of December 31, 2019, employers' social security contributions relating to free shares were paid for an amount of €569 thousand (€68 thousand for the year ended December 31, 2018).

12) Financial instruments recognized in the statement of financial position and related effect on the income statement

The following tables show the carrying amounts and fair values of financial assets and financial liabilities. The tables do not include fair value information for financial assets and financial liabilities not measured at fair value if the carrying amount is a reasonable approximation of fair value.

As of December 31, 2017 (in thousands of euro)	Book value on the statement of financial position	Fair value through profit and loss [1]	Fair value through comprehensive income (loss)[2]	Receivables	Fair value
Financial assets					
Non-current financial assets	60,469	26,030	32,392	2,046	60,469
Trade receivables and others	21,412	-	-	21,412	21,412
Short-term investments	16,743	-	16,743	-	16,743
Cash and cash equivalents	99,367	99,367	-	-	99,367
Total financial assets	**197,991**	**125,397**	**49,135**	**23,458**	**197,991**

As of December 31, 2017 (in thousands of euro)	Book value on the statement of financial position	Fair value through profit and loss [1]	Fair value through comprehensive income (loss)[2]	Debt at amortized Cost [3]	Fair value
Financial liabilities					
Financial liabilities—non-current portion	4,521	-	-	4,521	4,521
Financial liabilities—current portion	1,343	-	-	1,343	1,343
Trade payables and others	24,657	-	-	24,657	24,657
Total financial liabilities	**30,521**	**-**	**-**	**30,521**	**30,521**

As of December 31, 2018 (in thousands of euro)	Book value on the statement of financial position	Fair value through profit and loss[1]	Receivables	Fair value
Financial assets				
Non-current financial assets	35,181	33,138	2,043	35,181
Trade receivables and others	152,112	-	152,112	152,112
Short-term investments	15,217	15,217	-	15,217
Cash and cash equivalents	152,314	152,314	-	152,314
Total financial assets	**354,824**	**200,669**	**154,155**	**354,824**

As of December 31, 2018 (in thousands of euro)	Book value on the statement of financial position	Fair value through profit and loss[1]	Debt at amortized Cost [3]	Fair value
Financial liabilities				
Financial liabilities—non-current portion	3,175	-	3,175	3,175
Financial liabilities—current portion	1,347	-	1,347	1,347
Trade payables and others	91,655	-	91,655	91,655
Total financial liabilities	**96,175**	**-**	**96,175**	**96,175**

As of December 31, 2019 (in thousands of euro)	Book value on the statement of financial position	Fair value through profit and loss[1]	Receivables	Fair value
Financial assets				
Non-current financial assets	37,005	37,005	-	37,005
Trade receivables and others	35,477	-	35,477	35,477
Short-term investments	15,978	15,978	-	15,978
Cash and cash equivalents	202,887	202,887	-	202,887
Total financial assets	**291,347**	**255,869**	**35,477**	**291,347**

As of December 31, 2019 (in thousands of euro)	Book value on the statement of financial position	Fair value through profit and loss[1]	Debt at amortized Cost [3]	Fair value
Financial liabilities				
Financial liabilities—non-current portion	16,593	-	16,593	16,593
Financial liabilities—current portion	2,130	-	2,130	2,130
Trade payables and others	49,504	-	49,504	49,504
Total financial liabilities	**68,227**	**-**	**68,227**	**68,227**

_____

(1) The fair value of financial assets classified as fair value through profit and loss corresponds to the market value of the assets, which are primarily determined using level 2 measurements.

(2) The fair value of financial assets classified as fair value through comprehensive income corresponds to the market value of the assets, which are primarily determined using level 1 measurements.

(3) The book amount of financial assets and liabilities measured at amortized cost was deemed to be a reasonable estimation of fair value.

In accordance with the amendments to IFRS 7, financial instruments are presented in three categories based on a hierarchy of methods used to determine fair value:

Level 1: fair value determined based on quoted prices in active markets for assets or liabilities;

Level 2: fair value determined on the observable database for the asset or liability concerned either directly or indirectly;

Level 3: fair value determined on the basis of evaluation techniques based in whole or in part on unobservable data.

13) Revenue and government financing for research expenditures

Revenue from collaboration and licensing agreements

The Company's revenue from collaboration and licensing agreements amounts to €32,631 thousand, €79,892 and €68,974 thousands for the fiscal year ended December 31, 2017, 2018 and 2019, respectively.

	Year ended December 31,		
(in thousands of euro)	**2017**	**2018[1]**	**2019**
Proceeds from collaboration and licensing agreements	32,346	77,178	61,356
of which monalizumab agreement	*32,346*	*61,546*	*42,541*
of which IPH5201 agreement	-	*15,632*	*18,816*
Invoicing of research and development costs (IPH5201 and avdoralimab agreements)	-	2,242	6,949
Exchange gains on collaboration agreement	272	465	658
Others	13	7	10
Revenue from collaboration and licensing agreements	**32,631**	**79,892**	**68,974**

(1) The impact of the application of the IFRS 15 standard is presented in Note 2.d.

a) Revenue recognition related to monalizumab AstraZeneca agreements and amendments

The Company identified the following promises under the monalizumab AstraZeneca agreements and amendments: (1) a non-exclusive license related to monalizumab restricted to two applications, with an option for an exclusive license related to monalizumab including all applications, (2) the performance of certain initial studies related to phases I/II trials, and participation in certain studies of phases I/II trials and phase III clinical trials through a co-financing.

The Company considered the license has a standalone functionality and is capable of being distinct. However the Company determined that the license is not distinct from the performance of initial studies and participation to phase III clinical trials because they increased the utility of the licensed IP. Thus, the licensed IP, the performance of initial studies and participation to phase III clinical trials are combined into a single performance obligation.

This performance obligation was considered as satisfied over time as AstraZeneca controls the licensed IP which is being enhanced during the agreement. The revenue is recognized over time, based on the input method (costs incurred). As a result, the Company recognizes the price of the transaction as a revenue on the basis of the progress of studies that the Company has undertaken to carry out under the agreement. Progression is assessed following to actual costs incurred relative to the total budgeted costs to fulfill the obligation.

The transaction price was initially estimated to the initial payment of $250,000 thousand, less the amounts that the Company expected to pay to AstraZeneca for co-financing Phase I/II clinical studies. The additional payment of $100,000 thousand triggered by AstraZeneca's exercise of the exclusivity option was treated as a change in the price estimate of the transaction. In addition, the amendment of the contract, which modified the scope and budget of the studies to be carried out by the Company as well as the arrangements for sharing the cost of the other studies, led to a revision of the degree of progress and the price of the transaction. Thus, the exercise of the option and the amendment of the contract resulted in the recognition of a favorable cumulative adjustment of €38,321 thousand in revenue for the year ended December 31, 2019.

The subsequent milestones and potential royalty payments are excluded from the transaction price due to the uncertainties of clinical trials results.

The Company used the most likely amount to determine variable consideration. Variable consideration for cost-sharing payments related to certain studies of phases I/II trials and phase III clinical trials when applicable are included in the transaction price.

The Company and AstraZeneca make quarterly cost-sharing payments to one another in amounts necessary to ensure that each party bears its contractual share of the overall shared development costs incurred. Costs incurred by the Company related to agreed-upon services under the agreement are recorded as research and development expenses in its consolidated statements of financial income (loss). The Company accounts for cost sharing payments from AstraZeneca as increase in revenue in its consolidated statements of income (loss), while cost sharing payments to AstraZeneca are recorded as payments to customer which reduce the transaction price recorded as revenue from the collaboration agreement. As described in Note 2. d, the expected payments to AstraZeneca are classified as collaboration liability in the consolidated statement of financial position. Quarterly invoices received from AstraZeneca reduce the collaboration liability and have no impact on the consolidated statement of income.

Change in monalizumab deferred revenue (in thousands of euro):

As of December 31, 2016	**167,260**
Revenue for the 2017 financial year	(32,346)
As of December 31, 2017	**134,914**
Restatement related to the first application of IFRS 15	(53,083)
As of January 1, 2018 restated	**81,831**
Revenue for the 2018 financial year[(1)]	(61,546)
Increase in deferred revenue resulting from the exercise of the $100M option[(2)]	85,357
Transfer from collaboration liabilities	(717)
As of December 31, 2018	**104,925**
Revenue for the 2019 financial year[(3)]	(42,541)
Transfer from collaboration liabilities	273
As of December 31, 2019	**62,657**

(1) The impact of the exercise of the option on 2018 revenue amounted to €31,966 thousand.
(2) The exercise of the $100,000 thousand option was converted to €87,002 thousand, of which €85,357 thousand was recognized as deferred revenue and €1,644 thousand recognized in collaboration liabilities.
(3) The impact of the exercise of the option on 2019 revenue amounted to €6,355 thousand.

Change in monalizumab collaboration liabilities (in thousands of euro):

As of December 31, 2017	**-**
Restatement related to the first application of IFRS 15	44,751
As of January 1, 2018 restated	**44,751**
Additions	-
Deductions	(13,095)
As of December 31, 2018[(1)]	**31,656**
Additions	-
Deductions	(10,352)
As of December 31, 2019[(2)]	**21,304**

———

(1) Of which €20,987 thousand of current portion and €10,669 of non-current portion.
(2) Of which €21,304 thousand of current portion.

b) Revenue recognition related to IPH5201 AstraZeneca collaboration and option agreement

The Company determined that IPH5201 AstraZeneca collaboration and option agreement is an enforceable contract under IFRS 15 as the upfront payment is non-refundable and thus AstraZeneca will incur significant loss if it doesn't exercise its licensed option. The Company considered that the exercise price of the option granted to AstraZeneca for an exclusive license is a variable consideration.

The Company identified the following promises under the IPH5201 AstraZeneca collaboration and option agreement: (1) an option for an exclusive license related to IPH5201 and (2) the performance of research and development services in conformity with the defined development plan for preclinical studies. The Company determined that the option is not distinct from the performance of research and development services because they increased the utility of the licensed IP. Thus, the option and the performance of research and development services are combined into a single performance obligation.

The transaction price was initially estimated to the initial upfront payment of $50,000 thousand (received in October 2018 for $26,000 thousand and in January 2019 for $24,000 thousand) and estimated quarterly payment received in relation to costs incurred by the Company for preclinical studies. Development and commercial milestones and potential royalties payments were excluded from the transaction price due to uncertainties.

The performance obligation was considered as satisfied over time as the IP in development has no alternate use for the Company as it is an exclusive license and that the Company has an enforceable right to payment for completed research and development services.

The Company applied the input method and recognized the price of the transaction as a revenue percentage of completion of the costs of the preclinical studies.

Change in IPH5201 deferred revenue (in thousands of euro):

The variance of the deferred revenue relating to this agreement is presented in the following schedule (in thousands of euro):

As of December 31, 2017	**-**
Upfront payment	43,501
Revenue for the 2018 financial year	(15,632)
As of December 31, 2018	**27,869**
Revenue for the 2019 financial year	(18,816)
As of December 31, 2019	**9,053**

c) Revenue related to collaboration and option agreement related to four to-be-agreed upon molecules (preclinical molecules)

The Company determined that the option to acquire an exclusive license provides a material right to AstraZeneca that it would not receive without entering into that contract. The Company will recognize revenue when those future goods or services are transferred or when the option expires. Thus, the upfront payment is recorded as a deferred revenue for an amount of €17,400 thousand as of December 31, 2019.

d) Revenue recognition related to avdoralimab AstraZeneca agreement

The Company recognized revenue as research and development expenses are incurred (see Note 1.1.e for agreement description).

e) Schedule of variance of deferred revenue

The variance of the global deferred revenue is presented in the following schedule:

(in thousands of euro)	**Monalizumab**
December 31, 2016	**167,261**
Revenue from the 2017 financial year	(32,346)
December 31, 2017	**134,914** [(1)]

(in thousands of euro)	**December 31, 2017 as published**	**Impact IFRS 15**	**January 1, 2018 as restated**	**Proceeds**	**Recognition in P&L**	**Transfer from collaboration liabilities**	**December 31, 2018**
Monalizumab	134,914	(53,083)	**81,831**	85,358	(61,548)	(715)	**104,925**
IPH5201	-	-	**-**	43,501	(15,632)	-	**27,869**
Preclinical molecules	-	-	**-**	17,400	-	-	**17,400**
Total	**134,914** [(1)]	**(53,083)**	**81,831**	**146,259**	**(77,180)**	**(715)**	**150,195** [(2)]

(1) Of which €47,909 thousand of current deferred revenue and €87,005 thousand of non-current deferred revenue.
(2) Of which €82,096 thousand of current deferred revenue and €68,098 thousand of non-current deferred revenue.

(in thousands of euro)	December 31, 2018	Recognition in P&L	Transfer from collaboration liabilities	December 31, 2019
Monalizumab	104,925	(42,541)	273	62,657
IPH5201	27,869	(18,816)	-	9,054
Preclinical molecules	17,400	-	-	17,400
Total	**150,195**	**(61,356)**	**273**	**89,112** [3]

(3) Of which €48,770 thousand of current deferred revenue and €40,342 thousand of non-current deferred revenue.

f) Government financing for research expenditures

The Company receives grants from the European Commission and the French government and state organizations in several different forms:

- Investment and operating grants; and
- Research Tax Credits.

The total amount for government financing for research expenditures recorded as other income in the income statement can be analyzed as follows:

	Year ended December 31,		
(in thousands of euro)	2017	2018	2019
Research Tax Credit	11,041	13,527	16,737
Grant	361	533	103
Government financing for research expenditures	**11,402**	**14,060**	**16,840**

14) Operating expenses

(in thousands of euro)	Year ended December 31,								
	2017			2018			2019		
	R&D	SG&A	Total	R&D	SG&A	Total	R&D	SG&A	Total
Subcontracting costs[1]	(37,996)	-	**(37,996)**	(42,327)	-	**(42,327)**	(41,193)	-	**(41,193)**
Cost of supplies and consumable materials	(4,287)	-	**(4,287)**	(3,819)	-	**(3,819)**	(3,208)	-	**(3,208)**
Personnel expenses other than share-based compensation	(10,995)	(4,168)	**(15,163)**	(13,520)	(5,601)	**(19,121)**	(14,891)	(7,747)	**(22,638)**
Share-based compensation	(3,697)	(6,288)	**(9,985)**	(706)	(2,000)	**(2,706)**	(1,001)	(2,825)	**(3,826)**
Personnel expenses	*(14,692)*	*(10,456)*	***(25,148)***	*(14,226)*	*(7,601)*	***(21,827)***	*(15,892)*	*(10,572)*	***(26,464)***
Non-scientific advisory and consulting[2]	(563)	(3,794)	**(4,357)**	-	(5,301)	**(5,301)**	(272)	(8384)	**(8,655)**
Leasing and maintenance	(1,235)	(546)	**(1,781)**	(887)	(1,081)	**(1,968)**	(846)	(1,026)	**(1,872)**
Travel expenses and meeting attendance	(1,019)	(275)	**(1,294)**	(564)	(428)	**(992)**	(709)	(1,044)	**(1,754)**
Marketing, communication and public relations	(122)	(527)	**(649)**	(119)	(399)	**(518)**	(95)	(534)	**(629)**
Scientific advisory and consulting[3]	(844)	(1)	**(845)**	(349)	-	**(349)**	(223)	-	**(223)**
Other purchases and external expenses	(228)	(459)	**(687)**	26	(337)	**(311)**	(57)	(757)	**(814)**
Depreciation and amortization	(4,068)	(328)	**(4,396)**	(6,709)	(693)	**(7,402)**	(15,518)	(1,013)	**(16,530)**
Intellectual property expenses	(1,499)	-	**(1,499)**	(294)	(1,087)	**(1,381)**	(653)	(932)	**(1,585)**
Other income and (expenses), net	(447)	(629)	**(1,076)**	(287)	(1,215)	**(1,502)**	(177)	(1,542)	**(1,719)**
Total net operating expenses	**(67,000)**	**(17,015)**	**(84,015)**	**(69,555)**	**(18,142)**	**(87,697)**	**(78,844)**	**(25,803)**	**(104,647)**

(1) The Company subcontracts a significant part of its preclinical (pharmaceutical development, tolerance studies and other model experiments, etc.) and clinical operations (coordination of trials, hospital costs, etc.) to third parties. Associated costs are recorded in subcontracting on the basis of the level of completion of the clinical trials.

(2) Non-scientific advisory and consulting are services performed to support the selling, general and administration activities of the Company, such as legal, accounting and audit fees as well as business development support.

(3) Scientific advisory and consulting expenses relate to consulting services performed by third parties to support the research and development activities of the Company.

	Year ended December 31,					
	2017		2018		2019	
(in thousands of euro)	Deloitte & Associés	Total	Deloitte & Associés	Total	Deloitte & Associés	Total
Audit fees	707	**707**	599	**599**	1,190	**1,190**
Non-audit fees	24	**24**	6	**6**	2	**2**
Total	**731**	**731**	**605**	**605**	**1,192**	**1,192**

* Non-audit fees: these fees correspond to services performed by the auditors related to the production of certification in the context of the declaration of expenses for the obtention of grants; to the verification report of social and environmental information, special reports within the framework of operations on the Company's capital

Personnel expenses other than share-based compensation

The line item amounted to €15,163 thousand, €19,121 thousand and €22,638 thousand for the years ended December 31, 2017, 2018 and 2019 respectively. The Company had 195 employees as of December 31, 2018, compared to 235 as of December 31, 2019.

Depreciation and amortization

The line item is mainly composed of the amortization of the monalizumab, IPH5201 and Lumoxiti intangible assets (see Note 6).

Cost of supplies and consumable materials

Cost of supplies and consumable materials consists mainly of the cost of procurement of the Company's drug substance and/or drug product that is manufactured by third-parties. This line item amounts to €4,287 thousand €3,819 thousand and €3,208 thousand for the years ended December 31, 2017, 2018 and 2019, respectively.

Intellectual property expenses

Intellectual property expenses amounted to €1,499 thousand, €1,381 thousand and €1,585 thousand for the financial years ended December 31, 2017 , 2018 and 2019 respectively.

15) Net income / (loss) from distribution agreements

During the transition period, which is expected to terminate by the end of 2020, Lumoxiti products are commercialized in the United States by AstraZeneca who is the owner of the regulatory approval. The Company concluded that it did not meet the criteria for being principal under IFRS 15. Consequently, the net loss resulting from all Lumoxiti marketing operations are disclosed in the item line "Net income / (loss) from distribution agreements"

The Company recognized a €1,109 thousand net loss and a €8,219 thousand net loss for the fiscal years ended December 31, 2018 and 2019 respectively, corresponding to production and marketing costs, net of sales proceeds, as invoiced by AstraZeneca in relation to Lumoxiti distribution agreement for the period. Sales of Lumoxiti products for the fiscal year ended December 31, 2018 and 2019 were modest. The commercialization in the United States started in the last quarter 2018.

16) Net financial loss

Net financial loss can be analyzed as follows:

	Year ended December 31,		
(in thousands of euro)	**2017**	**2018**	**2019**
Interests and gains on financial assets	1,254	1,582	1,620
Unrealized gains on financial assets	-	-	4,063
Foreign exchange gains	784	4,068	5,568
Other financial income	463	352	18
Financial income	**2,501**	**6,002**	**11,270**
Foreign exchange losses	(6,661)	(3,851)	(4,772)
Unrealized losses on financial assets	(3,238)	(3,942)	-
Interest on financial liabilities	(113)	(102)	(204)
Other financial expenses	(523)	(534)	(1)
Financial expenses	**(10,535)**	**(8,429)**	**(4,976)**
Net financial income (loss)	**(8,034)**	**(2,427)**	**6,293**

For the financial years ended December 31, 2018 and 2019, the foreign exchange gains and losses mainly result from the variance of the exchange rate between the Euro and the U.S. dollar on U.S. dollars denominated cash and cash equivalent and financial assets accounts.

Unrealized losses on financial assets relate to unquoted instruments, the fair value of which is determined using level 2 measurements.

17) Income Tax

Due to the Company's early stage of development, it is not probable that future taxable profit will be available against which the unused tax losses can be utilized. As a consequence, deferred tax assets are recognized up to deferred tax liabilities.

Temporary differences mainly result from leases, provision for defined benefit obligation and tax losses carryforwards.

As of December 31, 2019, the accumulated tax losses carryforwards of Innate Pharma SA were €231,167 thousand with no expiration date (€218,670 and €219,563 thousand as of December 31, 2017 and 2018). As of December 31, 2019, the accumulated tax losses carryforwards of Innate Pharma Inc. was €5,098 thousand, or $5,727 thousand, (€446 thousand, or $535 thousand and €493 thousand, or $564 thousand as of December 31, 2017 and 2018, respectively), with a 20-year period expiration.

For the financial year 2018, the Company opted for the carry back mechanism which gave rise to a €333 thousand tax credit.

Tax rate reconciliation

	Year ended December 31,		
(in thousands of euro)	**2017**	**2018**	**2019**
Net income (loss) before tax	**(48,385)**	**3,049**	**(20,759)**
Statutory tax rate	33.33%	33.33%	31.00%
Income tax benefit / (expense) calculated at statutory tax rate	**16,127**	**(1,016)**	**6,435**
Increase / (decrease) in income tax benefit / (expenses) arising from:			
Differences in tax rates	-	-	137
Research tax credit	3,674	4,500	5,021
Provision for defined benefit obligations	(96)	(359)	(20)
Share-based compensation	(3,276)	(902)	(1,186)
Revenue from collaboration agreements	-	(1,830)	(5,251)
Non-recognition of deferred tax assets related to tax losses and temporary differences	(16,800)	(214)	(5,136)
Carry-back	-	333	-
Other differences	371	(179)	-
Effective tax expense (a)	**-**	**333**	**-**
Effective tax rate	**0%**	**0.93%**	**0%**
Deferred tax income / (loss) (b)	(368)	-	-
Income tax benefit / (expense) (a) + (b)	**(368)**	**333**	**-**

18) Commitments, contingencies and litigations

Commitments

Except the recognition of operating lease agreements existing as of December 31, 2018 as lease liabilities as of January 1, 2019 following the application of IFRS 16, the Company has identified the following changes in off-balance sheet commitments since December 31, 2018:

- non-cancellable purchase commitments as of June 31, 2019 for a total of €150 thousand with various CMO

Consumable purchases

- As part of a supply of scientific equipment, the Company was committed towards a supplier to minimum annual purchases of consumables. As of December 31, 2019, the overall commitment was amounting to €93 thousand for the period from January to June 2020.

Licensing and collaboration agreements

Commitments related the Company's licensing and collaboration agreements are disclosed in Note 1.1.

Contingencies and litigations

The Company is exposed to contingent liabilities relating to legal actions before the labor court or intellectual property issues happening in the ordinary course of its activities. Each pre-litigation, known litigation or procedure in ordinary course the Company is involved in was analyzed at the closing date after consultation of advisors. There is no acknowledged litigation as of December 31, 2019.

In November 2019, Impletio Wirkstoffabfüllung GmbH (formerly known as Rentschler Fill Solutions GmbH), the subcontractor in charge of the fill-and-finish manufacturing operations of lacutamab unilaterally decided to withdraw the certificates of conformance of all clinical batches produced at their facilities, including the lacutamab batch used for the TELLOMAK Phase II clinical trial assessing lacutamab in multiple indications. Impletio Wirkstoffabfüllung GmbH decided to withdraw the certificates of conformance even though the compliance of its manufacturing site with Good Manufacturing Practices has been confirmed by two on-site inspections performed by a local regulator before and after we began to work with them.

Impletio Wirkstoffabfüllung GmbH has filed for bankruptcy, bankruptcy proceedings are currently underway in Austria.

Provisions

Provisions amounted to €1,012 thousand, €690 thousand and €256 thousand as of December 31, 2017, 2018 and 2019, respectively. They consisted solely of the employer contribution in respect of the grants of employee equity instruments. In accordance with IFRS 2, when a Company decides to provide its employees with shares bought back on the market, a provision has to be recognized upon the decision to allocate free shares that are spread over the vesting period when the plan conditions actions for employees when they join the Company at the end of the plan.

19) Related party transactions

Members of the Executive Board and Executive Committee

For each of the periods presented, the following compensation was granted to the members of the Executive Committee of the Company and were recognized as expense:

	Year ended December 31,		
(in thousands of euro)	**2017**	**2018**	**2019**
Personnel expenses and other short-term employee benefits	1,587	2,340	2,811
Extra pension benefits	12	12	12
Share-based compensation	4,805	1,856	2,450
Executive Committee members compensation	**6,404**	**4,208**	**5,273**

As of December 31, 2019, three members of the Executive Committee were also members of the Executive Board.

Odile Belzunce, Jennifer Butler, Frédérique Brune and Tracy Rossin were appointed as members of the Executive Board in 2019.

Calculation of share-based compensation is detailed in Note 11.b.

Members of the Supervisory Board

The Company recognized a provision of €274 thousand for attendance fees (*jetons de presence*) relating to the year ended December 31, 2019 which should be paid in 2020. This amount includes the compensation for the Chairman of the Supervisory Board. The company recognized a provision of €205 thousand and €216 thousand as of December 31, 2017 and 2018, respectively.

Related parties

Novo Nordisk A/S is a board member and is related to the Company by three licensing agreements related to the drug-candidates lirilumab, monalizumab and avdoralimab. Under the terms of the agreements, Novo Nordisk A/S is eligible to receive milestone payments as well as royalties on future sales.

As of December 31, 2017, the Company had no liability to Novo Nordisk.

As of December 31, 2018, the Company had a €13,050 thousand additional consideration to be paid to Novo Nordisk A/S relating to the additional consideration for monalizumab following the exercise of the option by AstraZeneca and a €756 thousand liability relating to a production delivery of avdoralimab. These amounts were paid in 2019.

As of December 31, 2019, the Company has a €588 thousands liability to be paid to Novo Nordisk A/S relating to the withholding tax on monalizumab and avdoralimab acquisitions.

AstraZeneca is a shareholder and is related to the Company through several collaboration and option licensing or license agreements for different drug candidates (monalizumab, avdoralimab, IPH5201 and preclinical molecules) and a license agreement for the rights of the drug Lumoxiti. The payments between the two companies as well as the liabilities and receivables as of 31 December 2019 are as follows:

	As of December 31, 2019	
(in thousands of euros)	**Payments**	**Assets/Liabilities**
Collection (AstraZeneca towards the Company) / Receivables	118,627	9,140
Payments (the Company towards AstraZeneca) / Liabilities	(73,973)	(36,296)
Total[(1)]	**44,654**	**(27,156)**

(1) In addition, the Company recognized in the income statement a net expense of €8,219 thousand as net result from distribution agreements (see Note 15) and an R&D expense of €11,457 thousand as operating expenses (see Note 14)

BPI France is a board member and has granted the Company a €1,500 thousand interest-free loan (*Prêt à Taux Zéro Innovation*, or "PTZI"). This loan will be reimbursed starting September 2016 over a 5-year period.

Subsidiaries

The business relationships between the Company and its subsidiaries are governed by intra-group agreements, conducted at standard conditions on an arm's length basis.

20) Income (loss) per share

Basic income (loss) per share

Basic income (loss) per share is calculated by dividing the net income (loss) attributable to equity holders of the Company by the weighted average number of ordinary shares in circulation during the corresponding period.

	Year ended December 31,		
(in thousands of euro, except for data share)	**2017**	**2018**	**2019**
Net income (loss)	(48,385)	3,049	(20,759)
Weighted average number of ordinary shares in circulation	54,351,967	58,776,712	66,908,389
Basic income (loss) per share (€ per share)	**(0.89)**	**0.05**	**(0.31)**

The instruments that entitle their holders to a portion of the share capital on a deferred basis (BSAs, BSAAR, AGAs and AGAPs) are considered to be anti-dilutive (2,360,945 instruments in 2017, 4,861,530 instruments in 2018 and 4,810,448 instruments in 2019). These instruments are presented in detail in Note 11.

Diluted income (loss) per share

Diluted income (loss) per share is calculated by dividing the net income (loss) attributable to equity holders of the Company by the weighted average number of ordinary shares in circulation during the corresponding period, increased by all dilutive potential ordinary shares.

	Year ended December 31,		
(in thousands of euro, except for data share)	**2017**	**2018**	**2019**
Net income (loss)	(48,385)	3,049	(20,759)
Weighted average number of ordinary shares in circulation	54,351,967	58,776,712	66,908,389
Adjustment for share instruments	-	570	-
Diluted income (loss) per share (€ per share)	**(0.89)**	**0.05**	**(0.31)**

21) Events after the reporting date

On November 22, 2019, AstraZeneca submitted to the European Medicines Agency (EMA) the Marketing Authorization Application (MAA) relating to the commercialization of Lumoxiti in Europe. According to the agreement related to Lumoxiti with AstraZeneca, AstraZeneca is entitled to a $15,000 thousand milestone that was paid by the Company in January 2020. On January 2, 2020, the Company announced that the EMA has accepted the MAA submission for Lumoxiti. The EMA filling acceptance follows the U.S. Food and Drug Administration (FDA) approval of Lumoxiti in September 2018.

On January 10, 2020, the Company signed an amendment to the lease for the “Le Virage” building in order to expand its premises. This amendment also extends the duration of the contractual commitment. The effective date of this addendum is January 515, 2020. Consequently, and following the application of IFRS 16 standard, the impact on the consolidated financial statements are the following : recognition of a new right-of-use asset of €1,151 thousand and a new lease liability of €1,114 thousand.

On March 10, 2020, the Company announced the dosing of the first patient on March 9, 2020 in the IPH5201 Phase I clinical trial. AstraZeneca made a $5,000 thousand milestone payment to Innate under the companies' October 2018 multi productoncology development collaboration. Innate will make a €2,700 thousand milestone payment to Orega Biotech SAS pursuant to Innate's exclusive licensing agreement.

Between December 31, 2019, closing date of the fiscal year, and March 9, 2020, date of approbation of the financial statement by the Supervisory Board, occurred the Covid-19 health crisis. As of the date of this report, on March 9, 2020, it is difficult to measure the potential impact of this crisis, generally and more specifically on the activity. The Group is monitoring the evolution of the situation and is contemplating appropriate actions to implement. There is no impact on the financial statements as of December 31, 2019.

Exhibit 1.1

TRANSLATION FOR INFORMATION PURPOSES

INNATE PHARMA SA
A corporation with executive board and supervisory board with a share capital of EUR 3,945,638.55
Registered Office: 117, avenue de Luminy, 13009 Marseille
424 365 336 Registry of Trade and Companies of Marseille

ARTICLES OF ASSOCIATION (BY-LAWS)

Amended by the Executive Board of January 28, 2020

TRANSLATION FOR INFORMATION PURPOSES

TITLE I
FORM – NAME – REGISTERED OFFICE – OBJECT - DURATION

ARTICLE 1 - Form

The Company was incorporated in the form of a Simplified Share Company governed by applicable statutory provisions and by these articles of association.

The Company was transformed into a Corporation with a Executive Board and a Supervisory Board by a decision of the Mixed Meeting of Shareholders of 13 June 2005. It is governed by the statutory and regulatory provisions in force and by these articles of association.

ARTICLE 2 – Corporate Name

The name of the Company is INNATE PHARMA.

On any instruments or documents issued by the Company, the name of the Company must be immediately preceded or followed by the words "Corporation with Executive Board and Supervisory Board" and a statement of the share capital.

ARTICLE 3 - Registered Office

The registered office is at 117, avenue de Luminy, 13009 Marseille.

It may be transferred within the same administrative department or to a neighbouring administrative department by a decision of the Supervisory Board subject to ratification by the Ordinary Meeting of Shareholders.

ARTICLE 4 - Purpose

The purpose of the Company is, directly or indirectly, in France and abroad, to:

- carry out, on its own behalf or on behalf of third parties, any research, development, studies and development of manufacturing or marketing procedures for pharmaceutical products;
- register or grant any patent or licence directly or indirectly connected with its activity; and
- more generally, carry out any transactions of any kind whatsoever including economic, legal, financial, civil or commercial transactions which may be directly or indirectly related to the corporate purposes or to any similar, related or complementary objects.

ARTICLE 5 - Duration

Unless it is extended or wound up early, the Company shall have a duration of 99 years which starts from the day of its registration at the Registry of Trade and Companies.

Decisions to extend the duration of the Company or to wind it up early shall be taken collectively by the shareholders.

TRANSLATION FOR INFORMATION PURPOSES

TITLE II
CONTRIBUTION - SHARE CAPITAL – FORM OF SHARES - RIGHTS AND OBLIGATIONS ATTACHED TO SHARES

ARTICLE 6 – Share Capital

The share capital is € 3,945,638.55 (three million nine hundred forty-five thousand six hundred thirty-eight euros and fifty-five cents). It is divided into 78,898,264 (seventy-eight million eight hundred ninety-eight thousand two hundred sixty-four) ordinary shares of zero point zero five (0.05) euro each, 6,926 (six thousand nine hundred twenty-six) preference shares of zero point zero five (0.05) euro each (herein referred to as "**2016 Preference Shares"**) and 7,581 (seven thousand five hundred eighty-one) preference shares of zero point zero five (0.05) euro each (herein referred to as "**2017 Preference Shares"**), fully subscribed and fully paid up in cash.

ARTICLE 7 – Modifications of the Share Capital

I. The share capital may be increased by either the issue of new shares or an increase of the nominal value of existing shares.

New shares are paid up either in cash, by a contribution in kind, by set-off against due and payable receivables, by incorporation of profit, reserves or issue premiums into the share capital, as a result of a merger or demerger, or further to the exercise of a right attached to securities entitling their holder to capital, including, as the case may be, the payment of the corresponding amounts.

New shares are issued at either their nominal amount or at such amount increased by an issue premium.

A share capital increase can only be decided by an Extraordinary Meeting of Shareholders, following a report by the Executive Board containing the information required by law.

An Extraordinary Meeting of Shareholders may, however, delegate such competence to the Executive Board pursuant to the conditions provided by law. Within the limit of the powers so granted by an Extraordinary Meeting of Shareholders, the Executive Board shall have the powers required to increase the share capital in one or several steps, to determine the terms and conditions thereof, to officially acknowledge the completion thereof and to make the corresponding amendments to the articles of association.

If a share capital increase is decided by a Meeting of Shareholders, it may delegate all the powers required for the completion of the operation to the Executive Board.

If the Executive Board is acting by virtue of a delegation of power or competence, it shall prepare a supplementary report to the Ordinary Meeting of Shareholders held following the meeting of the Executive Board at which such action is taken.

If the share capital is increased by the incorporation of profits, reserves or issue premiums, the Extraordinary Meeting of Shareholders shall deliberate pursuant to the conditions of quorum and majority required for Ordinary Meeting of Shareholders. In such case, the Meeting of Shareholders may decide that rights constituting fractional shares shall be neither negotiable nor transferable and that the corresponding securities should be sold. The proceeds of sale shall be allocated to the holders in proportion to their rights.

An increase in share capital by increasing the nominal amount of shares may only be decided by a unanimous decision of the shareholders, unless it is the result of an incorporation of profits, reserves or issue premiums into the share capital.

TRANSLATION FOR INFORMATION PURPOSES

Shareholders have a preferential right of subscription, in proportion to their shareholdings, to shares issued by way of cash contribution in order to increase the share capital. Shares acquired pursuant to the exercise of this right shall be of the same category as that of the share from which the aforesaid right arises. This also applies to shares resulting from the acquisition of securities other than shares.

Shareholders may dispose of all or part of their subscription rights during the subscription period. Such rights are negotiable if they are detached from shares which are themselves negotiable. If this is not the case, then such subscription rights may be disposed of on the same terms as the shares themselves.

Shareholders may waive their preferential right on an individual basis.

The Extraordinary Meeting of Shareholders which decides to increase the share capital may cancel the preferential right to subscription pursuant to the conditions and within the limits set by law, and shall make such decision following the issuance of reports of the Executive Board and the Statutory Auditors, in accordance with the conditions determined by the law and regulations in force.

Shares which have not been subscribed for on an irreducible basis may be allocated to shareholders who may have subscribed on a reducible basis for a greater number of shares than that to which they could have subscribed on a preferential basis, in proportion to their subscription rights, and in any event, within the limit of their request, if the Extraordinary Meeting of Shareholders, or, in the case of delegation, the Executive Board, expressly so decides.

If the subscriptions have not, in any respect whatsoever, covered the entire share capital increase, the Executive Board may exercise any one or more of the options provided below, in the order it sees fit:

(i) limit the share capital increase to the amount of the subscriptions on the dual condition that such subscriptions cover at least three quarters of the amount of the originally determined increase, and that such option has not been expressly prohibited by the Extraordinary Meeting of Shareholders at the time of issue;

(ii) allocate the remaining shares unless the Extraordinary Meeting of Shareholders has decided otherwise; and

(iii) opening the subscription to the public if this has been expressly authorised by the Extraordinary Meeting of Shareholders.

If the subscriptions have not covered the entire share capital increase, or three quarters of this increase in the case of (i) above, after such options have been exercised, the share capital increase shall not be carried out.

However, the Executive Board may in any case automatically limit the share capital increase to the amount covered by subscriptions, if unsubscribed shares represent less than 3% of the share capital increase.

In the case of a share capital increase with or without a preferential right of subscription, the Extraordinary Meeting of Shareholders may provide that the number of shares may be increased within thirty days of the closure of subscriptions by up to 15% of, and at the same price as for, the original issue.

If the share capital increase produces fractional shares, shareholders with insufficient subscription or allocation rights shall be required personally to acquire or dispose of the subscription rights necessary to obtain delivery of a whole number of new shares.

II. An Extraordinary Meeting of Shareholders (or, in the case of delegation, the Executive Board) may also (subject to the rights of creditors if relevant) authorise or decide upon a reduction of share capital for any reason and by any procedure whatsoever. A reduction in share capital may not, in any event, derogate from the principle of equality between shareholders.

The reduction of share capital to an amount below the legal minimum can only be decided subject to the condition precedent of a share capital increase to at least the statutory minimum, unless the Company is transformed into a company having a different corporate form. In the event that the foregoing principle is not complied with, any interested party may ask the courts to dissolve the Company, provided however that the dissolution of the Company cannot be ordered if, as of the date on which the court rules on the merits, the situation has been rectified.

Subject to the legal and regulatory provisions in force, the Company may not either subscribe to or purchase its own shares. However, if an Extraordinary Meeting of Shareholders has decided on a reduction of share capital for reasons other than due to losses, it can authorise the Executive Board to purchase a fixed number of shares in order to cancel them.

ARTICLE 8 – Paying Up Shares

At least one quarter of the nominal value of shares subscribed for cash must be paid up on subscription together with the full amount of the issue premium, if relevant.

The remainder must be paid up in one or more instalments, upon calls made by the Executive Board, within five years of the day on which the share capital increase was completed.

Subscribers will be informed of calls for funds by registered letter with confirmation of receipt sent at least fifteen days prior to the date set for each payment.

If a shareholder does not pay the amounts due with respect to the shares for which he has subscribed, on the dates determined by the Executive Board, interest will automatically accrue on such amounts in favour of the Company at the statutory rate defined in Article L. 313-2 of the Monetary and Financial Code, as of the expiry of the month following the date on which they fall due and without the need for a court petition or formal notice. Moreover, when due payments in respect of shares have not been made within thirty days of formal notice sent to the defaulting shareholder, such shares will no longer entitle the holder to admission to shareholders' meeting and the right to vote in shareholders' meetings, and shall be deducted for the calculation of the quorum. The right to dividends and the preferential right of subscription to share capital increases attached to these shares shall be suspended. These rights shall be regained on payment of the principal and interest due in respect of the amounts due. A shareholder can then request the payment of dividends that are not time-barred and exercise his preferential right of subscription if the exercise period for such right has not expired.

The share capital must be fully paid up prior to any issue of additional shares to be paid up in cash.

ARTICLE 9 – Form of Shares – Administration of the Share Accounts

Ordinary shares are either in registered form or, if allowed by law, in bearer form, at the shareholder's discretion. Fully paid-up 2016 Preference Shares are in registered form. Fully paid-up 2017 Preference Shares are in registered form.

Ordinary shares, 2016 Preference Shares and 2017 Preference Shares are registered in individual accounts opened by the Company or any authorised intermediary, in the name of each shareholder and kept according to the conditions and procedures provided by legal and regulatory provisions.

The Company is authorised to rely on statutory provisions, in particular Article L. 228-2 of the Commercial Code, with respect to the identification of the holders of bearer shares and for such purpose it may at any time request the central depositary who administers the share account, to provide the information referred to in Article L. 228-2 of the Commercial Code, in exchange for payment. The Company is therefore, in particular, entitled at any time to request the name and year of birth, or concerning a legal person, the corporate name and year of incorporation, the nationality and the post address and, if applicable, email address of holders of securities which give the right to vote in Meeting of Shareholders, either immediately or in the future, as well as the number of shares held by each of them and, as the case may be, any restrictions which may apply to the shares.

TRANSLATION FOR INFORMATION PURPOSES

ARTICLE 10 - Transfer of Shares

Registered shares may be transferred by transfer from one account to another.

Ordinary shares paid up in cash are freely transferable as from the completion of the share capital increase. Ordinary shares received in exchange for contribution in kind are freely transferable as from the completion of the share capital increase, i.e. on the date of the Meeting of Shareholders or meeting of the Executive Board, acting under delegation, which approved the contribution, in the case of an in-kind contribution during the life of the company.

Title to ordinary shares is transferred by registration in the buyer's account, on the date and in accordance with the conditions provided by applicable law and, as the case may be, regulations.

Ordinary shares are freely transferable subject to legislative provisions. 2016 Preference Shares and 2017 Preference Shares are transferable under the conditions set forth in Article 12 of these by-laws.

ARTICLE 11 – Crossing of Thresholds

Any natural person or legal entity referred to under Articles L. 233-7, L. 233-9 and L. 223-10 of the Commercial Code who gains possession, directly or indirectly, alone or in concert, of a number of shares which represent a portion of the share capital or voting rights of the Company equal to or greater than 1% or a multiple of such percentage, must inform the Company of the total number of shares, voting rights and securities granting an interest in capital or voting rights which it owns immediately or would own in the future, by registered mail with confirmation of receipt sent to the registered office of the Company within five trading days starting from the date that the aforesaid threshold(s) were crossed.

The obligation of information provided above also applies in the same conditions when the aforesaid thresholds are crossed downwards.

Shares or voting rights in excess of the portion which should have been declared but which have not been declared pursuant to the aforesaid conditions, are stripped of their rights to vote at shareholders' meetings for any meeting held within two years following the date of the regularisation of the declaration in accordance with Article L. 233-14 of the Commercial Code, if failure to make the declaration has been observed and if one or more shareholders holding an interest of at least 5% of the share capital of the Company make such request, recorded in the minutes of the Meeting of Shareholders.

The foregoing obligations to declare apply in addition to the threshold crossing declarations provided by legal or regulatory provisions in force.

ARTICLE 12 - Rights and Obligations attached to Shares

The share capital of the Company is divided between ordinary shares, 2016 Preference Shares and 2017 Preference Shares.

I. Rights attached to ordinary shares, 2016 Preference Shares and 2017 Preference Shares

Without prejudice to the rights attached to 2016 Preference Shares and 2017 Preference Shares, each ordinary share entitles to a portion of the corporate profits and assets in proportion to the portion of share capital that it represents.

In addition, each ordinary share gives the right to vote and be represented at General Meetings of Shareholders pursuant to the conditions provided by law and in these articles of association. Ordinary shares, 2016 Preference Shares and 2017 Preference Shares (including shares of the Company that might be allocated for free in the framework of a capital increase through the incorporation of reserves, issue premiums or profits) do not grant a double voting right pursuant to the last paragraph of Article L. 225-123 of the French Commercial Code.

TRANSLATION FOR INFORMATION PURPOSES

Shareholders holding ordinary shares, 2016 Preference Shares and 2017 Preference Shares are only liable up to the nominal amount of the shares which they hold and any request for funds beyond that amount is prohibited.

Ownership of ordinary shares, 2016 Preference Shares and 2017 Preference Shares automatically implies agreement to be bound by the Company's by-laws and the decisions of the General Meeting of Shareholders.

The heirs, creditors, successors or other representatives of the shareholder holding ordinary shares, 2016 Preference Shares or 2017 Preference Shares cannot request seals to be placed on the Company's assets and securities or request their distribution or sale by public auction, or to interfere with its management. In order to exercise their rights, they should rely on company records and the decisions of the General Meeting of Shareholders.

Whenever it is necessary to hold several ordinary shares, 2016 Preference Shares or 2017 Preference Shares in order to exercise a right of any kind, in the case of an exchange, regrouping or allocation of securities, or further to a share capital increase or decrease, merger or other corporate transaction, holders of single shares or of less than the number of shares so required will only be able to exercise such right if they themselves collect and, as the case may be, purchase or sell, the required number of securities.

However, the Company may, in the case of an exchange of securities further to a merger or demerger, a share capital reduction, the regrouping or division and mandatory conversion of bearer into registered shares, or the distribution of securities deducted from reserves or in connection with a share capital reduction, or the distribution or allocation of free shares, pursuant to a decision of the Executive Board, sell any securities in respect of which the persons entitled thereto have not requested delivery subject to having carried out the publicity formalities provided by regulations at least two years beforehand.

As from the date of such sale, the prior securities or rights to distribution or allocation shall be cancelled as and when required, and their holders shall only be entitled to the allocation of the net proceeds of sale of unclaimed securities.

II. 2016 Preference Shares

A. Rights attached to 2016 Preference Shares

2016 Preference Shares and the rights of holders thereof are governed by the applicable provisions of the French Commercial Code, in particular Articles 228-11 et seq. thereof.

The maximum number of 2016 Preference Shares that may be allocated is 7,500 shares.

Only the 2016 Preference Shares convertible into ordinary shares pursuant to the terms and conditions specified below benefit from a dividend and are entitled to the reserves, applicable only from the date at which they become convertible. The 2016 Preference Shares that have become convertible will bear rights as from the first day of the financial year preceding the financial year during which they become convertible. The amount of the dividend (and, if applicable, of the portion of the reserves) to which each 2016 Preference Shares entitles is equal to the amount due in respect of an ordinary share, multiplied by the number of ordinary share that can be received from the conversion of each 2016 Preference Shares.

2016 Preference Shares give no preferential subscription right to any capital increase or any operation granting a right on ordinary shares.

In the event of an operation taking place before the 2016 Preference Shares are converted pursuant to paragraph II.B below, the conversion ratio will be adjusted pursuant to the provisions of Article L. 228-99, Paragraph 2, 3° and Paragraph 5 of the French Commercial Code.

With regards to the ownership of corporate assets, a 2016 Preference Shares gives right to a portion of the liquidation surplus in proportion to the portion of share capital that it represents.

TRANSLATION FOR INFORMATION PURPOSES

Only the 2016 Preference Shares convertible into ordinary shares pursuant to the terms and conditions specified below grant the right to vote in the ordinary and extraordinary general meetings of holders of ordinary shares, applicable only from the date at which they become convertible. The number of voting rights granted by each 2016 Preference Share is equal to the number of ordinary shares that can be received from the conversion of each 2016 Preference Share.

2016 Preference Shares grant the right to vote in the special meetings of holders of 2016 Preference Shares. Holders of 2016 Preference Shares are grouped into a special meeting for any proposed modification of the rights attached to 2016 Preference Shares. In addition, pursuant to the provisions of Article L. 228-17 of the French Commercial Code, any proposed merger or demerger of the Company in which 2016 Preference Shares cannot be exchanged for shares with equivalent particular rights will be subject to the approval of any relevant special meeting.

Special meetings can only make valid decisions if the holders of 2016 Preference Shares that are present or represented hold at least, when convened for the first time, one third, and when convened for the second time, one fifth of the 2016 Preference Shares carrying the right to vote. If the capital is modified or adjusted, the rights of holders of 2016 Preference Shares are adjusted so that their rights may be maintained pursuant to Article L. 228-99 of the French Commercial Code. The other rights attached to 2016 Preference Shares are specified in the next paragraph.

B. Conversion of 2016 Preference Shares into ordinary shares

The issuance of 2016 Preference Shares may only be decided in the framework of an allocation of free shares in favour of the employees and/or executive officers of the Company, pursuant to the provisions of Articles L. 225-97-1 of the French Commercial Code.

2016 Preference Shares will be definitively acquired by the beneficiaries after an acquisition period of one year from their allocation by the Executive Board and subject to the beneficiary's presence in the Company or its consolidated subsidiaries as an employee, executive officer or member of an executive or supervisory body or, if applicable, of the equivalent thereof in foreign law. The "**Acquisition Date**" is defined as the end of the acquisition period of the Preference Shares.

However, in the event of invalidity of the beneficiary corresponding to classification in the second or third categories set forth by Article L. 341-4 of the French Social Security Code (or the equivalent thereof in an applicable foreign law), the 2016 Preference Shares will be allocated definitively prior to the Acquisition Date.

The 2016 Preference Shares become convertible in ordinary shares, either new or existing at the Company's option, after the above-mentioned one-year vesting period from their allocation by the Executive Board, followed by a two-year retention period from the definitive allocation (the "Retention Period"), under the conditions set forth in Paragraphs 2 to 10 below. The "**Expiry Date of the Retention Period**" is defined as the end of the Retention Period.

However, in the event of invalidity of the beneficiary corresponding to classification in the second or third categories set forth by Article L. 341-4 of the French Social Security Code (or the equivalent thereof in an applicable foreign law), the 2016 Preference Shares will be allocated definitively prior to the Acquisition Date.

1. As from the first anniversary date of the Acquisition Date, 2016 Preference Shares will be freely transferable to a credit institution in the framework of a pledge agreement.

   Pursuant to the provisions set forth in the Article L. 225-197-1 I., Paragraph 6 of the French Commercial Code, the 2016 Preference Shares will be freely transferable in the event of invalidity of the beneficiary corresponding to classification in the second or third categories set forth by Article L. 341-4 of the French Social Security Code, regardless of whether such invalidity occurs before or after the Acquisition Date.

2. 2016 Preference Shares may only be converted for a conversion period of six years and six months from the Expiry Date of the Retention Period (the "**Conversion Period**").

TRANSLATION FOR INFORMATION PURPOSES

3. During the Conversion Period, each holder of 2016 Preference Shares will have the right to convert each of his 2016 Preference Shares in ordinary shares, either new or existing (at the Company's option). The number of ordinary shares to which the conversion of one 2016 Preference Share will entitle will be equal to the sum of (i) a number of ordinary shares determined according to the fulfilment of an internal condition (the "**Internal Condition**") and a market condition as defined below ((the "**Market Condition**") (together the "**Performance Criteria**").

   The fulfilment of the Performance Criteria will give the right to convert each 2016 Preference Share in a maximum of 200 ordinary shares, i.e. a maximum of 100 ordinary shares under the Internal Condition and a maximum of 100 ordinary shares under the Market Condition.

   It is specified that this conversion ratio thus determined will be adjusted in order to take into account the shares to be issued to preserve the rights of holders of securities or other rights giving access to the share capital and holders of 2016 Preference Shares under legal and statutory requirements and Paragraph II. above.

4. The Internal Condition in order to calculate the number of 2016 Preference Shares that can be converted will be determined as a function of the highest of the following two alternative criteria:

   a) The first criterion is a function of the consolidated collected turnover of the Company relating to a present or future partnership or licensing agreement, cumulated over the period from 1 July 2016 to 30 June 2019 (the "**Cash Revenues**"):

      (i) If the Turnover is strictly inferior to 50 million euros, the conversion ratio under the Internal Condition will be equal to 0;

      (ii) If the Turnover is superior or equal to 50 million euros and inferior to 150 million euros, the conversion ratio under the Price Condition will be equal to :
      [(Turnover-50)/100]×100

      (iii) If the Cash Revenues are equal or superior to 150 million Euros, the conversion ratio under the Internal Condition will be equal to 100;

   b) The second criterion is a function of the maturity of the portfolio of drug candidates developed by the Company during the three years before the Expiry Date of the Retention Period. "Drug candidates developed by the Company" mean Lirilumab, Monalizumab and IPH4102. For each of these products:

      (iv) In the event of the authorization by the competent regulatory authority the United States or in Europe for the Company or one of its partners to carry out a Phase III trial or a clinical trial with a view to register a product, the conversion ratio under the Internal Condition will be equal to 50;
      (v) In the event of the authorization by the competent regulatory authority in the United States or in Europe for the Company or one of its partners to carry out two Phases III trials or clinical trials with a view to register two products and/or two different indications for one product, the conversion ratio under the Internal Condition will be equal to 75;
      (vi) In the event of an acceptance from the European Medicines Agency (EMA) in Europe or the Food and Drug Administration (FDA) in the United States to examine a filing by the Company or one of its partners of a marketing authorization request, the conversion ratio under the Internal Condition will be equal to 100.

5. The Market Condition in order to calculate the conversion ratio of 2016 Preference Shares into ordinary shares will be determined depending on the stock market price of the Innate Pharma share:

   The terms "**Initial Price**" mean the average closing price of the Innate Pharma share on Euronext Paris for the sixty trading days prior to the Allocation Date by the Executive Board.

TRANSLATION FOR INFORMATION PURPOSES

The terms "**Final Price**" mean the highest average closing price of the Innate Pharma share on Euronext Paris over a period of sixty consecutive days calculated at any time during the three years prior to the Expiry Date of the Retention Period.

The terms "**High Price**" means the Initial Price multiplied by two.

a) If the Final Price is strictly inferior to the Initial Price, the conversion ratio under the Market Condition will be equal to 0;

b) If the Final Price is between (i) a value equal or superior to the Initial Price and (ii) a value inferior to the High Price, the conversion ratio under the Market Condition will be equal to:
[(Final Price / Initial Price) –1/] x 100

c) If the Final Price is equal or superior to the High Price, the conversion ratio under the Market Condition will be equal to 100.

6. The right to convert 2016 Preference Shares into ordinary shares, as well as the right to vote in the general meetings of ordinary shares holders and the right to the dividend and to a portion of the reserves attached to 2016 Preference Shares that have become convertible pursuant to Paragraph II. above, are subject to the condition of the beneficiary's presence in the Company or its consolidated subsidiaries as an employee, an executive officer or a member of an executive or supervisory body or, if applicable, of the equivalent thereof in foreign law as at the Expiry Date of the Retention Period. In the event that such condition ceases to be fulfilled, the Company may proceed at any moment to the redemption of 2016 Preference Shares in the conditions set forth in Paragraph 8. below. It is specified that the provisions of this paragraph do not apply if the presence of the beneficiary in the Company or its consolidated subsidiaries ceases due to death, invalidity or retirement.

7. The fulfilment of the Performance Criteria will be recorded in a meeting of the Executive Board as soon as practicable after the Expiry Date of the Retention Period.

8. 2016 Preference Shares that cannot be converted into ordinary shares depending on the extent to which the Performance Criteria are fulfilled or if the presence condition as at the Expiry Date of the Retention Period is not fulfilled, and 2016 Preference Shares that can be but will not have been converted at the end of the Conversion Period, may be bought at any time by the Company (which is under no obligation to do so) at their nominal value.

9. At the end of the Conversion Period, the Company will have the possibility to proceed, pursuant to applicable legal and regulatory provisions, to the cancellation of 2016 Preference Shares that will have not been converted, including those that it will have bought. The share capital will then be reduced accordingly, and creditors will have the right to oppose such reduction in the conditions set forth in Article L. 225-205 of the French Commercial Code.

10. New ordinary shares resulting from the conversion of 2016 Preference Shares will be assimilated to existing ordinary shares, will bear rights as from the first day of the financial year preceding the financial year during which they become convertible, and will grant to their holders, starting from their delivery, all the rights attached to ordinary shares. They will be subject to a request for listing on the regulated market of Euronext Paris on the same listing line as ordinary shares.

By way of derogation to the above, the allocation of 2016 Preference Shares can take place after the date of their allocation by the Executive Board and prior to the Acquisition Date, in the event of invalidity of the beneficiary corresponding to classification in the second or third categories set forth by Article L. 341-4 of the French Social Security Code, at the beneficiary's request.

The Executive Board will record the conversion into ordinary shares of the 2016 Preference Shares for which the conversion fulfils the conditions set forth above, as well as the number of ordinary shares resulting from the conversions of 2016 Preference Shares that have taken place, and will modify the by-laws accordingly, in particular with regards to the breakdown of shares by category. This competence may be delegated to the Chairman of the Executive Board under the conditions set forth by law.

TRANSLATION FOR INFORMATION PURPOSES

If the conversion of 2016 Preference Shares into ordinary shares results in a capital increase, such increase will be fully paid up at issue through the incorporation of reserves, profits or issue premiums for the corresponding amount.

Shareholders will be informed of the conversions having taken place by the reports of the Executive Board and Statutory Auditors pursuant to Article R. 228-18 of the French Commercial Code. These supplementary reports will be made available to the shareholders at the Company's registered office as from the date on which each meeting is convened.

III. 2017 Preference Shares

A. Rights attached to 2017 Preference Shares

2017 Preference Shares and the rights of holders thereof are governed by the applicable provisions of the French Commercial Code, in particular Articles 228-11 et seq. thereof.

The maximum number of 2017 Preference Shares that may be allocated is 12,500 shares.

From their definitive acquisition until the date at which they become convertible, the 2017 Preference Shares grant the right to vote in the ordinary and extraordinary general meetings of holders of ordinary shares on the basis of one voting right per 2017 Preference Share. As from the date on which they become convertible, the number of voting rights to which each 2017 Preferred Share entitles the holder becomes equal to the number of ordinary shares to which the conversion of each 2017 Preferred Share entitles the holder.

2017 Preference Shares grant the right to vote in the special meetings of holders of 2017 Preference Shares. Holders of 2017 Preference Shares are grouped into a special meeting for any proposed modification of the rights attached to 2017 Preference Shares. In addition, pursuant to the provisions of Article L. 228-17 of the French Commercial Code, any proposed merger or demerger of the Company in which 2017 Preference Shares cannot be exchanged for shares with equivalent particular rights will be subject to the approval of any relevant special meeting.

Special meetings can only make valid decisions if the holders of 2017 Preference Shares that are present or represented hold at least, when convened for the first time, one third, and when convened for the second time, one fifth of the 2017 Preference Shares carrying the right to vote.

From their definitive acquisition until the date at which they become convertible, the 2017 Preference Shares benefit from a dividend and are entitled to the reserves. The amount of the dividend (and, if applicable, of the portion of the reserves) to which each 2017 Preference Shares entitles is equal to the amount due in respect of an ordinary share. To this end, the 2017 Preference Shares will bear rights as from the first day of the financial year preceding the financial year during which they are definitively acquired. As from the date at which they become convertible, the amount of the dividend (and, if applicable, of the portion of the reserves) to which each 2017 Preference Shares entitles is equal to the amount due in respect of an ordinary share, multiplied by the number of ordinary share that can be received from the conversion of each 2017 Preference Shares.

With regards to the ownership of corporate assets, a 2017 Preference Shares gives right to a portion of the liquidation surplus in proportion to the portion of share capital that it represents.

2017 Preference Shares give preferential subscription rights to any capital increase or any operation granting a right on ordinary shares, on the basis of one preferential subscription right per 2017 Preferred Share.

In the event of a capital depreciation or reduction, a change in the distribution of profits, an allocation of free shares, or the incorporation into the capital of reserves, profits or share premiums, distribution of reserves or any issue of capital securities or securities giving the right to the allocation of capital securities with a subscription right reserved for shareholders before the 2017 Preferred Shares are convertible under the conditions provided below, the conversion ratio will be adjusted to take into account this operation pursuant to the provisions of Article L. 228-99, Paragraph 2, 3° and Paragraph 5 of the French Commercial Code.

TRANSLATION FOR INFORMATION PURPOSES

B. Conversion of 2017 Preference Shares into ordinary shares

The issuance of 2017 Preference Shares may only be decided in the framework of an allocation of free shares in favour of the employees and/or executive officers of the Company, pursuant to the provisions of Articles L. 225-97-1 of the French Commercial Code.

2017 Preference Shares will be definitively acquired by the beneficiaries after an acquisition period of one year from their allocation by the Executive Board and subject to the beneficiary's presence in the Company or its consolidated subsidiaries as an employee, executive officer or member of an executive or supervisory body or, if applicable, of the equivalent thereof in foreign law. The "**Acquisition Date**" is defined as the end of the acquisition period of the 2017 Preference Shares.

However, in the event of invalidity of the beneficiary corresponding to classification in the second or third categories set forth by Article L. 341-4 of the French Social Security Code (or the equivalent thereof in an applicable foreign law), the 2017 Preference Shares will be allocated definitively prior to the Acquisition Date. In the event of the death of the beneficiary, in accordance with the provisions of Article L. 225-197-3 of the French Commercial Code, the heirs or successors of the beneficiary may, if they so wish, request the definitive allocation of the 2017 Preferred Shares to them within six months of the date of death. In the event of retirement, the beneficiaries will retain their right to the definitive allocation of the 2017 Preferred Shares although they are no longer bound by an employment contract.

1. The 2017 Preference Shares become convertible in ordinary shares, either new or existing at the Company's option, after the above-mentioned one-year vesting period from their allocation by the Executive Board, followed by a two-year retention period from the definitive allocation (the "Retention Period"), under the conditions set forth in Paragraphs 2 to 13 below. The "**Expiry Date of the Retention Period**" is defined as the end of the Retention Period.

As an exception to the above, in the event of a public tender or exchange offer, the final results of which are announced no later than the Expiry Date of the Retention Period as defined above, the 2017 Preferred Shares will become convertible no later than (i) the first anniversary of the Definitive Allocation (if such an offer occurs before such anniversary and in such a way that the Retention Period lasts at least one year), or (ii) the date of announcement of the final results of such an offer (if such an offer occurs after the anniversary) (the "Amended Expiry Date of the Retention Period").

2. As from the first anniversary date of the Acquisition Date, 2017 Preference Shares will be freely transferable to a credit institution in the framework of a pledge agreement.

Pursuant to the provisions set forth in the Article L. 225-197-1 I., Paragraph 6 of the French Commercial Code, the 2017 Preference Shares will be freely transferable in the event of invalidity of the beneficiary corresponding to classification in the second or third categories set forth by Article L. 341-4 of the French Social Security Code, regardless of whether such invalidity occurs before or after the Acquisition Date.

In the event of the beneficiary's death, whether during the vesting period or the Retention Period, his heirs will no longer be required to comply with this non-transferability commitment, so that the 2017 Preferred Shares for which they have requested the definitive allocation will freely become transferable.

3. 2017 Preference Shares may only be converted for a conversion period of six years and six months from the Expiry Date of the Retention Period (the "Conversion Period"), provided however that in the event of a public tender or exchange offer whose final results are announced no later than the Expiry Date of the Retention Period, the Conversion Period shall commence from the Amended Expiry Date of the Retention Period for such a period that, together with the Retention Period, it represents a total duration of eight years and six months from the Acquisition Date.

4. During the Conversion Period, each holder of 2017 Preference Shares will have the right to convert each of his 2017 Preference Shares in ordinary shares, either new or existing (at the Company's option). The number of ordinary shares to which the conversion of one 2017 Preference Share will entitle will be equal to a number of ordinary shares determined according to the fulfilment of a market condition as defined below (the "Market Condition").

TRANSLATION FOR INFORMATION PURPOSES

5. The Market Condition in order to calculate the conversion ratio of 2017 Preference Shares into ordinary shares will be determined based on the relative performance of the Innate pharma share.

The term "**Initial Price**" means the average closing price of the Innate Pharma share on Euronext Paris for the sixty trading days prior to the date of the General Meeting.

The term "**Final Price**" means (i) the highest average closing price of the Innate Pharma share on Euronext Paris over a period of sixty consecutive days, calculated at any time during the twelve months prior to the Expiry Date of the Retention Period, or (ii) in the event of a public tender or exchange offer whose final results are announced no later than the Expiry Date of the Retention Period, the price at which this public tender offer is made (or, in the case of a public exchange offer only, the price by transparency by applying the exchange ratio to the closing price of the bidder's share on the day before the Amended Expiry Date of the Retention Period).

a) If the Final Price is inferior or equal to the Initial Price, the conversion ratio will be equal to 0;

b) If the Final Price is comprised between the Initial Price and € 30, the conversion ratio will be equal to:
100 x [(Final Price – Initial Price) / (30 – Initial Price)], rounded up to the nearest whole number

c) If the Final Price is equal or superior to € 30, the conversion ratio will be equal to 100.

However, if between the date of the General Meeting and the Expiry Date of the Retention Period (or, as the case may be, the Amended Expiry Date of the Retention Period), one of the Reference Indexes (as defined below) were to experience a Significant Variation (as defined below), then the Executive Board will have the possibility to adjust the Initial Price and/or the Final Price to neutralize the exogenous impact of such a Significant Variation. The Executive Board shall, in this case, appoint a recognized independent expert to assist the Executive Board in the determination of such adjustments.

The term "Reference Indexes" means the following stock market indexes: SBF 120, CAC 40, Next Biotech and NBI (NASDAQ Biotechnology Index). If one of these indexes were to be no longer available, the Executive Board can choose a replacement index.

The term "Significant Variation" means one or the other of the following events for the relevant index:

- the average of the closing value for the index over the sixty consecutive trading days prior to the Expiry Date of the Retention Period (or, as the case may be, the Amended Expiry Date of the Retention Period) is inferior or equal to 90% of the average of the closing value for the index over the sixty consecutive trading days prior to the General Meeting ;

- the average of the closing value for the index over a sixty consecutive trading days period at any time between the date of the General Meeting and the Expiry Date of the Retention Period (or, as the case may be, the Amended Expiry Date of the Retention Period), is inferior or equal to 80% of the average of the closing value for the index over another sixty consecutive trading days period at any time between the date of the General Meeting and the Expiry Date of the Retention Period (or, as the case may be, the Amended Expiry Date of the Retention Period).

6. The right to convert 2017 Preference Shares into ordinary shares, as well as the right to vote in the general meetings of ordinary shares holders and the right to the dividend and to a portion of the reserves attached to 2017 Preference Shares that have become convertible pursuant to Paragraph III A. above, are subject to the condition of the beneficiary's presence in the Company or its consolidated subsidiaries as an employee, an executive officer or a member of an executive or supervisory body or, if applicable, of the equivalent thereof in foreign law as at the Expiry Date of the Retention Period (or, as the case may be, the Amended Expiry Date of the Retention Period). In the event that such condition ceases to be fulfilled, the Company may proceed at any moment to the redemption of 2017 Preference Shares in the conditions set forth in Paragraph 8. below. It is specified that the provisions of this paragraph do not apply if the presence of the beneficiary in the Company or its consolidated subsidiaries ceases due to death, invalidity or retirement.

7. The fulfilment of the Market Condition will be recorded in a meeting of the Executive Board as soon as practicable after the Expiry Date of the Retention Period (or, as the case may be, the Amended Expiry Date of the Retention Period).

8. 2017 Preference Shares that cannot be converted into ordinary shares depending on the extent to which the Market Condition is fulfilled or if the presence condition as at the Expiry Date of the Retention Period (or, as the case may be, the Amended Expiry Date of the Retention Period) is not fulfilled, and 2017 Preference Shares that can be but will not have been converted at the end of the Conversion Period, may be bought at any time by the Company (which is under no obligation to do so) at their nominal value.

9. At the end of the Conversion Period, the Company will have the possibility to proceed, pursuant to applicable legal and regulatory provisions, to the cancellation of 2017 Preference Shares that will have not been converted, including those that it will have bought. The share capital will then be reduced accordingly, and creditors will have the right to oppose such reduction in the conditions set forth in Article L. 225-205 of the French Commercial Code.

10. New ordinary shares resulting from the conversion of 2017 Preference Shares will be assimilated to existing ordinary shares, will bear rights as from the first day of the financial year preceding the financial year during which they will be converted, and will grant to their holders, starting from their delivery, all the rights attached to ordinary shares. They will be subject to a request for listing on the regulated market of Euronext Paris on the same listing line as ordinary shares.

By way of derogation to the above, the allocation of 2017 Preference Shares can take place after the date of their allocation by the Executive Board and prior to the Acquisition Date, in the event of invalidity of the beneficiary corresponding to classification in the second or third categories set forth by Article L. 341-4 of the French Social Security Code, at the beneficiary's request.

11. The Executive Board will record the conversion into ordinary shares of the 2017 Preference Shares for which the conversion fulfils the conditions set forth above, as well as the number of ordinary shares resulting from the conversions of 2017 Preference Shares that have taken place, and will modify the by-laws accordingly, in particular with regards to the breakdown of shares by category. This competence may be delegated to the Chairman of the Executive Board under the conditions set forth by law.

12. If the conversion of 2017 Preference Shares into ordinary shares results in a capital increase, such increase will be fully paid up at issue through the incorporation of reserves, profits or issue premiums for the corresponding amount.

13. Shareholders will be informed of the conversions having taken place by the reports of the Executive Board and Statutory Auditors pursuant to Article R. 228-18 of the French Commercial Code. These supplementary reports will be made available to the shareholders at the Company's registered office as from the date on which each general meeting is convened.

ARTICLE 13 – Usufruct / Bare Ownership

The shares are not divisible with respect to the Company.

Co-owners of shares must arrange to be represented vis-a-vis the Company by one of them only, who will be considered as the sole holder, or by a sole agent. In the case of disagreement, a sole agent may be appointed by the courts at the request of the most diligent co-owner.

Unless the Company has been notified of an agreement to the contrary, usufruct shareholders validly represent bare owners vis-à-vis the Company. The right to vote is held by the usufruct shareholder in Ordinary Meeting of Shareholders and by the bare owner in Extraordinary Meeting of Shareholders.

Unless otherwise agreed by the parties, where shares are encumbered by a usufruct interest, the preferential right to subscription attached thereto is held by the bare owner.

TITLE IV
COMPANY MANAGEMENT AND SUPERVISION

ARTICLE 14 – Management Structure

The Company is managed by an Executive Board which exercises its duties under the supervision of a Supervisory Board.

ARTICLE 15 – Composition of the Executive Board

I. The Executive Board consists of at least two members and five members at most.

II. Members of the Executive Board are appointed by the Supervisory Board.

The members of the Supervisory Board appoint one of the members of the Executive Board as Chairman of the Executive Board for the duration of his term of office as a member of the Executive Board. The Chairman of the Executive may be dismissed by the Supervisory Board.

Members of the Executive Board must be natural persons, failing which the appointment shall be null and void. They may be chosen from non-shareholders. They may be French nationals or of foreign nationality.

Members of the Executive Board may be dismissed by the Supervisory Board of the Meeting of Shareholders. They may resign at any time.

If a member of the Executive Board has entered into an employment contract with the Company, his dismissal, resignation or the expiry of his term of office as a member of the Executive Board will not cause such contract to be terminated.

The Executive Board is appointed for a term of three years. If a post is vacant, the Supervisory Board must make an appointment to fill the post within two months.

However, the terms of office of the members of the Executive Board who were duly appointed for six years by the Supervisory Board of 13 June 2005, pursuant to the provisions of the articles of association which were then applicable, shall continue to the end of their initial term and be renewed at the annual meeting of shareholders called to decide on the accounts of the financial year closing 31 December 2010.

The replacement is appointed for the remaining term until the renewal of the Executive Board. Members of the Executive Board may be reappointed.

The procedure for and amount of the remuneration of each of the members of the Executive Board is set out in the instrument appointing them.

III. No member of the Executive Board may be a member of the Supervisory Board, the Sole Chief Executive Officer or the Chairman of the Executive Board of more than one other corporation whose registered office is in metropolitan France.

Executive Board membership may only be combined with another corporate office in another company in accordance with the statutory and regulatory restrictions in force.

IV. The Executive Board meets as often as necessary in the interests of the Company and at least once a quarter, convened by its Chairman or an Executive Board member delegated to such effect, at the place decided by the person convening the meeting.

In order for deliberations to be valid, the majority of the members of the Executive Board must be physically present. However, members of the Executive Board who attend Executive Board meetings by video-conference or any other means of telecommunication in compliance with the statutory and regulatory provisions applicable to corporations with a Board of Directors management structure, are deemed to be present.

Any member of the Executive Board may be represented by another member of the Executive Board at the meetings of the Executive Board or take part in an Executive Board meeting by video-conference or any other means of telecommunication as referred to above. Each member of the Executive Board may receive only one proxy.

Decisions are made by a majority of those present and represented. Each member has one vote

At each meeting, the Executive Board may appoint a secretary who may be chosen from outside the members of the Executive Board.

V. The deliberations of the Executive Board are recorded in minutes placed or bound in a special registry.

The records are signed by the Chairman and by a member of the Executive Board who is present at the meeting, or by two of the members present.

When the Executive Board has to provide evidence of its deliberations, copies of extracts of the minutes to be submitted in evidence shall be certified by the Chairman or by a member of the Executive Board delegated for this purpose. Following dissolution of the Company, they are certified by one of the liquidators or the sole liquidator.

ARTICLE 16 - Powers of the Executive Board

I. The Executive Board has the widest of powers to act in all circumstances in the name of the Company. It exercises its powers within the scope of the corporate purposes, subject to the powers which are expressly granted by law to the Supervisory Board and the Meeting of Shareholders, and, as the case may be, within the limit of the restrictions on powers decided by the Supervisory Board.

In its relations with third parties, the Company is bound by the actions of the Executive Board even where these are outside of the scope of the corporate purposes, unless it proves that the third party was aware that the actions exceeded such purposes or if it could not have failed to be aware of this in view of the circumstances; publication of the articles of association not in itself constituting sufficient evidence thereof.

The Chairman of the Executive Board, or, as the case may be, the Chief Executive Officer, , represents the Company in its relations with third parties. The Supervisory Board may grant the same authority to represent the Company to one or more other Executive Board members, who in that case will be referred to as managing directors. The Chairman of the Executive Board and the managing director (s), if any, may designate any agent which they choose to exercise specific powers.

II. The Executive Board presents a report to the Supervisory Board at least once every quarter.

The Executive Board presents the annual financial statements to the Supervisory Board within three months of the end of each financial year, for the purposes of verification and supervision.

It must also provide the Supervisory Board with the management report which it will present to the Annual Meeting of Shareholders.

III. The Chairman of the Executive Board represents the Company in its relations with third parties.

IV. Members of the Executive Board may allocate corporate management tasks among themselves, with the approval of the Supervisory Board. However, such distribution may not, under any circumstances, cause the Executive Board to lose its collegial nature with respect to the management of the Company.

TRANSLATION FOR INFORMATION PURPOSES

ARTICLE 17 – Composition of the Supervisory Board

I. The Executive Board is supervised by a Supervisory Board composed of a minimum of three members and a maximum of eighteen members, subject to the exceptions provided by law in such respect in the event of a merger.

Members of the Supervisory Board are appointed from among natural persons or legal entities that are shareholders by the Ordinary Meeting of Shareholders, which may dismiss them at any time. However, in the case of a merger or demerger, an Extraordinary Meeting of Shareholders may appoint the members of the Supervisory Board.

No member of the Supervisory Board may be a member of the Executive Board.

The number of the members of the Supervisory Board who have reached seventy (70) years of age may not be greater than one third of the members of the Supervisory Board in office. Where such limitation concerning the age of members of the Supervisory Board is exceeded, the most elderly member of the Supervisory Board is deemed to have automatically resigned.

II. The duration of the terms of office of the members of the Supervisory Board is two years. It expires at the close of the Meeting of Shareholders called to decide on the financial statements for the preceding year and which is held during the year in which their appointment expires.

Members of the Supervisory Board may be reappointed.

They may be dismissed at any time by an Ordinary Meeting of Shareholders.

III. Members of the Supervisory Board may be natural persons or legal entities. Legal entities must, at the time of their appointment, designate a permanent representative who will be subject to the same conditions and obligations and who will incur the same liabilities provided by law as if he were a member of the Council in his own name, without prejudice to the joint and several liability of the legal entity he represents.

If a legal entity dismisses its representative, it must appoint a replacement at the same time. This rule also applies in the case of the death, resignation or long-term prevention of the permanent representative from exercising his duties.

A natural person who accepts an appointment and exercises as a member of the Supervisory Board thereby has the obligation to confirm at any time on oath, that he satisfies the limitation required by law with respect to the combining the post of member of the Supervisory Board and member of the Executive Board of corporations.

IV. Appointments which are made by the Supervisory Board in accordance with the foregoing are subject to ratification by the next following Ordinary Meeting of Shareholders. If such appointments are not ratified, the deliberations made and actions previously carried out by the Supervisory Board nevertheless remain valid.

If the number of the members of the Council becomes less than the statutory minimum, the Executive Board must immediately convene an Ordinary Meeting of Shareholders to appoint members to complete the Council.

A member of the Supervisory Board appointed to replace another member shall only remain in office for the remaining term of office of his predecessor.

V. Each member of the Supervisory Board must own one share in the Company.

If a member of the Supervisory Board does not own the required number of shares on the date of his appointment or if, during his term of office he ceases to own such number, he shall be deemed to have automatically resigned if he has not rectified this situation within six months.

TRANSLATION FOR INFORMATION PURPOSES

ARTICLE 18 – Chairman and Vice-Chairman of the Supervisory Board

The Supervisory Board appoints, from among its natural person members, a Chairman and a Vice-Chairman, who are responsible for convening the Council and chairing the proceedings of the Council.

The Chairman of Supervisory Board also prepares a report presented during the annual Ordinary Meeting of Shareholders in compliance with the conditions provided by Article L. 225-68 paragraph 7 of the Commercial Code, providing details of the conditions in which the work of the Supervisory Board was prepared and organised, and describing the internal supervision procedures implemented by the Company, which is attached to the Executive Board' report.

The Chairman and Vice-Chairman exercise their duties during their term of office as members of the Supervisory Board. They may be re-elected.

The Council may also appoint a secretary who may be selected from outside the members of the Council and determine the duration of his term of office.

ARTICLE 19 – Deliberations of the Supervisory Board

I. The Supervisory Board meets as often as necessary in the interests of the Company and at least once every quarter to review the Executive Board' report. The meeting is convened by its Chairman or Vice-Chairman either at the registered office or at any place indicated in the notice of meeting. A member of the Executive Board, or at least one third of the members of the Supervisory Board, may submit a reasoned request for a Council meeting to the Chairman of the Supervisory Board by registered mail. The Chairman must convene a Council meeting not later than fifteen days from receipt of such request. If the meeting has not been convened within this time period, the persons who made the request may convene the meeting themselves, indicating the agenda of the meeting.

The Supervisory Board cannot deliberate validly unless at least half its members are present.

Members of the Supervisory Board may participate and vote at Council meetings by video-conference or other means of telecommunication in accordance with the statutory and regulatory provisions applicable thereto. However, voting by video-conference is not allowed for decisions concerning the verification and supervisions of financial statements.

Any member of the Supervisory Board may be represented by another member of the Supervisory Board at Supervisory Board deliberations. Each member of the Supervisory Board may receive only one proxy.

Decisions are made by a majority of those present or represented, and each member has one vote.

In the event of a tie, the Chairman has the tiebreaking vote.

Evidence of the number of members of the Supervisory Board in office and their appointment may be validly provided with respect to third parties on the simple basis of the statement in the minutes of each meeting of the names of the members that are in attendance, represented or absent.

II. The deliberations of the Supervisory Board are recorded in minutes kept in a special register.

Such minutes are signed by the Chairman of the meeting and by at least one member of the Supervisory Board. If the Chairman of the meeting is unable to do so, the minutes are signed by at least two members of the Supervisory Board.

Copies or extracts of such minutes are validly certified by the Chairman of Vice-Chairman of the Supervisory Board, a member of the Executive Board or an agent duly appointed for the purpose thereof.

After the Company is wound up, copies or extracts shall be certified by one of the liquidators of by the sole liquidator.

ARTICLE 20 – Powers of the Supervisory Board

I. The Supervisory Board exercises constant supervision of the management of the Company by the Executive Board.

II. The Supervisory Board may carry out verifications or supervision which it considers suitable at any time during the year, and may request documents to be provided to it which it considers useful for the carrying out of its duties.

It receives a report from the Executive Board at least once every quarter.

The Executive Board presents the annual financial statements and a written management report to the Supervisory Board within three months of the end of each financial year, for the purposes of verification and supervision.

The Supervisory Board presents the Ordinary Annual Meeting of Shareholders with its comments on the report of the Executive Board and the financial statements for the year.

The Supervisory Board also exercises the attributions expressly granted to it by statute.

The Supervisory Board may appoint one or more of its members as special agents for one or more determined purposes.

The Supervisory Board may create committees in charge of reviewing issues on which it or its Chairman wish an opinion.

ARTICLE 21 – Remuneration of Members of the Supervisory Board

I. The Meeting of Shareholders may allocate a fixed annual amount in directors' fees to members of the Supervisory Board in remuneration for their duties. The Supervisory Board may distribute such remuneration among its members as it sees fit.

II. The Supervisory Board may also allocate exceptional remuneration for missions entrusted to its members. In such case, the remuneration is subject to the provisions of Article 22 hereafter.

III. Members of the Supervisory Board may not receive any other fixed or exceptional remuneration other than those referred to in paragraphs I and II above.

ARTICLE 22 – Regulated Agreements

I. Any agreement entered into between the Company and any of the members of the Executive Board or Supervisory Board, a shareholder with more than 10% of the voting rights or, in the case of a corporate shareholder, the company controlling it within the meaning of Article L. 233-3 of the Commercial Code with more than 10% of the voting rights, is subject to the prior approval of the Supervisory Board.

The same rule applies to agreements in which one of the persons referred to in the previous paragraph has an indirect interest or for which it has dealt with the Company through an intermediary.

Agreements between the Company and an enterprise are also subject to prior approval if one of the members of the Executive Board or the Supervisory Board of the Company is the owner, a partner with unlimited liability, a manager, director, director general, member of the Executive Board or Supervisory Board of such enterprise, or more generally is in charge of managing such enterprise.

The prior approval of the Supervisory Board is substantiated by justifying of the interest of entering the agreement for the Company, in particular by specifying the financial conditions that apply thereto.

The preceding provisions do not apply to agreements entered into in the ordinary course of business and under normal conditions, nor to agreements entered into between two companies, one of which holds, directly or indirectly, the entire share capital of the other company, excluding if applicable the minimum number of shares necessary to comply with the requirements of Article 1832 of the French Civil Code or Articles L. 225-1 and L. 226-1 of the French Commercial Code.

The member of the Executive Board or Supervisory Board concerned must inform the Supervisory Board as soon as be becomes aware of an agreement subject to approval. If he is a member of the Supervisory Board, he cannot take part in the vote of approval.

The Chairman of the Supervisory Board must inform the statutory auditor of all authorised agreements to and submit them for approval to the Meeting of Shareholders.

II. The statutory auditors present a special report on such agreements to the Meeting of Shareholders which will decide on these agreements.

The person concerned cannot take part in the vote and the shares he holds are not included in the calculation of the quorum or the majority.

The agreements entered into and authorized in previous years and which have continued during the last year shall be reviewed annually by our Supervisory Board and must be reported to our statutory auditors for the purpose of establishing their report.

ARTICLE 23 – Panel of Censors

An Ordinary Meeting of Shareholders may appoint one or more censors at its discretion, who may be natural persons or legal entities, and may be shareholders or non-shareholders, for a term of office expiring at the shareholders meeting convened to decide on the financial statements for the preceding financial year after the first anniversary date of their appointment. This appointment may be renewed an unlimited number of times.

Censors that are legal entities are represented by their legal representatives or by any natural person duly authorised for this purpose.

Censors are convened to and take part in all the meetings of the Supervisory Board and have a consultative vote, according to the same methods as those that apply to members of the Supervisory Board. They are entitled to the same information and communication as members of the Supervisory Board and are bound by the same obligations of confidentiality and discretion.

ARTICLE 24 - Obligation of Confidentiality and Liability

I. Members of the Executive Board and the Supervisory Board, as well as any person convened to attend the meetings of these bodies, are bound by complete discretion with respect to confidential information and provided as such by the Chairman of the Executive Board or as the case may be, the Supervisory Board.

II. Members of the Executive Board and the Supervisory Board are liable towards the Company or third parties, in accordance with their respective attributions, for breaches of statutory provisions governing limited liability companies, breaches of these articles of association and faults committed in the exercise of their duties, subject to the conditions and the sanctions provided by the legislation in force.

TRANSLATION FOR INFORMATION PURPOSES

TITLE V
STATUTORY AUDITORS

ARTICLE 25 - Statutory Auditors

One or more statutory auditors perform an audit of the Company, in the accordance with statutory requirements.

The Statutory Auditors are appointed by the Ordinary Meeting of Shareholders on proposal by the Supervisory Board, for six financial years. They may always be re-appointed. They may be dismissed by the aforesaid Meeting of Shareholders in the event that they commit a fault or are prevented from carrying out their duties.

If the Meeting of Shareholders does not appoint the Statutory Auditor(s) or if one or more appointed Statutory Auditors are prevented or refuse to carry out their duties, they, or their replacement(s), are appointed by an order of the Commercial Court with jurisdiction over the area in which the Company is based on petition of any interested person, with the Executive Board duly convened.

The Statutory Auditor appointed by the Meeting of Shareholders to replace another shall only remain in office for the remaining term of office of his predecessor. If the Meeting of Shareholders appoints several Statutory Auditors, they may act together or separately but they must draft a joint report.

One or more shareholder(s) with a shareholding of at least 5% may apply to the courts to dismiss one or more of the Statutory Auditors appointed by the Meeting of Shareholders and request the appointment of one or more Statutory Auditors who will exercise their duties instead of them. If their request is granted, the Statutory Auditors so appointed shall exercise their duties until the Statutory Auditors appointed by the Meeting of Shareholders take up their posts.

The Statutory Auditors certify that the annual financial statements are in due form and give a true and fair view of the result of the operations of the preceding financial year, and of the financial situation and assets and liabilities of the Company at the end of that financial year.

Their permanent role, without exercising any interference with management, is to verify the company's worth and financial documents and to ensure that its accounting is in compliance with the rules in force. They also verify that the information contained in Executive Board management report and in the documents provided to shareholders on the financial situation and annual accounts is fair and consistent with the annual accounts. The Statutory Auditors ensure that equality among shareholders has been complied with.

The Statutory Auditors may, at any time during the year, carry out any verification or supervision they consider suitable and collect any information from third parties who have carried out assignments on behalf of the Company.

The Statutory Auditors prepare a report for the Meeting of Shareholders on the performance of their assignment. The Statutory Auditors attach a report to the aforesaid report, presenting their comments on the report referred to in Article L. 225-68 paragraph 7 of the Commercial Code with respect to internal supervision procedures relating to the preparation and treatment of accounting and financial information. They also prepare a special report on the agreements referred to in Article 22 of these Articles of Association.

The Statutory Auditors are invited to attend the Executive Board meeting at which the financial statements for the preceding financial year are approved, as well as to all Meeting of Shareholders. They may convene a Meeting of Shareholders under the conditions provided by statute.

TRANSLATION FOR INFORMATION PURPOSES

TITLE VI
SHAREHOLDERS' MEETINGS

A –Provisions Applying to all Meetings of Shareholders

ARTICLE 26 - Meetings

A duly constituted Meeting of Shareholders represents all the shareholders.

Its deliberations effected in accordance with the law and the articles of association are binding on all the shareholders, even those who were absent, dissenting or without legal standing.

There are three kinds of meeting, depending on the purpose of the proposed resolutions:

- Ordinary Meeting of Shareholders,
- Extraordinary Meeting of Shareholders,
- Special Meeting of Shareholders of holders of a specific category of share.

ARTICLE 27 – Convening Meetings

Shareholders' Meetings are convened by the Executive Board, or failing that, the Supervisory Board. They may also be convened by the Statutory Auditor(s) or by an agent appointed by the court in accordance with the procedures and conditions provided by statute.

During liquidation, Shareholders' Meetings are convened by the liquidator.

Shareholders' Meetings are held at the registered office, in any other place of the same department indicated in the convocation notice or in Paris.

Notice of the meeting is published in the Bulletin des Annonces Légales Obligatoires (BALO) (Mandatory Legal Notice Bulletin) at least thirty-five days prior to which a meeting is held. In addition to the information relating to the Company, it also, in particular, sets out the agenda of the Meeting and the draft text of the resolutions which will be proposed. Subject to particular legal requirements, requests for the inclusion of draft resolutions on the agenda must be sent at the latest on the publication date of the notice of the meeting and up to twenty-five days prior to the Shareholders' Meeting; this deadline is twenty days from the publication date of the notice when the notice is published more than forty-five days prior to the Shareholders' Meeting.

Subject to particular legal requirements, invitations to meetings are made at least fifteen days prior to the date of the meeting by a notice published in both the legal notice journal of the administrative department in which the registered office is located and in the Bulletin des Annonces Légales Obligatoires (BALO).

However, holders of registered shares having held shares for at least one month as at the date of the last of the published notices must be convened individually by ordinary letter (or by registered letter if they have requested this and advanced the costs) sent to their last known address. Such notice may also be sent by electronic communication instead of such postal dispatch, to any shareholder who has so requested beforehand by registered mail return receipt requested, in accordance with statutory and regulatory requirements, indicating his email address. Such shareholder may send a request to the Company at any time by registered letter with acknowledgement of receipt for the aforementioned method of telecommunication to be replaced by postal dispatch in the future.

The invitation should contain the following information:

- the identity of the Company;
- the date, time and place of the meeting;

- the nature of the meeting; and
- the agenda of the meeting.

It must also state the conditions in which shareholders may vote by correspondence and the place and conditions pursuant to which they may procure forms for voting by correspondence.

The invitation may be sent, as the case may be, together with proxy form and a correspondence voting form, pursuant to the conditions set out in Article 30. I of these Articles of Association, or with a correspondence voting form only, pursuant to the conditions set out in Article 30. II of these Articles of Association.

If a Shareholders' Meeting has not been able to deliberate due to the required quorum not being reached, a second Shareholders' Meeting is convened with at least ten days' advance notice, in the same manner as the first meeting. The invitation notice or letters for such second Shareholders' Meeting state the date and agenda of the first meeting.

ARTICLE 28 - Agenda

The agenda of a Meeting of Shareholders is decided by the person convening the meeting.

One or more shareholders representing at least the percentage of share capital determined by statute and acting pursuant to statutory conditions and within statutory time periods, may request items or draft resolutions to be included on the agenda of the Meeting by registered mail with confirmation of receipt.

The Meeting of Shareholders cannot deliberate on an issue which has not been included on the agenda and such agenda cannot be modified on second convocation of a Meeting of Shareholders. The Meeting of Shareholders may, however, in any circumstances, dismiss one or several members of the Supervisory Board and effect their replacement.

ARTICLE 29 – Participation of Shareholders in Meeting of Shareholders

All shareholders are entitled to attend Shareholders' Meetings and take part in deliberations:

(i) either personally; or

(ii) by giving a proxy to another shareholder or to his spouse; or

(iii) by sending a blank proxy to the Company; or

(iv) by voting by correspondence; or

(v) by videoconference or by another means of telecommunication in accordance with the applicable statutory and regulatory provisions.

Participation in shareholders' meetings in any manner is dependent on the registration or inscription of shares under the conditions and within the deadlines set in the current regulations.

The final date for the return of correspondence voting forms is determined by the Executive Board and indicated in the notice of the meeting published in the Bulletin des Annonces Légales et Obligatoires (BALO). This date cannot be prior to three days before the Shareholders' Meetings.

If a shareholder is present at a Shareholders' Meeting, any prior vote by correspondence will have no effect for the purposes of the aforesaid Shareholders' Meeting.

If both a proxy form and a correspondence voting form are returned, the proxy form will be taken into account, subject to the votes expressed in the correspondence voting form.

TRANSLATION FOR INFORMATION PURPOSES

ARTICLE 30 – Representation of Shareholders

I. Any shareholder may be represented at Meeting of Shareholders by another shareholder, his spouse, his partner in a civil union or any other natural or legal person of his choice through a proxy form sent to the shareholder by the Company:

- either at his request, sent to the Company by any means. This request must have been received at the registered office at least five days prior to the Meeting of Shareholders; or
- at the initiative of the Company.

The following must be attached to any proxy form sent to shareholders by the Company, for each Meeting of Shareholders:

- the agenda of the Meeting;
- the draft resolutions presented by the Executive Board and, as the case may be, by shareholders pursuant to statutory conditions;
- a brief summary of the Company's situation during the preceding financial year together with a table indicating the results of the Company over the past five financial years, presented in accordance with regulatory provisions;
- a form requesting the documents to be sent as provided by the regulations in force; and
- a form for correspondence voting.

A proxy given by a shareholder is only valid for one Meeting of Shareholders or for Meetings of Shareholders convened successively with the same agenda. A proxy may also be given for two Meeting of Shareholders, one Ordinary and the other Extraordinary, which are held on the same day or within fifteen days.

II. Any shareholder may vote by correspondence through a voting form sent to him by the Company:

- at his request, sent to the Company by registered mail with confirmation of receipt. This request must have been received at the registered office at least six days prior to the Meeting of Shareholders; or
- at the initiative of the Company; or
- in an appendix to the proxy form in the conditions set out in Article 30. I above.

The following must be attached to any correspondence voting form sent to shareholders by the Company:

- the draft resolutions proposed together with a summary of the reasons and an indication of the author of the resolutions;
- a form for sending the documents as provided by the regulations in force; and
- a brief summary of the Company's situation during the preceding financial year together with a table indicating the results of the Company over the past five financial years, presented in accordance with regulatory provisions, in the case of an Ordinary Meeting of Shareholders deciding on the accounts.

A correspondence voting form sent by a shareholder is only valid for one Meeting of Shareholders or for Meeting of Shareholders convened successively with the same agenda.

ARTICLE 31 – Attendance Register

An attendance register is kept for each Meeting of Shareholders containing the information required by law.

This attendance register, duly signed by the shareholders that are present, the agents and shareholders participating by video-conference or by another means of telecommunication in compliance with statutory and regulatory requirements, and to which are attached the powers of attorney granted to each agent and, as the case may be, the correspondence voting forms, is certified by the secretariat of the Meeting of Shareholders.

Meeting of Shareholders are chaired by the Chairman of the Supervisory Board, the Vice-Chairman or a member of the Supervisory Board delegated for such purpose by the aforesaid Council. Failing that, the Meeting of Shareholders elects its Chairman itself.

The two shareholders present with the greatest number of votes both on in their own right and as agents, and who accept such assignment, shall act as vote tellers.

The secretariat composed as such appoints a Secretary, who may be selected from outside of the shareholders.

ARTICLE 32 – Quorum

In Ordinary and Extraordinary Meeting of Shareholders, the quorum is calculated on the basis of all the shares making up the share capital and, in Special Meeting of Shareholders, all the shares of the relevant category, less shares stripped of their voting rights pursuant to statutory provisions.

The voting rights attached to shares are proportional to the portion of share capital which they represent. Each share entitling its holder to an interest in the capital or to beneficial enjoyment carries one vote.

In the case of a vote by correspondence, only completed forms received by the Company at least three days prior the Meeting of Shareholders shall be taken into account for the calculation of the quorum.

Forms which do not indicate which way to vote, or which indicate an abstention, are considered as negative votes.

ARTICLE 33 - Minutes

The deliberations of the Meeting of Shareholders are recorded in minutes drafted in a special register held at the registered office and signed by the members of the secretariat.

Copies or extracts of such minutes are certified either by the Chairman of Vice-Chairman of the Supervisory Board or by a member of the Executive Board or by the Secretary of the Meeting. If the Company is wound up, they may be validly certified by the liquidator(s).

ARTICLE 34 – Communication of Documents

Any shareholder is entitled to receive, and the Executive Board is bound to send or provide him with the documents he requires to come to an informed decision and have an informed judgement on the management and running of the Company.

The nature of these documents and the conditions in which they are sent or provided to shareholders are determined by regulations in force.

TRANSLATION FOR INFORMATION PURPOSES

In exercising its right to receive documents, each shareholder or his agent may be assisted by a court-registered expert.

The exercise of the right to receive documents includes the right to make copies, except with respect to inventories.

B – Provisions Specific to Ordinary Meetings of Shareholders

ARTICLE 35 – Ordinary Meeting of Shareholders

An Ordinary Meeting of Shareholders may make any decision other than one which directly or indirectly modifies the Articles of Association.

Ordinary Meetings of Shareholders are held at least once a year, within six months of the end of each financial year, to decide on the financial statements for such financial year, subject to the extension of such period by an order of the President of the Commercial Court on petition from the Executive Board.

They are called on an extraordinary basis every time it may be in interests of the Company to do so.

When convened for the first time, Ordinary Meetings of Shareholders can only make valid decisions if the shareholders that are present, represented or voting by correspondence hold at least one fifth of the shares carrying the right to vote.

When convened for the second time, there is no quorum requirement if the original agenda has not been modified.

Ordinary Meetings of Shareholders make decisions on the basis of the majority of the votes of the shareholders that are present, represented or voting by correspondence.

C - Provisions Specific to Extraordinary Meetings of Shareholders

ARTICLE 36 – Extraordinary Meetings of Shareholders

An amendment to any provision of the Articles of Association and, in particular, the transformation of the Company into another form of company may only be decided by an Extraordinary Meeting of Shareholders. An Extraordinary Meeting of Shareholders cannot, however, increase the undertakings of shareholders, subject to operations as a result of regrouping shares in a due and proper manner.

When convened for the first time, Extraordinary Meeting of Shareholders can only make valid decisions if the shareholders that are present, represented or voting by correspondence hold at least a quarter of the shares carrying the right to vote, and when convened for the second time, one fifth of the shares carrying the right to vote. If the latter quorum is not obtained, the second Meeting may be adjourned for a maximum of two months from the date at which it was convened.

An Extraordinary Meeting of Shareholders makes decisions on the basis of a majority of two-thirds of the votes held by shareholders that are present, represented or voting by correspondence or participating in the Meeting by video-conference or another method of telecommunication in accordance with statutory and regulatory provisions.

By statutory derogation from the preceding provisions, if the share capital is increased by the incorporation of profits, reserves or issue premiums, the Extraordinary Meeting of Shareholders may make decisions at the quorum and majority required for Ordinary Meeting of Shareholders.

Moreover, where an Extraordinary Meeting of Shareholders is convened to deliberate on the approval of a contribution in kind or the grant of a specific benefit, the shares of the contributing party or beneficiary shall not be taken into account in calculating the majority. The contributing party or beneficiary cannot vote either in his own right or as an agent.

D - Provisions Specific to Special Meetings of Holders of a Category of Shares

ARTICLE 37 – Special Meeting

If there are several categories of shares, the rights attached to shares of any such category cannot be modified in any way without having been duly voted upon by an Extraordinary Meeting of Shareholders open to all shareholders and also having been voted upon by a Special Meeting open only to holders of the relevant category of shares.

When convened for the first time, Special Meetings of Shareholders can only make valid decisions if the shareholders that are present, represented, voting by correspondence or taking part in the Meeting by video-conference or any other means of telecommunication in accordance with statutory or regulatory provisions, hold at least a third of the shares carrying the right to vote, and when convened for the second time, one fifth of the shares carrying the right to vote and for which a modification of the attached rights is being proposed. Failing that, the second meeting may be adjourned by a maximum of two months from the date at which it was convened.

Special Meetings of Shareholders make decisions at a two-thirds majority of the votes of shareholders that are present or represented.

TITLE VII
FINANCIAL YEAR – ANNUAL FINANCIAL STATEMENTS APPROPRIATION AND DISTRIBUTION OF PROFITS

ARTICLE 38 – Financial Year

The financial year begins on 1st January of each year and ends on 31st December.

ARTICLE 39 - Accounts

Accounts of corporate operations are kept in due form in accordance with the law and usual business practice.

At the end of each financial year, the Executive Board shall draw up an inventory of the various assets and liabilities as at such date. It shall also prepare the balance sheet describing the assets and liabilities, the income statement summarising the income and charges for the financial year and the notes to the financial statements which complete and comment on the information provided in the balance sheet and income statement.

The Executive Board shall present such documents to the Supervisory Board within three months of the end of the financial year, for the purposes of verification and supervision.
It shall prepare the management report on the situation of the Company during the preceding financial year.

All such documents shall be made available to the Statutory Auditors pursuant to the conditions specified by law.

TRANSLATION FOR INFORMATION PURPOSES

ARTICLE 40 – Appropriation of Profits

The income statement which summarises the income and charges for the financial year, after depreciation and provisions have been deducted, indicates the profit or loss of the financial year by setting forth the difference between these two amounts.

Five per cent. of the year's profit less previous losses, as the case may be, is allocated to the statutory reserve. Such allocation shall no longer be necessary once the aforesaid reserve reaches one tenth of the share capital, but will become necessary again if for any reason whatsoever the reserve falls below one tenth.

Distributable earnings consist of the net income of the financial year, less previous losses and amounts added to the reserve in accordance with the law or the Articles of Association, plus retained earnings.

Moreover, the Meeting of Shareholders may decide to distribute amounts deducted from the reserves which are available to it, expressly indicating the reserves from which the withdrawals are to be made. However, dividend is paid out in priority from the distributable income of the financial year.

Except in the case of a reduction in share capital, no distribution may be made to shareholders if shareholders' equity is, or would become as a result of such distribution, less than the share capital plus the reserves which the law or the Articles of Incorporation do not allow to be distributed.

After the financial statements have been approved and the existence of distributable income has been acknowledged, the Meeting of Shareholders shall determine the part to be allocated to shareholders as dividends, in proportion to the number of shares held by each.

However, after the allocation of the amounts required by law to the reserve, the Meeting of Shareholders may decide to allocate all or part of the distributable income to a retained earnings account or to any general or special reserve account.

Any losses are deducted from profits from previous years until such losses are extinguished or they are carried over.

The Executive Board may decide to distribute interim dividends prior to the approval of the financial statements of the financial year, pursuant to the conditions determined or authorised by law. The amount of such instalments cannot exceed the amount of earnings as defined by law.

ARTICLE 41 - Dividends

I. The procedure for the payment of dividends is determined by the Meeting of Shareholders or, failing that, by the Executive Board. However, payment must be made within a maximum of nine months after the end of the financial year, unless such period is extended by court decision.

Shareholders may not be required to reimburse any amount of dividends unless the distribution of dividends was in violation of law.

Claims for dividends made more than five years after they have been made available for payment shall time-barred.

II. The Meeting of Shareholders convened to approve the financial statements for the financial year may grant shareholders the option of dividends or interim dividends being paid in cash or in shares issued by Company, in whole or in part, in accordance with the conditions set out or authorised by law.

TITLE VIII
SHAREHOLDERS' EQUITY FALLING BELOW ONE-HALF OF THE SHARE CAPITAL

ARTICLE 42 – Early Winding Up

If the Company's shareholders' equity falls below one-half of the share capital as a result of losses recorded in the financial statements, the Executive Board must convene an Extraordinary Meeting of Shareholders within four months of the approval of the financial statements which recorded such loss to decide whether to wind up the Company.

If it is not decided to wind up the Company, the share capital must be reduced by an amount equal to the recorded losses, within a period determined by law, if shareholders' equity has not reached at least one-half the amount of the share capital again within such period.

In either case, the decision of the Meeting of Shareholders shall be published according to regulatory conditions.

The reduction of share capital to an amount below the statutory minimum can only be decided subject to the condition precedent of a share capital increase to at least the statutory minimum.

If the provisions of one or more of the foregoing paragraphs are not complied with, any interested party may apply to the courts for the Company to be wound up. This rule also applies if the shareholders are unable to deliberate validly.

However, the court may not wind up the Company if on the day of issue of a judgment on the substance of the matter the situation has been rectified.

TITLE IX
WINDING-UP – LIQUIDATION

ARTICLE 43 – Winding Up

The Company shall be wound up on expiry of the term determined in the Articles of association, unless this is extended, or pursuant to a decision of an Extraordinary Meeting of Shareholders.

The Company may also be wound up at the request of any interested party, where the number of shareholders has dropped to under seven for more than one year. In such case, the court may grant the Company a maximum of six months in which to rectify the situation. It cannot wind up the Company if on the day it issued judgment on the substance of the matter, the situation has been rectified.

The Company shall be in liquidation as from the date on which it is wound up, for any reason whatsoever.

Winding up will cause the terms of office of members of the Executive Board to terminate. The Supervisory Board and Statutory Auditors shall continue to operate.

Meeting of Shareholders shall retain the same powers as during the life of the company.

The Meeting of Shareholders which decides to wind up the company shall determine the procedure for liquidation and appoint one or more liquidators and determine their powers. The liquidator(s) shall exercise their duties in accordance with the law in force.

The Company shall continue to have legal personality for the purposes of and until the completion of its liquidation. However, its corporate name should be followed by the words "Company in liquidation" as well as the name(s) of the liquidator(s) on any instruments or documents issued by the Company to third parties.

TRANSLATION FOR INFORMATION PURPOSES

Shares remain negotiable until the completion of liquidation.

After liabilities have been cleared, the net proceeds of liquidation are applied to the full repayment of paid up non-depreciated shares.

Any surplus shall be distributed among the shareholders in proportion to the number of shares held by each of them.

TITLE X
DISPUTES

ARTCLE 44 - Disputes

Any dispute which may arise during the life or liquidation of the Company, either between shareholders and the Company or between the shareholders themselves, concerning corporate matters, shall be resolved in accordance with the law and submitted to the jurisdiction of the competent courts at the registered office.

To this effect, in the case of a dispute, any shareholder is bound to designate an address for service of process within the area of jurisdiction of the court of the Company's registered office, any writs or notifications shall be validly issued to that address.

If an address for service of process is not designated, writs or notifications shall be validly issued to the Public Prosecutor of the Court of First Instance in the area of the registered office.

Exhibit 12.1

Certification by the Principal Executive Officer pursuant to
Securities Exchange Act Rules 13a-14(a) and 15d-14(a)
as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002

I, Mondher Mahjoubi, M.D., certify that:

1. I have reviewed this annual report on Form 20-F of Innate Pharma S.A.;

2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;

3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the Company as of, and for, the periods presented in this report;

4. The Company's other certifying officer(s) and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) for the Company and have:

    (a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the Company, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;

    (b) Evaluated the effectiveness of the Company's disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this report based on such evaluation; and

    (c) Disclosed in this report any change in the Company's internal control over financial reporting that occurred during the period covered by the annual report that has materially affected, or is reasonably likely to materially affect, the Company's internal control over financial reporting; and

5. The Company's other certifying officer(s) and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the Company's auditors and the audit committee of the Company's board of directors (or persons performing the equivalent functions):

    (a) All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonably likely to adversely affect the Company's ability to record, process, summarize and report financial information; and

    (b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the Company's internal control over financial reporting.

Date: April 24, 2020

/s/ Mondher Mahjoubi
Name: Mondher Mahjoubi
Title: Chief Executive Officer *(Principal Executive Officer)*

Exhibit 12.2

Certification by the Principal Financial Officer pursuant to
Securities Exchange Act Rules 13a-14(a) and 15d-14(a)
as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002

I, Laure-Hélène Mercier, certify that:

1. I have reviewed this annual report on Form 20-F of Innate Pharma S.A.;

2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;

3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the Company as of, and for, the periods presented in this report;

4. The Company's other certifying officer(s) and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) for the Company and have:

    (a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the Company, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;

    (b) Evaluated the effectiveness of the Company's disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this report based on such evaluation; and

    (c) Disclosed in this report any change in the Company's internal control over financial reporting that occurred during the period covered by the annual report that has materially affected, or is reasonably likely to materially affect, the Company's internal control over financial reporting; and

5. The Company's other certifying officer(s) and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the Company's auditors and the audit committee of the Company's board of directors (or persons performing the equivalent functions):

    (a) All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonably likely to adversely affect the Company's ability to record, process, summarize and report financial information; and

    (b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the Company's internal control over financial reporting.

Date: April 24, 2020

/s/ Laure-Hélène Mercier
Name: Laure-Hélène Mercier
Title: Chief Financial Officer *(Principal Financial Officer)*

Exhibit 13.1

Certification by the Principal Executive Officer and Principal Financial Officer pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002

Pursuant to the requirement set forth in Rule 13a-14(b) of the Securities Exchange Act of 1934, as amended (the "Exchange Act"), and Section 1350 of Chapter 63 of Title 18 of the United States Code (18 U.S.C. §1350), Mondher Mahjoubi, M.D., Chief Executive Officer of Innate Pharma S.A. (the "Company"), and Laure-Hélène Mercier, Chief Financial Officer of the Company, each hereby certifies that, to the best of his knowledge:

(1) The Company's Annual Report on Form 20-F for the year ended December 31, 2019, to which this Certification is attached as Exhibit 13.1 (the "Report") fully complies with the requirements of Section 13(a) or 15(d) of the Exchange Act, as amended; and

(2) The information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of the Company.

Date: April 24, 2020

/s/ Mondher Mahjoubi, M.D.
Name: Mondher Mahjoubi, M.D.
Title: Chief Executive Officer (*Principal Executive Officer*)

/s/ Laure-Hélène Mercier
Name: Laure-Hélène Mercier
Title: Chief Financial Officer (*Principal Financial Officer*)