

**UNITED STATES  
SECURITIES AND EXCHANGE COMMISSION  
Washington, D.C. 20549**

**FORM 10-K**

(Mark One)

☒ **ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**  
For the fiscal year ended December 31, 2024

or

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

For the transition period from \_\_\_\_\_ to \_\_\_\_\_

Commission File Number 001-42001

**Contineum Therapeutics, Inc.**

(Exact name of registrant as specified in its charter)

Delaware	27-1467257
State or other jurisdiction of incorporation or organization	(I.R.S. Employer Identification No.)
3565 General Atomics Court, Suite 200 San Diego, California	92121
(Address of principal executive offices)	(Zip Code)

Registrant's telephone number, including area code: (858) 333-5280

Securities registered pursuant to Section 12(b) of the Act:

Title of each class	Trading Symbol(s)	Name of each exchange on which registered
Class A Common Stock, \$0.001 par value per share	CTNM	The Nasdaq Stock Market LLC (Nasdaq Global Select Market)

Securities registered pursuant to section 12(g) of the Act: **None**

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

Indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Act. ☐ 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). ☒ Yes ☐ No

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

Large accelerated filer ☐

Accelerated filer ☐

Non-accelerated filer ☒

Smaller reporting company ☒

Emerging growth company ☒

If an emerging growth company, 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 whether the registrant has filed a report on and attestation to its management's assessment of the effectiveness of its internal control over financial reporting under Section 404(b) of the Sarbanes-Oxley Act (15 U.S.C. 7262(b)) by the registered public accounting firm that prepared or issued its audit report. ☐

If securities are registered pursuant to Section 12(b) of the Act, indicate by check mark whether the financial statements of the registrant included in the filing reflect the correction of an error to previously issued financial statements. ☐

Indicate by check mark whether any of those error corrections are restatements that required a recovery analysis of incentive-based compensation received by any of the registrant's executive officers during the relevant recovery period pursuant to §240.10D-1(b). ☐

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Act). ☐ Yes ☒ No

The aggregate market value of the voting and non-voting common stock held by non-affiliates of the registrant, as of June 28, 2024, the last business day of the registrant's most recently completed second fiscal quarter, was approximately \$356.0 million based on the closing price of \$17.61 as reported on The Nasdaq Global Select Market on such date. Solely for the purposes of this disclosure, shares of common stock held by executive officers, directors and certain stockholders of the registrant as of such date have been excluded because such holders may be deemed to be affiliates.

As of February 28, 2025, the registrant had 25,871,549 total shares outstanding, of which there were 19,142,377 shares of Class A common stock, \$0.001 par value per share, outstanding and 6,729,172 shares of Class B common stock, \$0.001 par value per share, outstanding.

**DOCUMENTS INCORPORATED BY REFERENCE**

Portions of the registrant's definitive proxy statement for its 2025 Annual Meeting of Stockholders, which the registrant intends to file pursuant to Regulation 14A with the Securities and Exchange Commission not later than 120 days after the registrant's fiscal year ended December 31, 2024, are incorporated by reference into Part III of this Annual Report on Form 10-K.



# CONTINEUM THERAPEUTICS, INC.

## TABLE OF CONTENTS

### Page

#### **PART I.**

Item 1.	Business .....	5
Item 1A.	Risk Factors .....	51
Item 1B.	Unresolved Staff Comments .....	103
Item 1C.	Cybersecurity .....	103
Item 2.	Properties .....	104
Item 3.	Legal Proceedings .....	104
Item 4.	Mine Safety Disclosures .....	104

#### **PART II.**

Item 5.	Market for Registrant’s Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities .....	105
Item 6.	[Reserved] .....	107
Item 7.	Management’s Discussion and Analysis of Financial Condition and Results of Operations .....	107
Item 7A.	Quantitative and Qualitative Disclosures About Market Risk .....	119
Item 8.	Financial Statements and Supplementary Data .....	F-1
Item 9.	Changes in and Disagreements With Accountants on Accounting and Financial Disclosure .....	120
Item 9A.	Controls and Procedures .....	120
Item 9B.	Other Information .....	120
Item 9C.	Disclosure Regarding Foreign Jurisdictions that Prevent Inspections .....	121

#### **PART III.**

Item 10.	Directors, Executive Officers and Corporate Governance .....	121
Item 11.	Executive Compensation .....	121
Item 12.	Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters .....	121
Item 13.	Certain Relationships and Related Transactions, and Director Independence .....	121
Item 14.	Principal Accountant Fees and Services .....	121

#### **PART IV.**

Item 15.	Exhibits and Financial Statement Schedules .....	121
Item 16.	Form 10–K Summary .....	124

*This page intentionally left blank*

## SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS

This Annual Report on Form 10-K (this Annual Report) contains forward-looking statements. All statements other than statements of historical facts contained in this Annual Report, including statements regarding our future results of operations and financial position, future revenue, business strategy, prospects, products, planned preclinical studies and clinical trials, results of clinical trials, research and development costs, regulatory approvals, timing and likelihood of success, as well as plans and objectives of management for future operations, are forward-looking statements. These statements involve known and unknown risks, uncertainties and other important factors that are in some cases beyond our control and may cause our actual results, performance or achievements to be materially different from any future results, performance or achievements expressed or implied by the forward-looking statements.

The words “anticipate,” “believe,” “contemplate,” “continue,” “could,” “estimate,” “expect,” “intend,” “may,” “might,” “plan,” “potential,” “predict,” “project,” “should,” “target,” “will,” or “would” or the negative of these terms or other similar expressions are intended to identify forward looking statements. Forward-looking statements contained in this report include, but are not limited to, statements about:

- the likelihood of our clinical trials demonstrating the safety and efficacy of our drug candidates;
- the timing and progress of our current clinical trials, the expected results of these clinical trials and the timing of initiation of our planned and future clinical trials;
- our plans relating to the clinical development of our current and future drug candidates, including the size, number and disease indications to be evaluated;
- Janssen Pharmaceutica NV, a Johnson & Johnson company’s (“J&J”), plans related to the clinical development of PIPE-307;
- our clinical translational approach, and our ability to identify and develop drug candidates that can potentially treat neuroscience, inflammation and immunology (“NI&I”) diseases by targeting biological pathways associated with specific clinical impairment to alter the course of disease;
- the size of the market opportunities for our drug candidates;
- the rate and degree of market acceptance and clinical utility of our drug candidates;
- our plans relating to commercializing our drug candidates, if approved;
- the success of competing therapies and technologies that are or may become available;
- the beneficial characteristics, safety, efficacy, therapeutic effects and potential advantages of our drug candidates;
- the timing or likelihood of regulatory filings and approval for our drug candidates;
- our ability to obtain and maintain regulatory approval of our drug candidates and our drug candidates to meet existing or future regulatory standards;
- our plans relating to the further development and manufacturing of our drug candidates, including additional indications for which we may pursue;
- our ability to successfully identify and complete transactions to in-license or otherwise acquire additional drug candidates, technologies, products or businesses;
- our ability to attract and to enter into commercial arrangements with third parties who have development, regulatory, manufacturing and commercialization expertise;
- our plans and ability to obtain or protect intellectual property rights, including extensions of existing patent terms where available, as well as our ability to secure and maintain intellectual property regulatory rights and regulatory protections;

- our ability to retain our senior management;
- the need to hire additional personnel and our ability to attract and retain such personnel;
- the accuracy of our estimates regarding expenses, capital requirements and needs for additional financing;
- the sufficiency of our existing capital resources to fund our future operating expenses and capital expenditure requirements;
- the period during which we expect we will qualify as an emerging growth company under the JOBS Act or a smaller reporting company; and
- our anticipated use of our existing cash, cash equivalents and short-term investments.

These forward-looking statements are subject to a number of risks, uncertainties and assumptions, including those described in the section titled “Risk Factors” elsewhere in this report. Moreover, we operate in a very competitive and rapidly changing environment. New risks emerge from time to time. It is not possible for our management to predict all risks, nor can we assess the impact of all factors on our business or the extent to which any factor, or combination of factors, may cause actual results to differ materially from those contained in any forward-looking statements we may make. In light of these risks, uncertainties and assumptions, the forward-looking events and circumstances discussed in this report may not occur and actual results could differ materially and adversely from those anticipated or implied in the forward-looking statements.

You should not rely upon forward-looking statements as predictions of future events. Although we believe that the expectations reflected in the forward-looking statements are reasonable, we cannot guarantee that the future results, advancements, discoveries, levels of activity, performance or events and circumstances reflected in the forward-looking statements will be achieved or occur. Moreover, except as required by law, neither we nor any other person assumes responsibility for the accuracy and completeness of the forward-looking statements. We undertake no obligation to update publicly any forward-looking statements for any reason after the date of this report to conform these statements to actual results or to changes in our expectations.

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 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 you are cautioned not to unduly rely upon these statements.

This Annual Report on Form 10-K also contains estimates, projections and other information concerning our industry, our business, and the markets for our product candidates, including data regarding the estimated size of markets for therapeutics and the incidence of certain medical conditions, statements that certain drugs, classes of drugs, or dosages are widely prescribed in the United States or other markets, statements regarding the perceptions and preferences of patients and physicians regarding certain therapies and other prescription, prescriber and patient data, as well as data regarding market research, estimates and forecasts prepared by our management. Information that is based on estimates, forecasts, projections, market research or similar methodologies is inherently subject to uncertainties, and actual events or circumstances may differ materially from events and circumstances reflected in this information. Unless otherwise expressly stated, we obtained this industry, business, market and other data from reports, research surveys, studies and similar data prepared by market research firms and other third parties, industry, medical and general publications, government data and similar sources.

You should read the following together with the more detailed information regarding our company, our common stock and our financial statements and notes to those statements appearing elsewhere in this report or incorporated by reference. The Securities and Exchange Commission (“SEC”) allows us to “incorporate by reference” information that we file with the SEC, which means that we can disclose important information to you by referring you to those documents. The information incorporated by reference is considered to be part of this report.

Unless the context otherwise requires, the terms “Contineum Therapeutics,” “Contineum,” “we,” “us,” “our,” the “Company,” and similar references in this Annual Report on Form 10-K refer to Contineum Therapeutics, Inc. and references to our “common stock” refer to our voting Class A common stock.

## SUMMARY OF RISKS ASSOCIATED WITH OUR BUSINESS

We face risks and uncertainties associated with our business, many of which are beyond our control. Some of the more significant risks associated with our business include the following:

- We are heavily dependent on the success of PIPE-791, our lead drug candidate, and PIPE-307, both of which are in the early stages of clinical development. If these drug candidates do not progress through clinical development, eventually receive regulatory approval or, even if approved, are not successfully commercialized, our business will be materially adversely harmed.
- Clinical drug development is a lengthy, expensive and risky process with uncertain timelines and uncertain outcomes. The results of earlier preclinical studies and clinical trials, including those conducted by third parties, may not be predictive of future results. If clinical trials for the drug candidates we develop do not meet safety or efficacy endpoints or are prolonged or delayed, these drug candidates may not receive the required regulatory approvals, and therefore could not be commercialized on a timely basis or at all. Further, the results of our preclinical studies, clinical trials, or analyses may not be indicative of results that may be obtained in later trials.
- The regulatory approval processes of the U.S. Food and Drug Administration (“FDA”) and comparable foreign regulatory authorities are unpredictable, lengthy, and time-consuming, and if we are ultimately unable to obtain regulatory approval for PIPE-791 or any other drug candidates that we develop J&J is unable to obtain regulatory approval for PIPE-307, our business will be substantially harmed.
- We may not be successful in our efforts to identify and develop additional drug candidates or identify additional indications. Due to our limited resources and access to capital, we must prioritize development of a limited number of drug candidates, the choice of which may prove to be wrong and adversely affect our business.
- We have and may continue to conduct future clinical trials outside of the United States. The FDA and other regulatory authorities or ethics committees may not accept data from such trials, in which case our development plans will be delayed, which could materially harm our business and financial condition.
- We have incurred significant operating expenses since inception and anticipate that our operating expenses will continue to significantly increase for the foreseeable future. As a result, we may be unable to sustain profitability, and if we are unable to achieve sustained profitability, the market value of our common stock will likely decline.
- We have a limited operating history and the drug candidates we have developed are in the early stages of clinical development, which may make it difficult to evaluate the prospects for our future viability.
- We will require significant additional capital to complete the development and commercialization of PIPE-791 and the other drug candidates we select for development.
- If the J&J License Agreement does not result in the successful development of PIPE-307, our business, financial condition and results of operations will be harmed.
- We may seek to grow our business through in-licensing transactions or otherwise by acquiring drug candidates or complementary products, technologies or businesses. The failure to properly identify these drug candidates, products, technologies or businesses, as well as the failure to successfully complete transactions or to integrate any such drug candidates, products, technologies or businesses that we do in-license or acquire with our existing business, could harm our business, financial condition and operating results.
- If we are unable to obtain, maintain and enforce intellectual property protection for our technology and drug candidates or if the scope of the intellectual property protection we obtain is not sufficiently broad, our competitors could develop and commercialize technology and products similar or identical to ours, and our ability to successfully commercialize and generate revenues from our drug candidates may be adversely affected.
- We currently rely on third-party contract manufacturing organizations (“CMOs”) for the production of clinical supplies of PIPE-791 and PIPE-307 and we intend to rely on CMOs for our future drug candidates, as well as to supply the raw materials necessary to produce our drug candidates. We may elect to continue to rely on CMOs for the production of commercial supplies of PIPE-791, if approved. Our dependence on CMOs may impair our development of drug candidates and may impair their commercialization, which would adversely impact our business and financial position.

- We rely on third parties to conduct our ongoing clinical trials of PIPE-791 and PIPE-307 and expect to rely on third parties to conduct future clinical trials of PIPE-791 and any other drug candidates that we develop. If these third parties do not successfully carry out their contractual duties, comply with regulatory requirements or meet expected deadlines, we may not be able to obtain regulatory approval for or commercialize the drug candidates we develop and our business could be substantially harmed.
- Our future success depends on our ability to retain our key personnel and to attract, retain and motivate qualified personnel.
- We face significant competition from biotechnology, pharmaceutical, and medical device companies, and our operating results will suffer if we fail to compete effectively and in a timely manner.
- Even if PIPE-791 or PIPE-307 receives marketing approval in an indication, it may fail to achieve market acceptance by physicians, patients, third-party payors, or others in the medical community necessary for commercial success.
- We have no sales, marketing or distribution capabilities or experience. If we are unable to establish sales and marketing capabilities either on our own or in collaboration with third parties, we may not be successful in commercializing PIPE-791, even if approved.
- Our amended and restated certificate of incorporation provides that the Court of Chancery of the State of Delaware and the U.S. federal district courts are the exclusive forums for substantially all disputes between us and our stockholders, which could limit our stockholders' ability to obtain a favorable judicial forum for disputes with us or our directors, officers or employees.



## PART I

### Item 1. Business.

#### Overview

We are a clinical-stage biopharmaceutical company pioneering differentiated therapies for the treatment of NI&I indications with significant unmet need. We target biological pathways associated with specific clinical impairments that we believe, once modulated, will demonstrably alter the course of disease.

We have focused our efforts on developing selective compounds targeting challenging molecular pathways and have built a portfolio of small molecule drug candidates. We believe our two clinical stage, internally-discovered drug candidates, PIPE-791 and PIPE-307, will have broad applicability across multiple NI&I indications. We are developing PIPE-307 in collaboration with J&J.













Our wholly-owned lead asset, PIPE-791, is a novel, brain penetrant, small molecule inhibitor of the lysophosphatidic acid 1 receptor (“LPA1R”) in development for idiopathic pulmonary fibrosis (“IPF”), progressive multiple sclerosis (“PrMS”), and chronic pain. LPA1R antagonism is a clinically validated mechanism in IPF, and we believe that our preclinical studies and Phase 1 healthy volunteer data support the development of PIPE-791 for IPF, as well as PrMS and chronic pain. Specifically, based on its high bioavailability, low plasma protein binding, and long receptor residence time in our preclinical studies compared to the preclinical data of other LPA1R antagonists, we believe PIPE-791 has the potential to be a differentiated LPA1R therapy. We have completed a Phase 1 clinical trial of PIPE-791 in healthy volunteers in support of clinical development in IPF, PrMS and chronic pain. In December 2024, we commenced a Phase 1b open-label trial to measure the relationship of pharmacokinetics (“PK”) to lung and brain receptor occupancy by positron emission tomography (“PET”) imaging. We expect the top-line data from this trial will be available in the second quarter of 2025. This Phase 1b PET trial will inform dose selection for our planned Phase 2 trials of PIPE-791 in IPF and PrMS. In November 2024, the FDA authorized our Investigational New Drug application (“IND”) for the treatment of chronic pain associated with two separate indications, osteoarthritis (“OA”) and low back pain (“LBP”). On March 4, 2025, we announced the initiation of patient dosing in an exploratory PIPE-791 Phase 1b, randomized, double-blind, placebo-controlled, crossover, chronic pain trial. We expect to enroll approximately 40 patients at up to five sites in the U.S., and a treatment duration of 28 days. We anticipate top-line data from this trial in early 2026.

Our second drug candidate, PIPE-307, is a novel, small molecule selective inhibitor of the muscarinic type 1 receptor (“M1R”), in development for depression and relapse-remitting multiple sclerosis (“RRMS”). We have completed two Phase 1 trials of PIPE-307 in healthy volunteers. In 2023, we initiated a Phase 2 VISTA trial of PIPE-307 for the potential treatment of RRMS. In January 2025, we announced that we have fully enrolled our Phase 2 VISTA trial. We expect the top-line data from this trial will be available in the second half of 2025. In December 2024, J&J began recruiting participants for a Phase 2 trial of PIPE-307 (also referred to as JNJ-5120) for the potential treatment of major depressive disorder (“MDD”). We believe PIPE-307 is the most advanced selective M1R antagonist in clinical development.

In addition, we are leveraging our drug discovery capabilities to expand our clinical portfolio. In January 2024, we nominated and commenced preclinical studies for CTX-343, a peripherally-restricted (unable to access the central nervous system (“CNS”)) LPA1R antagonist. In parallel, we are actively conducting preclinical and discovery-phase experiments targeting other NI&I indications where our internally-discovered molecules may have therapeutic potential.

## Our Clinical Pipeline

We have a portfolio of novel and proprietary small molecule programs that we believe can modulate innate pathways to restore function in NI&I indications. We retain worldwide rights to our LPA1R programs and discovery portfolio, and we have partnered with J&J for the development and potential commercialization efforts of PIPE-307.

Drug Candidate	Mechanism	Program	Preclinical	Phase 1	Phase 2	Phase 3	Worldwide Rights
PIPE-791	LPA1R Antagonist	IPF					
PIPE-791	LPA1R Antagonist	PrMS					
PIPE-791	LPA1R Antagonist	Chronic Pain					
CTX-343	LPA1R Antagonist	Peripheral					
PIPE-307	M1R Antagonist	RRMS					Johnson&Johnson
PIPE-307 (JNJ-5120)	M1R Antagonist	Major Depressive Disorder					Johnson&Johnson
Calpain	Calpain Inhibitor	Undisclosed					

## Our Competitive Strengths

We have a strong, complementary relationship between our medicinal chemistry and biology teams, which allows us to develop drug candidates for historically difficult targets. We believe that our competitive strengths include:

- Our broad expertise with NI&I indications allows us to maximize the value of our drug candidates by developing them across multiple therapeutic areas.
- Our lead drug candidate, PIPE-791, targets the LPA1R, a clinically validated target for IPF, and, we believe, pending further clinical development and FDA approval, has the potential to treat IPF with once-daily dosing.
- We are advancing a new treatment paradigm in multiple sclerosis (“MS”), by leveraging novel pathways that have the potential to support remyelination and reduce neuroinflammation.
- We are leveraging our drug discovery capabilities to develop additional drug candidates that are synergistic with our existing portfolio, including our peripherally-restricted LPA1R antagonist, CTX-343.
- We have assembled a distinguished team with decades of expertise in drug discovery and development.

## Our Strategy

Our mission is to significantly impact the clinical disability associated with NI&I diseases with small molecules designed to modulate innate pathways to restore function. We aim to accomplish our goal by implementing the following strategies:

**Execute a balanced development strategy in which we assess both external clinical validation and novel therapeutic approaches for our targets.** We have built our current pipeline with the goal of minimizing clinical risk. We leverage external validation for our wholly-owned programs such as PIPE-791 for IPF, PrMS and chronic pain and our partnered program PIPE-307 for both depression and RRMS. Based on scientific rationale, we are also progressing

programs in additional disease areas, where we believe there is potential to create significant clinical benefit and address unmet need.

**Pursue clinical development of PIPE-791, an LPA1R antagonist, for the treatment of IPF, a sizeable patient population market with significant unmet need.** There are approximately 130,000 patients in the United States with IPF, of which the average life span after diagnosis is three to five years. Currently, there are only two FDA-approved treatments in IPF, nintedanib and pirfenidone, which are limited by issues associated with safety, tolerability and compliance. LPA1R antagonism is a clinically validated mechanism, and we believe that our preclinical studies and Phase 1 healthy volunteer data support the continued development of PIPE-791 for IPF.

**Pursue clinical development of PIPE-791 in PrMS to address the significant unmet need for a therapy that has the potential to reduce neuroinflammation and support remyelination.** We believe PIPE-791 has strong biological rationale to be a potentially novel treatment for PrMS.

**Seek to maximize the value of PIPE-791 by investigating its applicability in a broad range of NI&I disorders beyond IPF, PrMS, and chronic pain.** We believe PIPE-791 has the potential for broad indication expansion due to the central role of LPA1 in multiple NI&I diseases and we are actively conducting preclinical experiments across those areas. Our future development strategy will be guided by data from our ongoing preclinical studies, observed external validation, and our focus on therapeutic potential in areas of high unmet need.

**Support the advancement of PIPE-307 through a broad clinical development strategy in partnership with J&J.** J&J is an experienced innovator with a strong commitment to neuroscience, reporting \$7.1 billion of neuroscience sales in 2024. Our collaboration provides a foundation for the development of PIPE-307 with access to J&J's robust R&D and commercialization capabilities, which we believe will allow us to achieve the full potential of PIPE-307.

**Leverage our drug discovery capabilities to build out a franchise with deliberate focus on developing therapeutics that are synergistic with our existing portfolio, including our peripherally-restricted LPA1R antagonist, CTX-343.** We believe that the development of a peripherally-restricted LPA1R antagonist drug candidate will provide us with critical optionality for our portfolio. We will continue to leverage the capabilities and expertise of our team to identify and develop drug candidates with the highest likelihood of clinical and commercial success in NI&I.

**Evaluate and selectively engage in strategic collaborations to maximize the potential of our pipeline.** We recognize that partnerships may provide a more prudent development path in certain cases to reduce costs and accelerate the delivery of effective therapies to market, as exemplified by our partnership with J&J. Our collective expertise and strategic approach will guide us in selecting not only drug candidates with therapeutic potential but also ideal partners that can meaningfully contribute to the development and commercialization of our therapeutic portfolio.

## **LPA1 Franchise**

Our lead asset, PIPE-791, is a novel, high affinity, brain penetrant, small molecule LPA1R antagonist. We are initially developing PIPE-791 for the treatment of IPF, PrMS and chronic pain. We are also exploring in preclinical studies the potential utility of PIPE-791 in additional disorders where the LPA1R pathway has been implicated. We completed a Phase 1 trial to evaluate the safety, tolerability, and PK of single and multiple doses of PIPE-791 in healthy volunteers. In 2024, we commenced a Phase 1b open-label trial to measure the relationship of PK to lung and brain receptor occupancy by PET imaging. We expect the top-line data from this trial will be available in the second quarter of 2025. This Phase 1b trial will inform dose selection for planned future Phase 2 trials of PIPE-791. In addition, we are advancing CTX-343, a peripherally-restricted LPA1R antagonist. In November 2024, the FDA authorized our IND for the treatment of chronic pain associated with two separate indications, OA and LBP. On March 4, 2025, we announced the initiation of patient dosing in an exploratory PIPE-791 Phase 1b, randomized, double-blind, placebo-controlled, crossover, chronic pain trial. We expect to enroll approximately 40 patients at up to five sites in the U.S., and a treatment duration of 28 days. We anticipate top-line data from this trial in early 2026.

### ***PIPE-791 for the Potential Treatment of IPF***

We are developing PIPE-791 for the potential treatment of IPF. Based on the results of external and internal preclinical studies and emerging third-party clinical trials involving LPA1R antagonism, we believe there is a strong rationale for PIPE-791 to be disease modifying in IPF.

The LPA/LPA1R pathway is a key mediator of fibrosis. LPA is a bioactive lipid that is elevated in response to lung injury and activates LPA1R. Activation of LPA1R drives several cellular cascades, including fibroblast recruitment and vascular leakage, that lead to fibrosis. Inhibition of LPA1 can reduce these detrimental processes and may be a beneficial treatment for IPF. We have demonstrated this by our evaluation of PIPE-791 to reduce fibrosis in response to injury in a key *in vivo* rodent model for IPF. In addition, this rationale is supported by third-party LPA1R antagonist programs, which have demonstrated clinical proof-of-concept in multiple Phase 2 clinical trials in IPF patients. Based on the dosing profile from our preclinical studies and the PK data from our Phase 1 healthy volunteer trial, we believe PIPE-791, pending further clinical development and FDA approval, has the potential to treat IPF with once-daily dosing. In contrast, currently approved IPF therapies require multiple-daily dosing regimens.

### Disease Background

IPF is a chronic idiopathic interstitial lung disease characterized by progressive fibrosis of the lung tissue leading to severe loss of respiratory function. As the fibrosis progresses, the lung's ability to function and transfer oxygen into the bloodstream becomes increasingly impaired. Although the disease course is variable, the prognosis for overall survival is worse than many forms of cancer, with approximately 60% to 80% of patients dying from respiratory failure within five years of diagnosis.

IPF is a rare disease with approximately 130,000 patients in the United States and, as of 2017, 30,000 to 40,000 new cases diagnosed annually. As of 2023, worldwide prevalence is estimated to be three million cases. Although the mechanisms of fibrosis in IPF remain poorly understood, generally accepted concepts of disease pathogenesis involve recurrent subclinical injuries to alveoli (lung tissue) and failure of normal lung tissue repair. Injured cells within the alveoli release multiple cytokines and growth factors that promote the recruitment, proliferation, and differentiation of lung fibroblasts into myofibroblasts, leading to excessive collagen deposition, progressive scarring of the lung parenchyma, and irreversible loss of function. Although IPF is considered the prototypic progressive fibrosing interstitial lung disease ("ILD"), a number of other ILDs display a progressive pathophysiology and clinical course similar to IPF.

IPF only affects the lungs and patients generally present with non-specific symptoms such as shortness of breath on exertion, chronic cough, fatigue, and/or rapid weight loss. The diagnosis is most common in men ages 65 years and older. The major environmental factors that can lead to lung damage in IPF include cigarette smoking (current or ex-smokers), chronic viral infections, abnormal acid reflux and environmental exposures. Genetic factors may also contribute to the development or worsen the prognosis of IPF. The physical, psychologic and socio-economic consequences of IPF are burdensome on patients and healthcare providers, and are significantly exacerbated by an aging population.

### Current Approved Therapies

While there is no pharmacological cure for IPF, there are two FDA-approved therapies to treat the disease: pirfenidone (Esbriet, marketed by Genentech/Roche) and nintedanib (Ofev, marketed by Boehringer Ingelheim). Both drugs were approved in 2014 and are recommended by the most recent treatment guidelines from 2015. Neither drug stops the progression of IPF and both are limited by issues associated with safety, tolerability and compliance with multi-daily dosing regimens. Lung transplant is currently the only cure for patients with IPF, but, due to age and comorbidities, this is a limited treatment option for most patients. We believe that PIPE-791 has the potential to address the limitations of current therapies and serve a large unmet need for IPF patients.

Pirfenidone is an orally available, synthetic compound that exerts anti-fibrotic, anti-inflammatory and antioxidant properties through down-regulation of key pro-fibrotic growth factors including TGF- $\beta$ , inhibition of inflammatory cytokines (e.g., tumor necrosis factor- $\alpha$ ) production and release, and reduction of lipid peroxidation and oxidative stress. Four registrational trials have evaluated the efficacy of pirfenidone in patients with IPF, with three showing that pirfenidone slows down disease progression as measured by rate of deterioration in forced vital capacity ("FVC"). Pirfenidone is prescribed in a dose-escalating pattern three times daily ("TID") over a 14-day period to a target dose of 801 mg TID (total daily dose of 2,403 mg administered by nine 267 mg capsules). Common side effects of pirfenidone include gastrointestinal intolerance characterized by nausea, vomiting, dyspepsia, and diarrhea. Dose modification or discontinuation may be necessary in the case of severe side effects, with 19% of patients requiring dose reductions or interruptions due to gastrointestinal events in the clinical trials. Pirfenidone also carries the risk of skin reactions involving photosensitivity and rashes, with patients instructed to take sun exposure precautions.

Nintedanib is an intracellular inhibitor of vascular endothelial growth factor receptor 1–3, fibroblast growth factor receptor 1–3, and platelet-derived growth factor receptor  $\alpha$  and  $\beta$ . By inhibiting these tyrosine kinase receptors, nintedanib interferes with a number of processes that have been implicated in the pathogenesis of IPF. Treatment with nintedanib in multiple clinical trials demonstrated a reduction in the one-year rate of decline in FVC by approximately 50%. The

recommended dosage of nintedanib is 150 mg twice daily (“BID”) approximately 12 hours apart. The most frequent side effects associated with nintedanib are diarrhea (reported by approximately 60% of patients within the first 3 months of treatment, with over 10% of patients requiring permanent dose reduction), nausea, and vomiting. In addition to these gastrointestinal side effects, data from clinical trials with nintedanib noted a risk of arterial thromboembolic events, bleeding disorders, and gastrointestinal perforation.

In addition to the side effects noted above, which are associated with discontinuation of therapy, both pirfenidone and nintedanib have demonstrated risk for transaminitis, or elevation in liver enzymes. Both drugs require routine monitoring of liver function that can prompt dose reductions or treatment discontinuations, and each drug’s label includes a warning relating to elevated liver enzymes and gastrointestinal disorders. Specifically, both pirfenidone and nintedanib have the additional warning of drug-induced liver injury and severe liver injury with fatal outcomes. Due to these issues associated with safety and tolerability, it has been estimated that approximately 40% to 50% of patients discontinued treatment on either drug within one year of initiation.

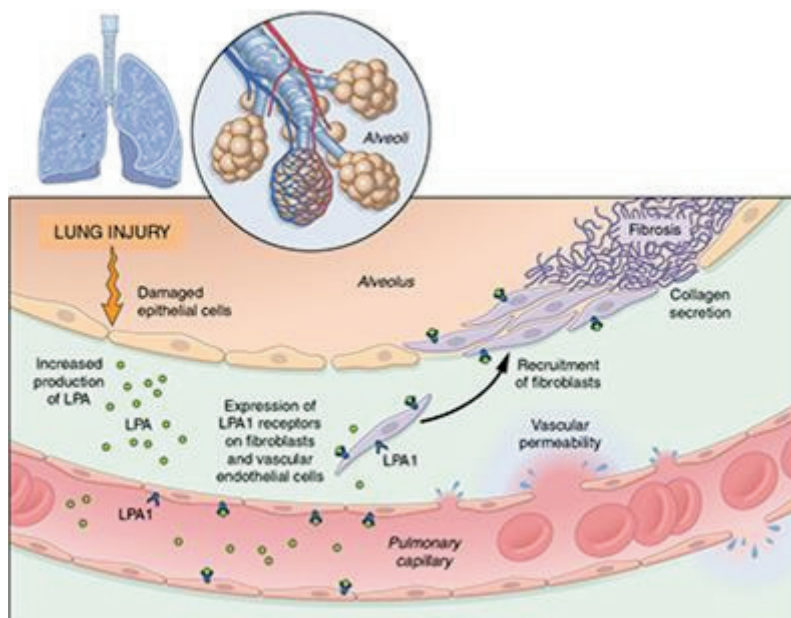
Despite the limitations highlighted above, pirfenidone and nintedanib generated more than \$4 billion in combined total sales globally in 2022. Patent expiration for pirfenidone is 2022 (U.S.) and 2026 (EU and Japan), and the patent covering the active pharmaceutical ingredients (“APIs”) for nintedanib is 2025 (U.S., EU, Japan), respectively. In summary, IPF remains an indication with significant unmet need for effective therapies that can address some of these challenges.

### Scientific Rationale for LPA1R Antagonism in IPF

LPA is a bioactive lysophospholipid that regulates numerous aspects of cellular function, such as proliferation, migration and cytoskeletal reorganization, and has been recognized as a novel mediator of wound healing and tissue fibrosis. LPA mediates its effects by signaling through a family of six G protein-coupled receptors, LPA1 to LPA6.

The link between the LPA/LPA1R pathway and IPF was first identified by Tager et al., 2008, following an observation that LPA, elevated in bronchoalveolar lavage fluid, promoted fibroblast migration. Using genetic knockout animals, studies demonstrated that this response was driven by activation of the LPA1R. In further studies, rodents lacking the LPA1R were protected from bleomycin-induced pulmonary fibrosis, one of the key animal models for IPF, by reducing fibroblast recruitment and vascular leak. Subsequent studies have replicated these findings using small molecule LPA1R selective antagonists.

The following figure shows LPA1’s mechanism in pulmonary fibrosis.



LPA1R antagonism has also demonstrated clinical proof-of-concept in third-party, randomized, double blind, placebo-controlled Phase 2 trials of LPA1R antagonists (BMS-986020 and BMS-986278) in patients with IPF.



The results of a Phase 2 parallel-arm, multi-center, randomized, double-blind, placebo-controlled trial in 143 adults with IPF treated with BMS-986020 were published in 2018. BMS-986020 is a high-affinity small molecule antagonist of the LPA1R. Patients in the 600mg BID cohort exhibited significantly slower rates of FVC decline from baseline to 26 weeks versus placebo. However, dose-related hepatobiliary toxicity led to early termination of the trial. After conducting additional toxicology investigations, BMS reported that hepatobiliary toxicity was likely caused by off-target inhibition of bile acids efflux transporters such as bile salt export pump (“BSEP”).

BMS-986278 is a second generation LPA1R antagonist that is biased away from BSEP, and the results of a Phase 2 trial in 276 IPF patients with this compound were recently released at the 2023 American Thoracic Society annual meeting. The outcome of the Phase 2 trial showed a statistically significant reduction in the decline in FVC following a 26-week administration of 60mg BID dose of BMS-986278 versus placebo with or without the use of background antifibrotic therapy. A global Phase 3 trial of BMS-986278 for IPF is currently enrolling.

With regard to its high bioavailability, low plasma protein binding, and long receptor residence time in our preclinical studies, compared to the preclinical data of other LPA1R antagonists that we know are currently in development, we believe PIPE-791 has the potential to be a differentiated LPA1R therapy. We are developing PIPE-791 as a once daily (“QD”) therapy at low doses ( $\leq 10$  mg), compared to other LPA1R antagonists, including BMS-986278, which are being studied at significantly higher dose ranges (60-120 mg) all with BID administration.

### ***PIPE-791 for the Potential Treatment of Progressive MS***

MS is a chronic, immune-mediated disease of the CNS characterized by neuroinflammation and demyelination. The three main clinical categories of MS include RRMS, Secondary Progressive MS (“SPMS”), and Primary Progressive MS (“PPMS”). We are developing PIPE-791 for the potential treatment of SPMS and PPMS, which are collectively referred to as PrMS. We believe that PIPE-791 has the potential to be a disease-modifying treatment (“DMT”) by impacting the neurodegeneration secondary to chronic demyelination and neuroinflammation, the two leading pathological contributors to clinical disability in PrMS. The development of a brain penetrant small molecule therapy that prevents worsening, reverses damage, and restores function would potentially address the major therapeutic unmet need in PrMS.

The three main clinical forms of MS have differences in prevalence and presentation. RRMS comprises 85% of newly diagnosed MS patients, and the clinical course is marked by relapses and remissions, defined as disease flare-ups followed by periods of partial recovery. Many RRMS patients eventually progress to worsening disease, and it is estimated that roughly 50% to 70% of diagnosed RRMS patients progress to SPMS within 10 to 15 years. PPMS is estimated to include approximately 10% to 15% of newly diagnosed MS patients, which is marked by a steady course of clinical progression from the time of presentation. In 2020, the global prevalence of MS was estimated to be 2.8 million patients, and we believe that more than 750,000 of this global population have PrMS (i.e., the collective population of SPMS and PPMS patients). Although substantial progress has been made in the development of effective immune-modulating treatments for RRMS, many of these approved drugs have been tested in PrMS with limited results. The relative lack of effective therapies for PrMS has further justified the exploration of novel treatment approaches. The LPA/LPA1R axis has been proposed as a potential active pathway contributing to the pathophysiology of MS. Specifically, LPA is a pro-inflammatory lipid that has been shown to be elevated in the plasma and cerebrospinal fluid (“CSF”) of MS patients and that may promote neuroinflammation and limit remyelination through the activation of the LPA1R.

We have demonstrated in our preclinical studies that blocking LPA1R with PIPE-791 reduces neuroinflammation and promotes remyelination. We further demonstrated that the biological mechanism leading to remyelination involves PIPE-791-induced oligodendrocyte formation and survival. We confirmed this remyelination was functional via observed improvements in visual evoked potential (“VEP”) latency, a clinically translatable functional biomarker of remyelination.

We believe that PIPE-791 can be the first potential therapeutic to demonstrate the role of LPA1R antagonism in addressing the chronic neuroinflammation and demyelination associated with PrMS. We believe that PIPE-791 is the only brain penetrant LPA1R antagonist in clinical development for PrMS.

### **Disease Background**

MS is a chronic, immune-mediated disease of the CNS characterized by demyelination and neuroinflammation which ultimately results in axonal loss and clinical disability. The destruction of myelin in the CNS is associated with activation of the adaptive immune system, represented by peripheral circulating T and B cells, and the innate immune system of the CNS, represented by microglia and macrophages. While demyelination, and subsequent failure of remyelination, is a core pathological feature across all forms and stages of MS, the adaptive immune system appears more

active in the early (i.e., RRMS) stages of MS, and the innate immune system is more active in the later stages of MS (i.e., PrMS).

The prominent pathological features of demyelination and neuroinflammation in PrMS, combined with insufficient endogenous remyelination, ultimately results in axonal loss and clinical disability. Demyelinated axons are susceptible to chronic injury and degeneration, as well as to reduced conduction capacity. In addition to demyelination, the chronically activated microglia of the innate immune system are implicated to play a central role in the neurodegeneration in PrMS. In post-mortem examinations of PrMS patients, activated microglia have been observed in chronically active lesions as well as normal-appearing white matter. Excessive activation of microglia is hypothesized to drive both acute and chronic axonal loss, as well as compounding further inflammation through the release of cytokines and inflammatory mediators that may attract additional immune cells. The chronic activation of microglia characteristic of PrMS is considered a major component of the emerging pathological construct referred to as “smoldering inflammation.”

The chronic neuroinflammation in PrMS is also associated with a relatively impermeable blood brain barrier (“BBB”) in PrMS as compared to the more open BBB in RRMS. It has been hypothesized that in the setting of PrMS, the innate immune system drives neuroinflammation by activating local cellular responses behind a BBB that is less penetrable to peripheral T and B cells of the adaptive immune system. Because many DMTs that act on peripheral T and B cells depend on a disrupted BBB for access to the CNS targets, this hypothesis may also explain the relative efficacy of DMTs in RRMS as compared to PrMS.

The clinical courses of SPMS and PPMS, while distinct from RRMS, are considered generally similar. PrMS is generally characterized by accrual of neurological disability independent of clinical relapses. The most common clinical manifestation in PrMS is myelopathy, or weakness of the legs and difficulty walking, followed by difficulty with balance and visual impairment. Patients with PrMS typically score more poorly than RRMS patients on the Expanded Disability Status Scale (“EDSS”), a common measure of neurological disability in MS.

#### Current Approved Therapies

In RRMS, the adaptive immune system drives neuroinflammation and demyelination that results in clinical relapses associated with new lesions observed by magnetic resonance imaging (MRI). In contrast, PrMS is marked by the accrual of clinical disability that is generally independent of relapses and new focal lesion formation. The majority of DMTs that dampen the inflammatory activity of adaptive immune cells associated with early disease course typified by RRMS have generally not been effective in PrMS. With the exception of mitoxantrone for the specific diagnosis of secondary (chronic) SPMS (which is rarely used in the United States due to safety and tolerability issues), and ocrelizumab for PPMS, none of the MS medications approved by the FDA carry a specific indication for PrMS.

Although many DMTs approved for RRMS also carry the indication for SPMS with clinical evidence of active inflammation, the EXPAND Phase 3 trial for siponimod was the only study in the last 20 years to meet the primary efficacy endpoint of slowing disability accumulation compared to placebo in active SPMS. The active form of SPMS is defined as including the presence of clinical relapses or new lesions by MRI examination. In contrast, natalizumab, one of the most effective DMTs in suppressing peripherally mediated inflammation in RRMS, did not reduce the proportion of SPMS patients with confirmed disability progression (“CDP”) in the ASCEND two-year Phase 3 trial. The outcomes of the ASCEND and EXPAND trials are consistent with the concept that increasing clinical disability in PrMS is being driven by immune processes compartmentalized to the CNS and that the adaptive immune system plays a less prominent role.

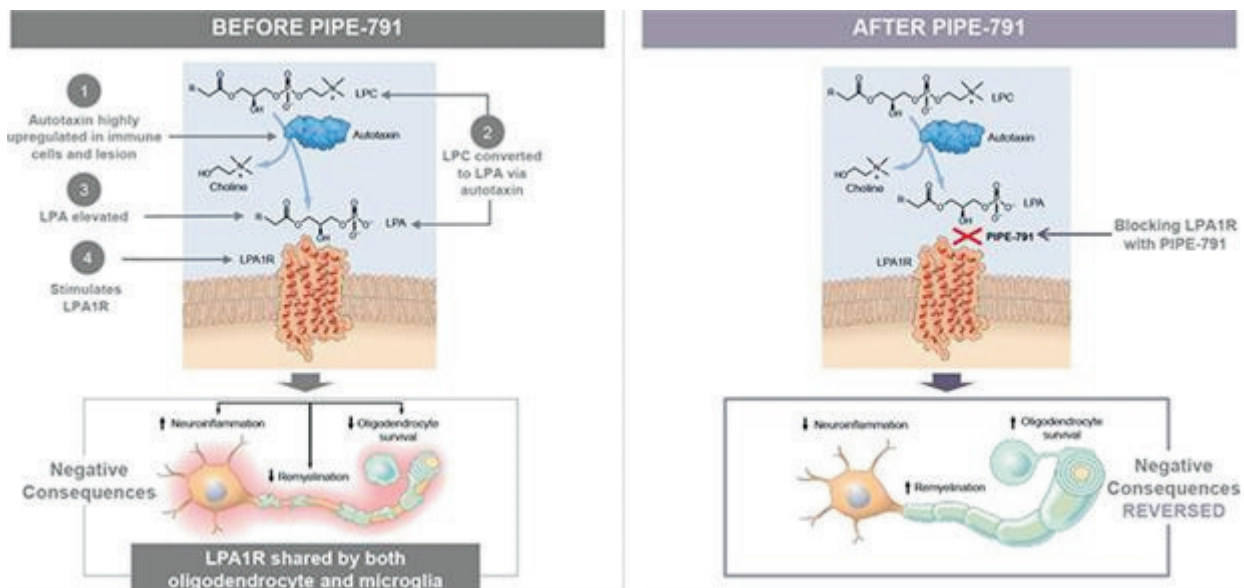
The treatment options for patients with PPMS are even more limited. Ocrelizumab, a monoclonal antibody against the CD20 antigen on B cells, is the only FDA-approved treatment option for PPMS. Ocrelizumab was studied in an event-driven trial, with CDP as the primary endpoint. The key inclusion criteria were patients aged younger than 55, evidence of specific clinical disability by EDSS score, and the presence of CSF-specific oligoclonal bands or evidence of CNS inflammation through the presence of immunoglobulins. The primary outcome of the trial showed a 24% reduction in CDP ( $p=0.03$ ). This reduction in CDP is considered moderate, and there was no significant between-group difference in the physical component of the quality-of-life measure. Safety risks related to ocrelizumab, while infrequent, can be severe and include infusion reactions, increased risk of infection, and reactivation of hepatitis B and herpes.

In summary, patients with PrMS have very few treatment options based on approved effective therapies.

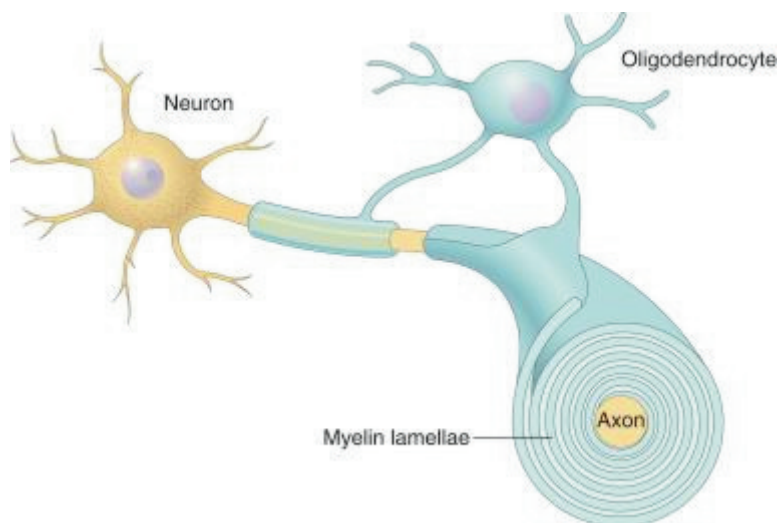
## Scientific Rationale for LPA1R Antagonism in PrMS

LPA is a pro-inflammatory lipid that is elevated in the plasma and CSF of MS patients and may promote neuroinflammation and limit remyelination through the activation of specific receptors such as the LPA1R. LPA activates the G-protein coupled receptor LPA1, resulting in increased cytokine and chemokine levels in the CNS, infiltration of peripheral immune cells, and microglial and astrocyte activation, which is part of the neuroinflammatory response that leads to demyelination. LPA may also suppress remyelination by directly activating LPA1R located on oligodendrocyte precursor cells (“OPCs”). Blocking the LPA/LPA1R pathway with PIPE-791 has the potential to be disease-modifying by reducing neuroinflammation and promoting remyelination through inducing OPC differentiation into oligodendrocytes capable of remyelination. Additionally, PIPE-791 enhances survival of oligodendrocytes within an inflammatory environment.

The following figures show LPA1 is a key regulator of remyelination and neuroinflammation.



The following figure shows mature oligodendrocytes derived from differentiation of OPCs wrap the axons of neurons to protect and facilitate nerve conduction. The inability to restore myelin after a demyelinating injury to the axon results in long-term degeneration of the neuron.



Based on the potential for PIPE-791 to support remyelination and mitigate neuroinflammation, the leading causes of neurodegeneration and accrual of disability, we believe that there is strong biological rationale for LPA1R antagonism to have a clinical benefit in PrMS patients.



## ***PIPE-791 for the Potential Treatment of Chronic Pain***

We are developing PIPE-791 for the potential treatment of chronic pain, initially associated with OA and LBP. Based on the results of external and internal preclinical studies and extensive scientific literature, we believe that PIPE-791, due to its ability to penetrate the CNS, could be the first LPA1 antagonist to comprehensively test the hypothesis that mitigation of the LPA1 pathway can improve chronic pain associated with OA and LBP.

### Disease Background

Chronic pain is a condition often resulting from damage or dysfunction in the nervous system which can be associated with neuropathic symptoms of heightened pain sensitivity and persistent discomfort. Current treatments often provide inadequate relief and are associated with significant side effects, underscoring the need for novel therapeutic approaches. The LPA1 receptor has emerged as a promising target in the context of neuropathic pain due to its involvement in pain signaling pathways. LPA1 activation may contribute to hypersensitivity and the persistence of pain by promoting the demyelination of nerve fibers, increasing neuronal excitability, and enhancing neuroinflammatory responses in the CNS. By selectively blocking LPA1 receptor activity, a LPA1 antagonist may prevent or reverse the maladaptive changes in the nervous system that lead to chronic pain, offering a targeted and potentially effective non-opioid treatment option for patients. The development of an LPA1 receptor antagonist could thus represent a novel, mechanism-based approach to addressing a significant unmet medical need in pain management. Specifically, pain syndromes associated with OA and the form of LBP associated with lumbar spinal stenosis (“LSS”) have been linked to the lysophosphatidic acid (“LPA”) signaling pathway by evidence from relevant nonclinical models, as well as elevated levels of LPA in the synovial fluid of patients with knee OA and elevated levels of LPA in the CSF of patients with LSS. These findings indicate that antagonists of the LPA signaling pathway may have promise as analgesics for the treatment of chronic pain.

#### *Osteoarthritis*

Chronic OA is the most common joint disease characterized by chronic pain and decreased mobility. There are approximately 33 million people in the United States with OA and 595 million people globally. Current pharmacological treatments for pain associated with OA consist of non-steroidal anti-inflammatory drugs (“NSAIDs”), topical agents, antidepressants and steroid injections. These drugs do not address the neuropathic component of OA and thus are ineffective in subpopulations of OA.

#### *Low Back Pain*

Chronic LBP is a common condition that affects the lumbar region and lasts longer than 3 months. The majority of LBP is considered mechanical and/or musculoskeletal in etiology which may also be complicated by spinal nerve compression and inflammation. Low back pain affects approximately 619 million people globally and 45 million people in the United States. Pharmacologic options focus on pain relief and reducing inflammation. Over the counter or prescription NSAIDs, antidepressants, steroid injections, muscle relaxants and opioids are commonly used for pain, inflammation reduction and/or overcoming stiffness. Most of these drugs are ineffective for neuropathic pain or have poor tolerability and/or addiction potential.

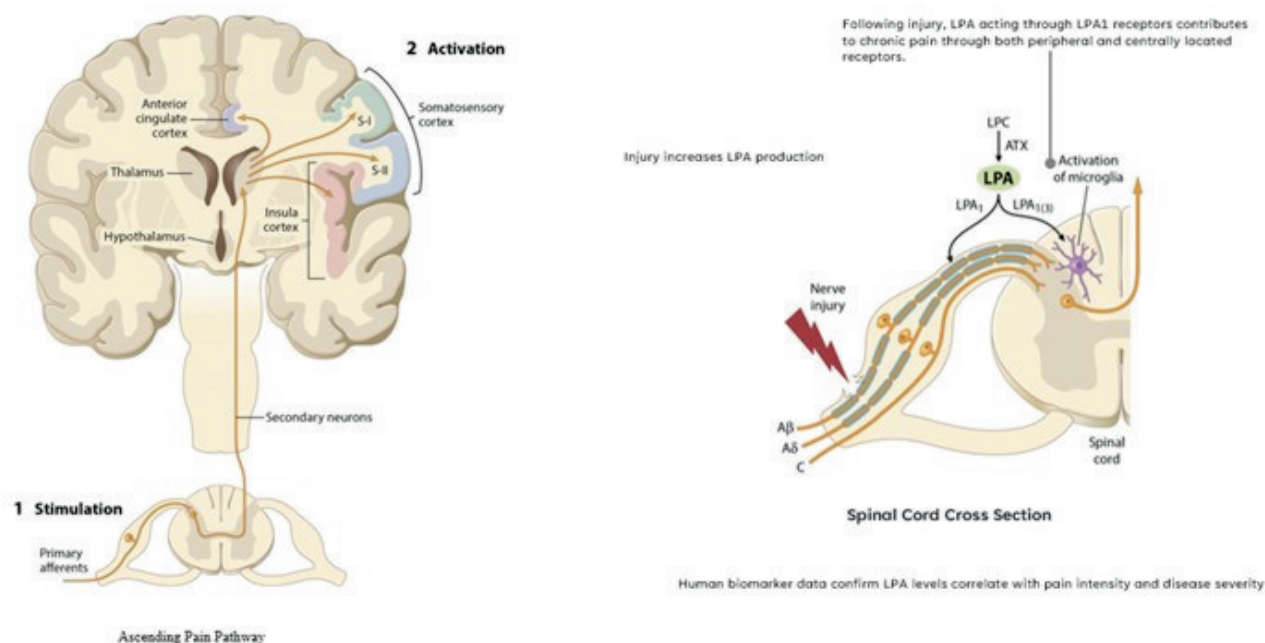
### Current Approved Therapies

Standard-of-care medications for pain include NSAIDs such as ibuprofen, naproxen, COX-2 inhibitors, topical agents, anticonvulsants, antidepressants, muscle relaxants and opioids. Many of these approved therapies are offered as over-the-counter or prescription generics. Our competition may also include other programs in clinical development for the treatment of OA and/or LBP being developed by Eli Lilly and Company, GSK plc, Novartis AG and AstraZeneca PLC.

## Scientific Rationale for LPA1R Antagonism in Neuropathic Pain

LPA activates LPA1, a G-protein-coupled receptor, implicated in various physiological and pathological processes, including inflammation, fibrosis and pain modulation. In neuropathic pain models, LPA1 activation has been shown to contribute to hypersensitivity and the persistence of pain by promoting the demyelination of nerve fibers, increasing neuronal excitability and enhancing neuroinflammatory responses along the ascending pain pathways. Specifically, LPA1 signaling has been associated with the upregulation of pro-inflammatory cytokines and chemokines, which exacerbate nerve injury and prolong pain sensations. Preclinical studies using LPA1 gene knockout animals and receptor antagonists have demonstrated significant reductions in pain behavior in animal models of neuropathic pain. Importantly, both peripheral as well as centrally located receptors are involved in this process. Consistent with the observations from animal models, LPA has been shown to be associated with neuropathic pain intensity and symptoms in patients.

The following figures show LPA1 is a key regulator of the ascending pain pathway.



### Our PIPE-791 Phase 1 Healthy Volunteer Trial

We completed a Phase 1 single ascending dose (“SAD”)/multiple ascending dose (“MAD”) and food effect (“FED”) clinical trial of PIPE-791 in healthy volunteers in January 2024. This trial was a single-center, double-blind, placebo-controlled safety, tolerability, and PK trial of oral administration of PIPE-791 in healthy male and female volunteers aged 18 to 55 years. The primary objective of the trial was to assess the safety and tolerability of single and repeat oral doses of PIPE-791 in healthy volunteer subjects. The secondary objective of the trial was to assess the single and repeat dose PK profile of PIPE-791. The trial met the primary and secondary objectives.

In the SAD component of the trial, we administered single doses of PIPE-791 to 24 participants across four dose cohorts of 1, 5, 10 and 20 mg, with six participants at each dose cohort (SAD1, SAD2, SAD3, and SAD4, respectively). Eight additional participants in the SAD component of the Phase 1 trial received placebo doses. We tested the subjects in the 10 mg SAD cohort after a single dose of PIPE-791 in both the fasted and FED state. In the MAD component of the trial, we administered PIPE-791 to 18 participants over 1, 3 and 10 mg dose cohorts, with six participants at each dose cohort (MAD1, MAD2, and MAD3, respectively). Six additional participants in the MAD component of the Phase 1 trial received placebo doses. The 1 and 3 mg MAD dose cohort participants received once-daily dosing over 7 days, and the 10 mg MAD dose cohort participants received once-daily dosing over 14 days.

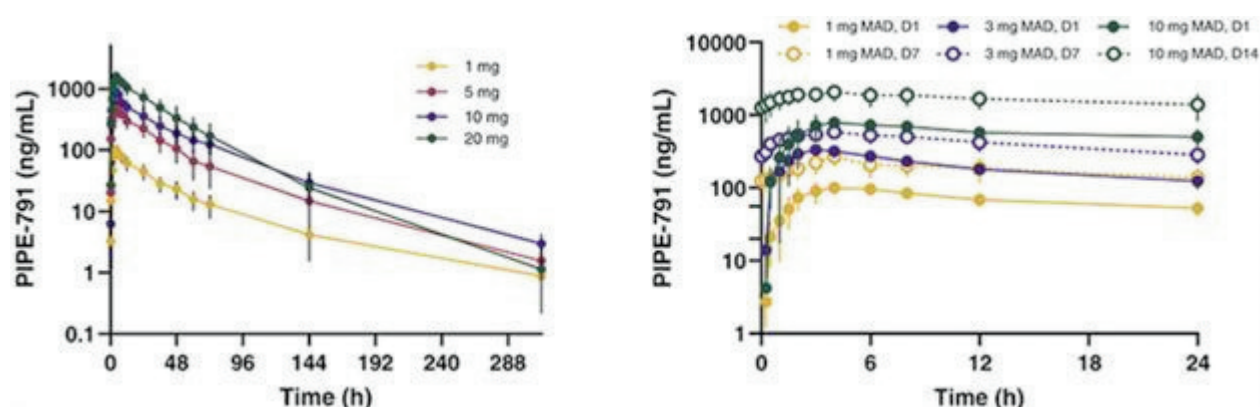
In this Phase 1 trial, PIPE-791 was shown to be well-tolerated across all four SAD and three MAD dose cohorts in healthy volunteers. Excluding adverse events (“AEs”) related to soreness secondary to venipuncture and contact dermatitis related to electrocardiogram (“EKG”) electrode pads, only three treatment emergent adverse events (“TEAEs”) were considered Grade 1. The two Grade 2 TEAEs under active drug assignment included a Grade 2 AE of back pain (SAD4) and a Grade 2 AE of constipation (MAD3). A Grade 2 AE of headache was reported in a single placebo subject. There were no Grade 3 or Grade 4 AEs reported during the trial. All reported AEs recovered and resolved, and there were no dose-limiting AEs nor was a relationship or pattern to AEs and dose detected. There were no notable abnormal clinical laboratory values, EKG, or vital signs observed.

The following table provides the TEAEs that were reported in two or more trial participants.

TEAE* (Preferred Term)	Placebo (n=14)	SAD1 (n=6)	SAD2 (n=6)	SAD3 (n=6)	SAD4 (n=6)	MAD1 (n=6)	MAD2 (n=6)	MAD3 (n=6)
Abdominal pain		1	1					
Nasal congestion				1				1
URI			1					2
Rhinitis				1				1
Headache	1		1		3	1		
Back pain				1	2			

\* AEs related to venipuncture soreness (n=2) and contact dermatitis secondary to ECG electrodes (n=9) have been excluded.

PIPE-791 displayed a SAD half-life dependent on dose that ranged from 55 to 31 hours for the 1 mg and 20 mg dose cohorts, respectively. Co-administration of PIPE-791 with food slightly delayed T<sub>max</sub> and reduced C<sub>max</sub> relative to the fasted state, but with no overall impact on exposure. The figures below provide the SAD PK for all four dose cohorts to Day 14 (left figure) and the 24-hour MAD PK for all three dose cohorts for Day 1 and Day 7 (MAD1 and MAD2) and Day 1 and Day 14 (MAD3) (right figure).



### Our PIPE-791 Preclinical Toxicity Studies

We evaluated the toxicity profile of PIPE-791 in comprehensive animal studies. The toxicology studies consisted of oral dosing in rodents and minipigs for up to 28 days, with four-week recovery periods. Furthermore, we completed a battery of *in vitro* and *in vivo* genotoxicity studies to assess the genotoxic potential of PIPE-791. Based on these data, we initiated six-month rodent and nine-month minipig chronic toxicity studies in January 2024. We expect to have the final reports from these toxicology studies in the second quarter of 2025.

## Our PIPE-791 Development in IPF

### Overview of PIPE-791 Preclinical Proof-of-Concept Studies

Through preclinical studies, we have demonstrated PIPE-791's *in vitro* pharmacology and *in vivo* pharmacodynamic properties, which are summarized below.

#### PIPE-791 is a Potent LPA1R Antagonist In Vitro

We tested PIPE-791 in a competitive membrane filter binding assay using membranes from cells overexpressing human LPA1. We found that PIPE-791 bound human LPA1R with single-digit nanomolar potency with half maximal inhibitory concentration (IC<sub>50</sub>). Next, we examined the kinetics of PIPE-791 binding to LPA1R in a recombinant membrane setting. We found that PIPE-791 exhibited slow association and dissociation kinetics. PIPE-791 was tested in a functional calcium (Ca<sup>2+</sup>) mobilization assay using either 30 minutes or 24 hour pre-incubation periods prior to LPA addition. The slow on-rate kinetics of PIPE-791 likely contribute to the shift in potency observed going from the 30 minutes to the 24 hour Ca<sup>2+</sup> mobilization assay. PIPE-791 also showed selectivity against the two most homologous LPA receptor isoforms, LPA2 and LPA3, with >30 fold selectivity. PIPE-791 was screened against 78 targets (Eurofin SAFETYscan) at a concentration of 30  $\mu$ M with no appreciable activity.

The following figure provides a summary of PIPE-791 *in vitro* radioligand binding and selectivity profile in Ca<sup>2+</sup> mobilization. We assessed selectivity using a three hour incubation of PIPE-791.

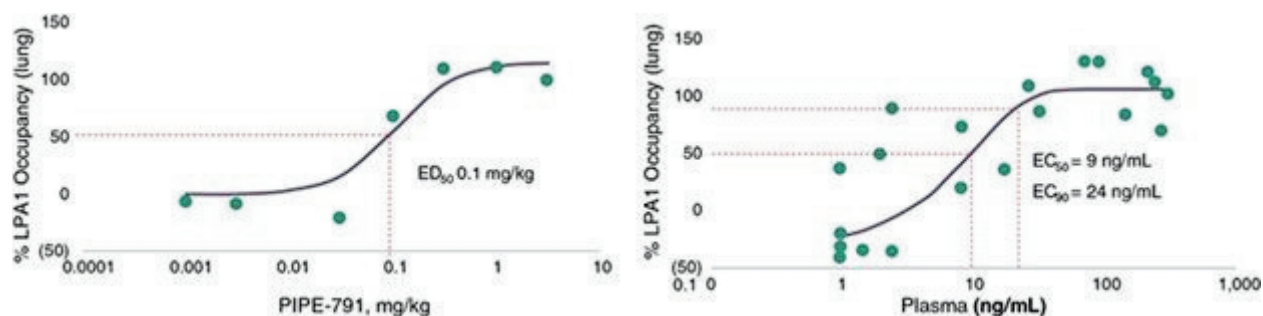
Properties	<i>In vitro</i> Profile
Radioligand binding K <sub>i</sub> (nM)	0.752 (IC <sub>50</sub> : 2.63)
K <sub>off</sub> (min <sup>-1</sup> )	0.001334
Functional LPA1 Ca <sup>2+</sup> mobilization (nM, 30 minutes)	91.8
Functional LPA1 Ca <sup>2+</sup> mobilization (nM, 24 hours)	9.9

#### PIPE-791 In Vivo Lung LPA1R Occupancy

We evaluated the *in vivo* receptor occupancy of PIPE-791 using a novel selective LPA1 radioligand [3H]-PIPE-497. We dosed PIPE-791 orally, QD for four days in order to approximate binding at steady state coverage and to account for the slow kinetics of PIPE-791 binding observed with *in vitro* binding assays.

We demonstrated that PIPE-791 dose-dependently inhibits radioligand binding with a half maximal dosing effect (ED<sub>50</sub>) of 0.1 mg/kg. We determined the corresponding plasma concentration and 90% maximal effect (EC<sub>90</sub>) to be 9 ng/mL and 24 ng/mL, respectively. Correcting for plasma protein binding in rodents (96.6%), we estimated that the resulting unbound EC<sub>50</sub> is 0.30 ng/mL (0.7nM), consistent with the *in vitro* binding affinity of 0.75 nM.

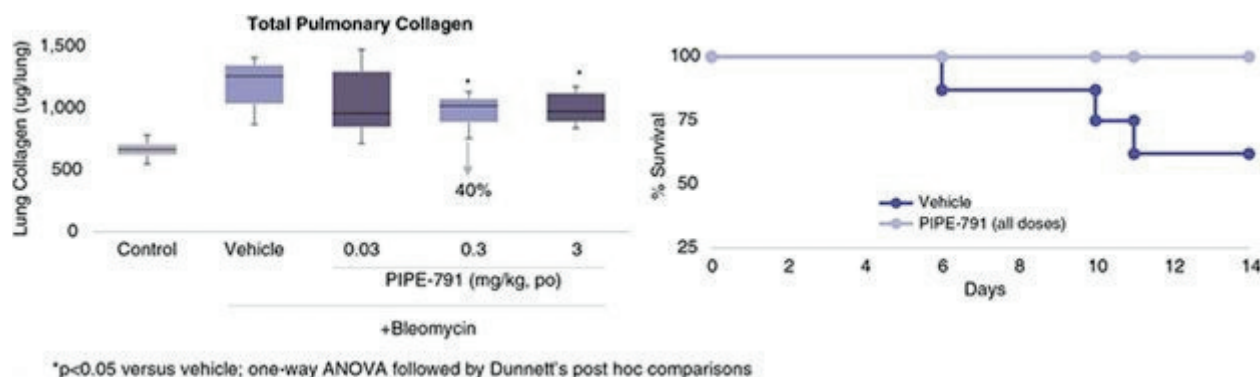
The following figure provides PIPE-791 lung receptor occupancy, including receptor occupancy versus oral dose (left figure) and receptor occupancy versus PIPE-791 plasma concentration (right figure).



### *In Vivo Lung Fibrosis Model*

We evaluated the ability of PIPE-791 across multiple doses to reduce fibrosis in response to injury in a rodent bleomycin-induced lung fibrosis model, a standard animal model of IPF. Rodents received bleomycin sulphate (Blenoxane, 3.0 units/kg) via oropharyngeal instillation. Treatment of these rodents with PIPE-791 increased overall survival and led to a dose-dependent decrease in lung tissue fibrosis evaluated 14 days following bleomycin instillation. Body weights also improved with PIPE-791.

The following figures show PIPE-791 is active in the bleomycin model, including total lung collagen (left figure) and survival (right figure).



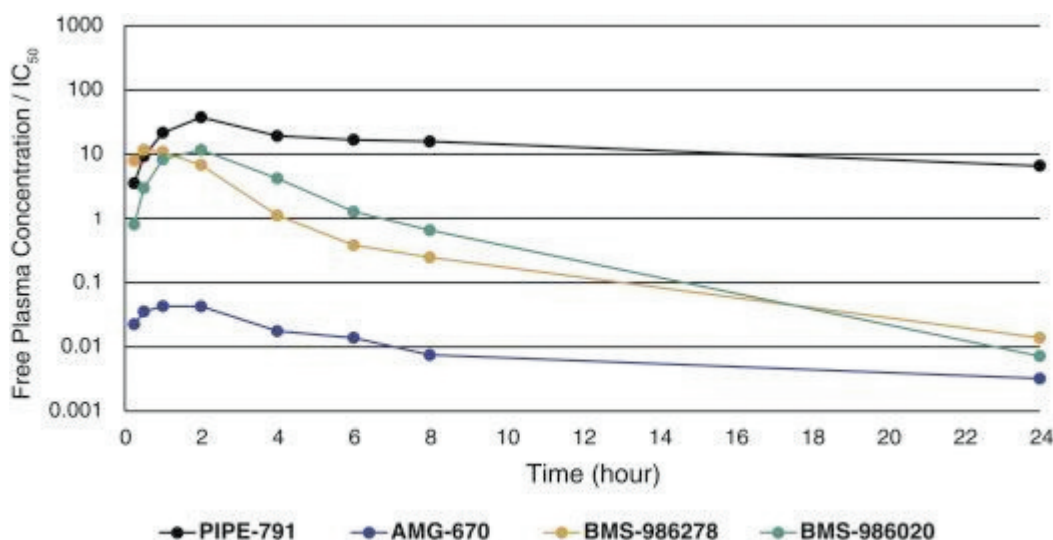
### Preclinical Data Comparison Between PIPE-791 and Other LPA1R Antagonists

We believe that our preclinical studies and Phase 1 healthy volunteer data support the continued development of PIPE-791 for both IPF and PrMS. Specifically, with regard to its high bioavailability, low plasma protein binding, and long receptor residence time in our preclinical studies compared to the preclinical data of other LPA1R antagonists, we also believe PIPE-791 has the potential to be a differentiated LPA1R therapy. We designed PIPE-791 to block the LPA1R while avoiding inhibition of BSEP, the transporter involved in hepatobiliary toxicity associated with previous LPA1R compounds, such as BMS-986020. BMS-986020 was a first generation LPA1R antagonist which has been observed in third-party preclinical studies to elicit hepatobiliary toxicity due to inhibition of BSEP at its expected clinically efficacious dose of 600 mg BID. In third-party preclinical studies, the resulting cholestatic hepatotoxicity of BMS-986020 was recapitulated *in vitro* through a Sandwich-Cultured Human Hepatocyte ("SCHH") assay (68% at 10  $\mu$ M). Given the low anticipated efficacious clinical dose of PIPE-791 (<10 mg QD), its minimal inhibition of the bile acid transporters (i.e. BSEP IC<sub>50</sub>  $\geq$  20  $\mu$ M) *in vitro*, and the lack of any observable general or cholestatic toxicity signal in the SCHH assay (0% at 30  $\mu$ M), we believe the risk of similar hepatobiliary toxicity with PIPE-791 is low.

We also designed PIPE-791 to have high oral bioavailability, high metabolic stability, low plasma protein binding, as well as low nanomolar functional inhibitory activity against LPA1R. Preclinically, these features combine to allow PIPE-791 to achieve high occupancy of the LPA1R for more than 24 hours after a single oral dose. To enable the head-to-head comparison of PIPE-791 against known third-party compounds, we used fold of free plasma drug concentration over *in vitro* LPA1R functional IC<sub>50</sub> after a single oral dose of 10 mg/kg in rodents as a quantitative measurement of LPA1R target engagement *in vivo* across time. We observed that PIPE-791 is capable of fully covering the LPA1R receptor IC<sub>50</sub> across 24 hours. Under the same conditions in our preclinical comparison studies, none of the other LPA1 receptor antagonists achieved 24-hour coverage above their respective IC<sub>50</sub>.



The following figure represents the time of free plasma concentrations over IC<sub>50</sub> for each respective LPA1 receptor antagonist in our preclinical studies. Values greater than 1 on the y-axis represent plasma concentrations that exceed the IC<sub>50</sub>; whereas, values less than 1 represent plasma concentrations below the IC<sub>50</sub>.



We also assessed the key parameters for these compounds head-to-head in both *in vitro* and *in vivo* experiments. The following table compares the *in vitro* binding and *in vivo* absorption properties of PIPE-791 with the other LPA1 receptor antagonists, including: i) calcium mobilization IC<sub>50</sub> using cells expressing human LPA1R; ii) plasma protein binding using rodent plasma; and iii) oral bioavailability in rodents following a single oral dose of 10 mg/kg formulated in 1% hydroxypropyl methyl cellulose with 0.1% TWEEN80, a polyethylene sorbitol ester, and an intravenous bolus dose of 2 mg/kg formulated in 60% PEG400 and 40% water. The free acid form was used for each compound.

Assays	PIPE-791	BMS-986278	BMS-986020	AMG-670
hLPA (Ca <sup>2+</sup> flux) IC <sub>50</sub>	9.9 nM	80 nM	2.0 nM	9.2 nM
Plasma protein binding, % Free (Rodent)	5.7	15	0.2	0.07
Oral bioavailability, *F (%)	78	138	64	4.7

\*Fraction absorbed

#### Clinical Development Plan of PIPE-791 in IPF

Based on the favorable safety results from our completed Phase 1 healthy volunteer trial, we commenced a single-center Phase 1b open-label trial of PIPE-791 in IPF to measure the relationship of PK and lung receptor occupancy by PET imaging. We expect to have top-line data from this trial in the second quarter of 2025. We designed this trial to inform dose selection for a planned future Phase 2 trial in IPF. We expect to submit an IND to the FDA to support the planned Phase 2 trial in IPF in mid-2025 following completion of our ongoing six-month rodent and nine-month minipig toxicity studies. Subject to the FDA's review and authorization of our IND, we plan to commence a proof-of-concept international multi-center Phase 2 randomized double-blind, placebo-controlled safety trial in patients with IPF. The proposed primary endpoint will be to assess the rate of change in FVC from baseline to six months.

#### ***Our PIPE-791 Development in Progressive MS***

##### Overview of PIPE-791 Preclinical Proof-of-Concept Studies

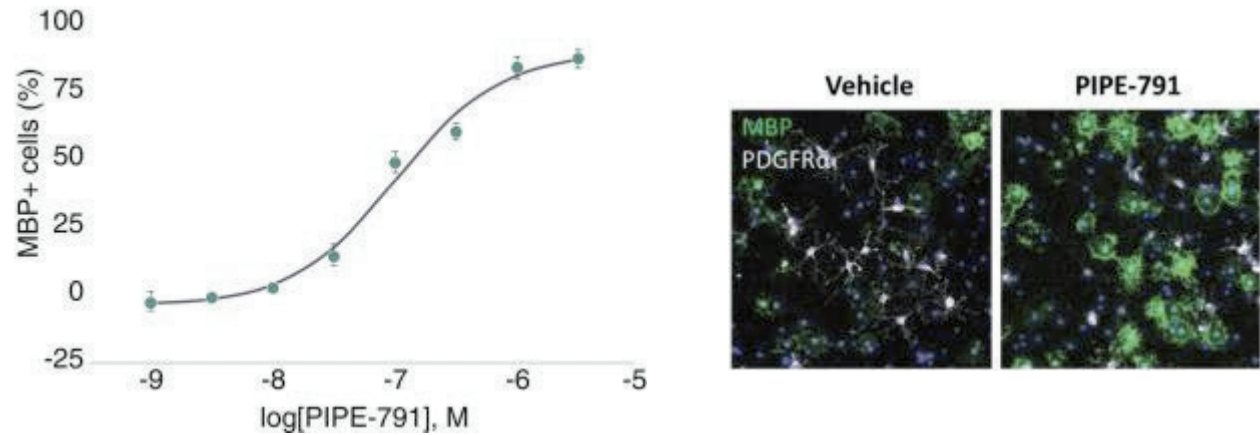
PIPE-791 is a novel, high affinity, orally available, brain penetrant, small molecule LPA1R antagonist that we believe can be disease modifying by addressing chronic demyelination and neuroinflammation, the two leading pathological contributors in PrMS. In our preclinical studies, we have demonstrated that PIPE-791 induces OPC differentiation into oligodendrocytes and enhanced survival of oligodendrocytes in the presence of inflammatory cytokines. In our preclinical studies, we observed that LPA1R antagonism reverses immune-mediated neuroinflammation and promotes remyelination in *in vivo* and *in vitro* MS models. PIPE-791 also reduced the cytokine response in an acute

lipopolysaccharide (“LPS”) challenge model of neuroinflammation, a model widely used to induce both neuro-and peripheral inflammation. Further, our *in vivo* binding studies confirm prolonged receptor association that resulted in durable CNS receptor occupancy. Together, these results offer a compelling rationale for the further development of PIPE-791 as a potential treatment for PrMS, as well as MS more broadly.

*PIPE-791 Induced Rodent OPC Differentiation In Vitro*

We isolated and cultured primary rodent OPCs in the presence of platelet-derived growth factor (“PDGFa”), which promotes survival and initiates proliferation. Following PDGFa removal, we added various concentrations of PIPE-791 to the cultures and maintained the cultures for three days. We then immunostained these cultures for myelin basic protein (“MBP”), which is a marker for differentiated OPCs or oligodendrocytes. Following PIPE-791 treatment, we observed a concentration dependent increase in the number of oligodendrocytes. The concentration to produce an EC50 was estimated to be 108 nM, demonstrating the role PIPE-791 has in promoting OPC differentiation.

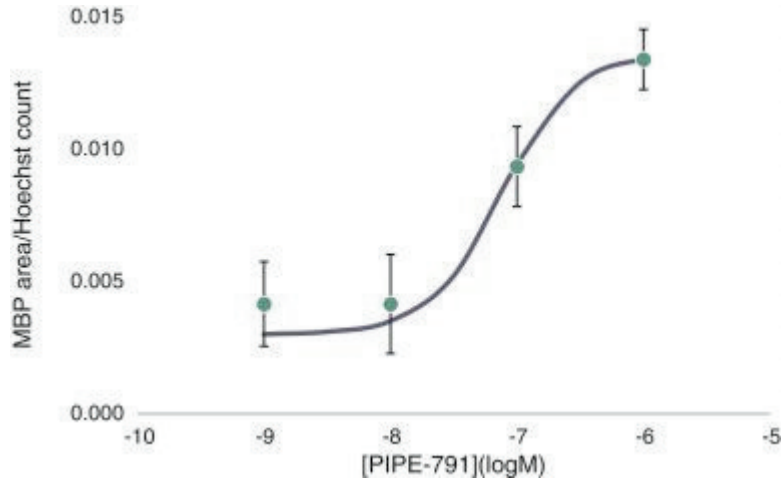
The following figures show PIPE-791 induced OPC differentiation into oligodendrocytes, including the PIPE-791 concentration response curve (left figure) and the immunostaining for MBP (right figures).

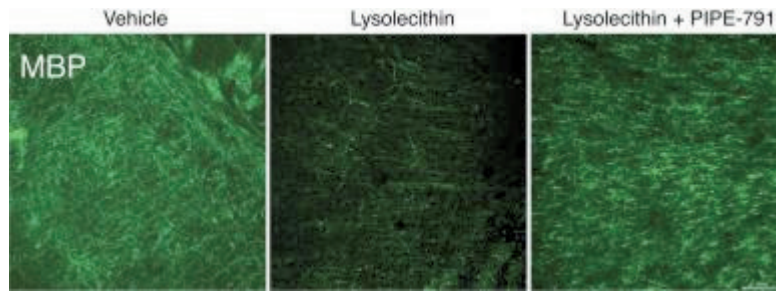


*PIPE-791 Induced Remyelination in Rodent Organotypic Brain Slice Culture*

We used an *ex vivo* organotypic brain culture to assess the effect of PIPE-791 in remyelination following a demyelinating insult. We treated rodent cortical brain slices with lysolecithin, which induces acute demyelination through a non-specific lipid-based mechanism. We removed the lysolecithin 18 hours later and replaced it with media containing PIPE-791. After three additional days of incubation, we processed the brain slices for immunostaining against MBP. We quantified the MBP+ area and observed a dose-dependent increase following PIPE-791 treatment with an EC50 of 74 nM.

The following figures show PIPE-791 increased remyelination in an *ex vivo* organotypic brain culture assay, including the PIPE-791 concentration response curve (top figure) and the immunostaining for MBP (bottom figures).

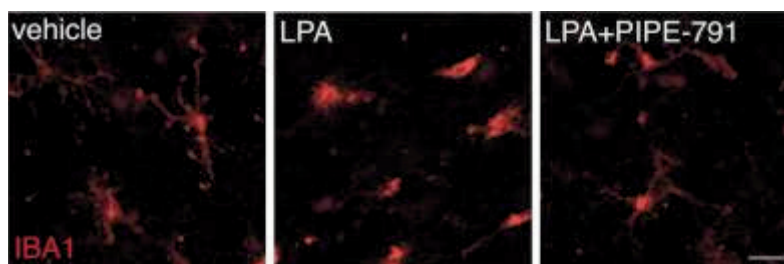
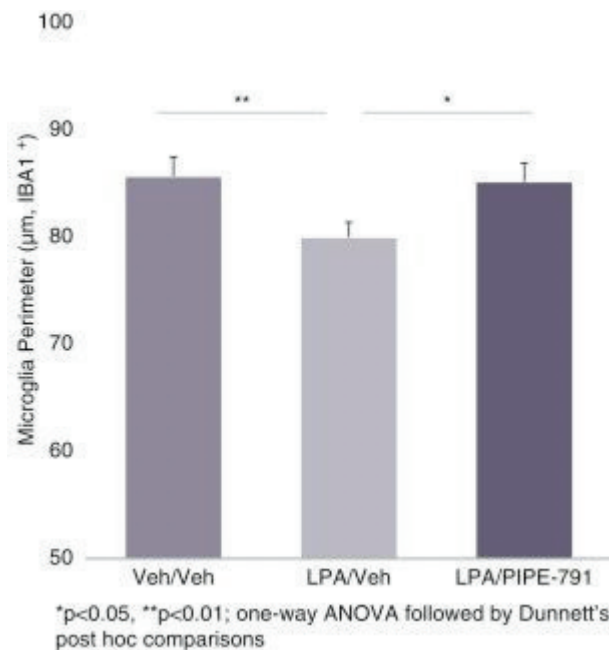




#### *PIPE-791 Inhibits LPA-Induced Microglia Activation In Vitro*

LPA is elevated during MS and may participate in microglial activation. LPA-activated microglia are inflammatory and release cytokines, such as TNF $\alpha$  and IL-1. Because these cytokines may exacerbate damage and impede remyelination, inhibiting such proinflammatory microglial activation may promote repair. We evaluated PIPE-791 in an *ex vivo* microglial activation assay using LPA challenge. We observed that PIPE-791 significantly inhibited LPA-induced changes in IBA1+ microglia morphology, a hallmark of activation.

The following figures show that PIPE-791 inhibited LPA-induced microglia activation including the quantification of the microglia activation in the various treated mediums (top figure) and immunostaining for IBA1 in the various treated mediums (bottom figures).



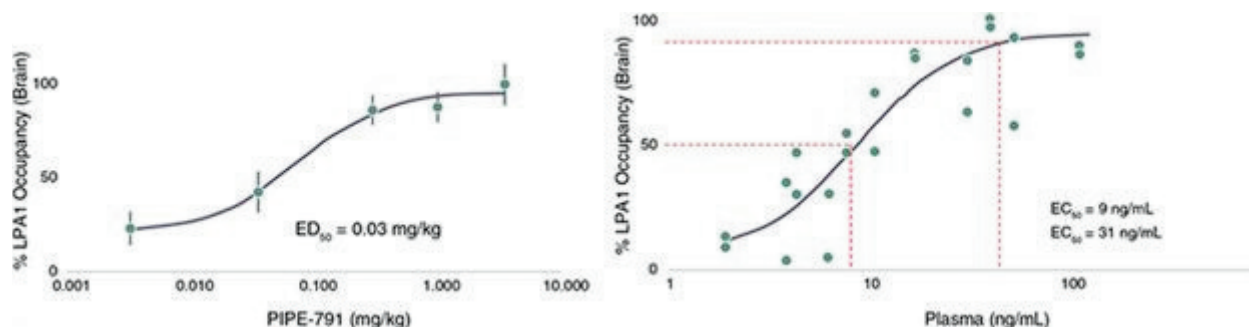


## PIPE-791 In Vivo CNS LPA1R Occupancy

We evaluated the *in vivo* receptor occupancy of PIPE-791 using a novel selective LPA1 radioligand, [3H]-PIPE-497, in rodents. In order to both approximate binding at steady state and account for the specific kinetics of PIPE-791 binding observed with *in vitro* assays, we evaluated occupancy after four days of QD oral administration of PIPE-791.

PIPE-791 dose-dependently inhibited radioligand binding with an ED<sub>50</sub> of 0.03 mg/kg. The corresponding plasma EC<sub>50</sub> and EC<sub>90</sub> were determined to be 9 ng/mL (19 nM) and 31 ng/mL (65 nM), respectively. Correcting for plasma protein binding in rodent (96.6%), the resulting unbound EC<sub>50</sub> is estimated to be 0.7 nM. We use these data to understand PK and therapeutic human dosing implications.

The following figures show PIPE-791 CNS receptor occupancy, including receptor occupancy versus oral dose (left figure) and receptor occupancy versus PIPE-791 plasma concentration (right figure).

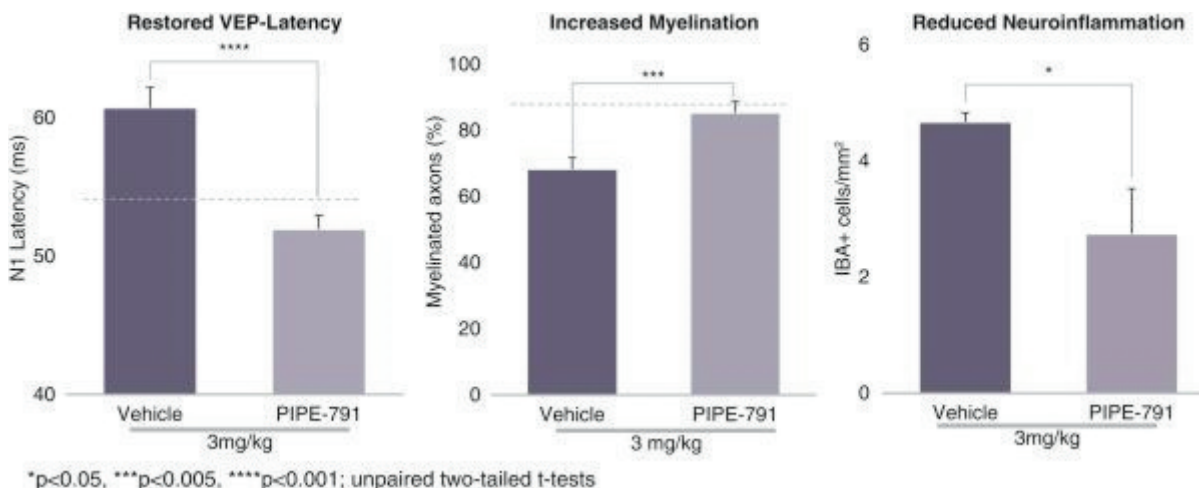


## PIPE-791 Promotes Remyelination, Restores VEP Latency, and Reduces Neuroinflammation in In Vivo MS Rodent Model

We demonstrate the ability of PIPE-791 to promote remyelination, inhibit neuroinflammation, and restore neuronal function *in vivo* in a rodent experimental autoimmune encephalomyelitis ("EAE") model of inflammatory demyelination, a model in which the interaction between a variety of immunopathological and neuropathological mechanisms leads to an approximation of the key pathological features of MS: inflammation, demyelination, and axonal loss. We immunized rodents with a peptide corresponding to an epitope on myelin oligodendrocyte glycoprotein ("MOG").

After approximately nine days, rodents developed EAE followed by motor impairment. Treatment of these rodents with 3 mg/kg of PIPE-791 led to a statistically significant increase in the percentage of myelinated axons in the optic nerve versus vehicle treated rodents ( $p < 0.005$ ; unpaired t-test). PIPE-791 treatment also led to a restoration in VEP latency ( $p < 0.001$ ; unpaired t-test). Further, PIPE-791 reduced neuroinflammation as determined by a decrease in IBA1+ cells ( $p < 0.05$ ; unpaired t-test).

The following figures show that PIPE-791 led to statistically significant improvements in the MOG EAE model as measured by VEP latency, axonal myelination and reduced neuroinflammation.



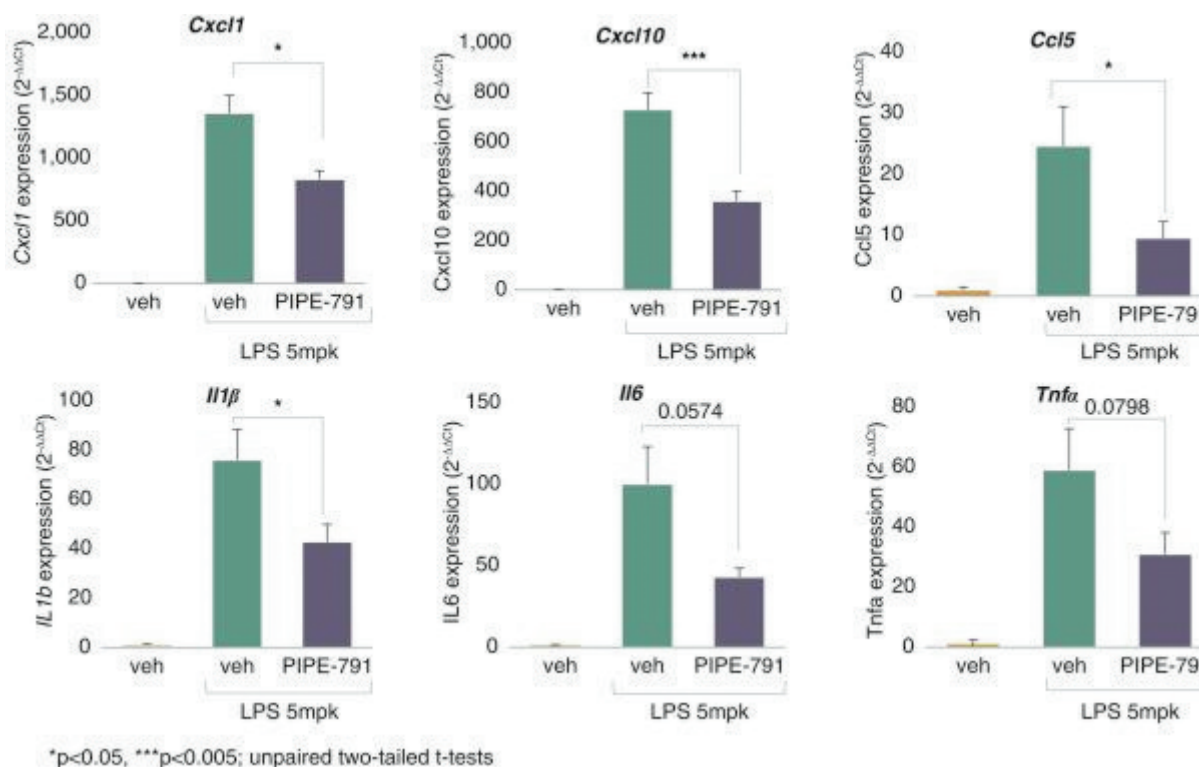
### *In Vivo LPS-Induced Neuroinflammation Model*

In addition to the EAE model results described above, we have also demonstrated the ability of PIPE-791 to reduce neuroinflammation in a rodent LPS challenge model.

We administered a single oral dose of PIPE-791 to rodents at 3 mg/kg two hours prior to an injection of LPS. Two hours later, we dissected forebrains and measured cytokine levels by quantitative PCR to assess neuroinflammation.

LPS induced expression of a broad range of neuroinflammatory cytokines including chemokines (*Cxcl1*, *Cxcl10*, *Ccl5*), interleukins (*Il1b*, *Il6*), and interferons (*Tnfa*). PIPE-791 significantly reduced expression of *Cxcl1*, *Cxcl10*, *Ccl5* and *Il1b* ( $p < 0.05$ ; unpaired t-tests). *Il6* and *Tnfa* expressions were also reduced, however statistical significance was not reached.

The following figures show the reduction of PIPE-791 on LPS induced CNS cytokine expression.



### Clinical Development Plan of PIPE-791 in Progressive MS

Based on the favorable safety results from our recently completed Phase 1 healthy volunteer trial, we have commenced a single-center Phase 1b open-label trial of PIPE-791 to measure the relationship of PK and brain receptor occupancy by PET imaging in healthy volunteers as well as patients with PrMS. We expect to have top-line data from this trial in the second quarter of 2025. We designed this trial to inform dose selection for a planned future Phase 2 trial in PrMS. We expect to submit the Phase 2 protocol under the current open IND to the FDA in mid-2025 following completion of our ongoing six-month rodent and nine-month minipig Good Laboratory Practice (“GLP”) toxicity studies for PIPE-791. The study may also be conducted under another regulatory agency outside the US, and we expect to submit the required dossier in mid-2025 in the event a non-US site is pursued. Subject to regulatory authorization, we plan to commence a proof-of-concept Phase 2 trial of PIPE-791 for PrMS to explore evidence of remyelination and reduction in neuroinflammation.

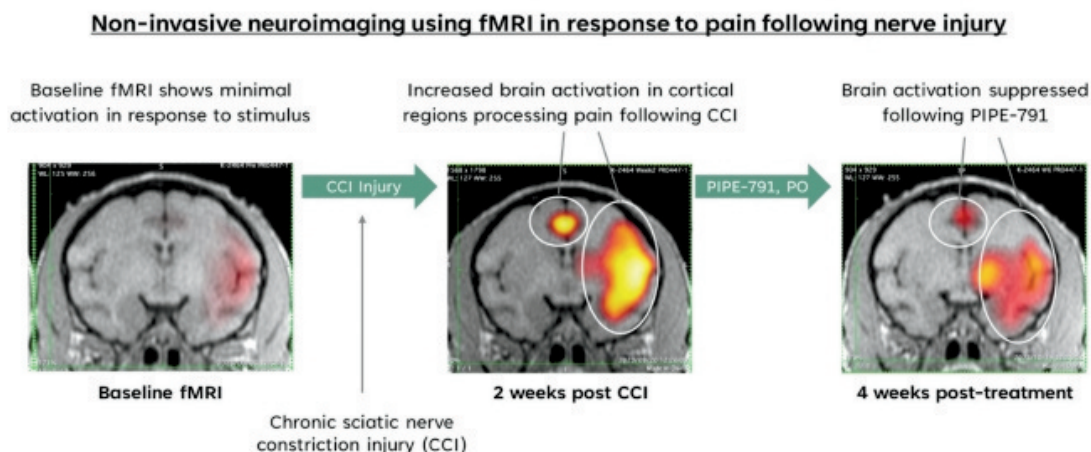
## Our PIPE-791 Development in Chronic Pain

### Overview of PIPE-791 Preclinical Proof-of-Concept Studies

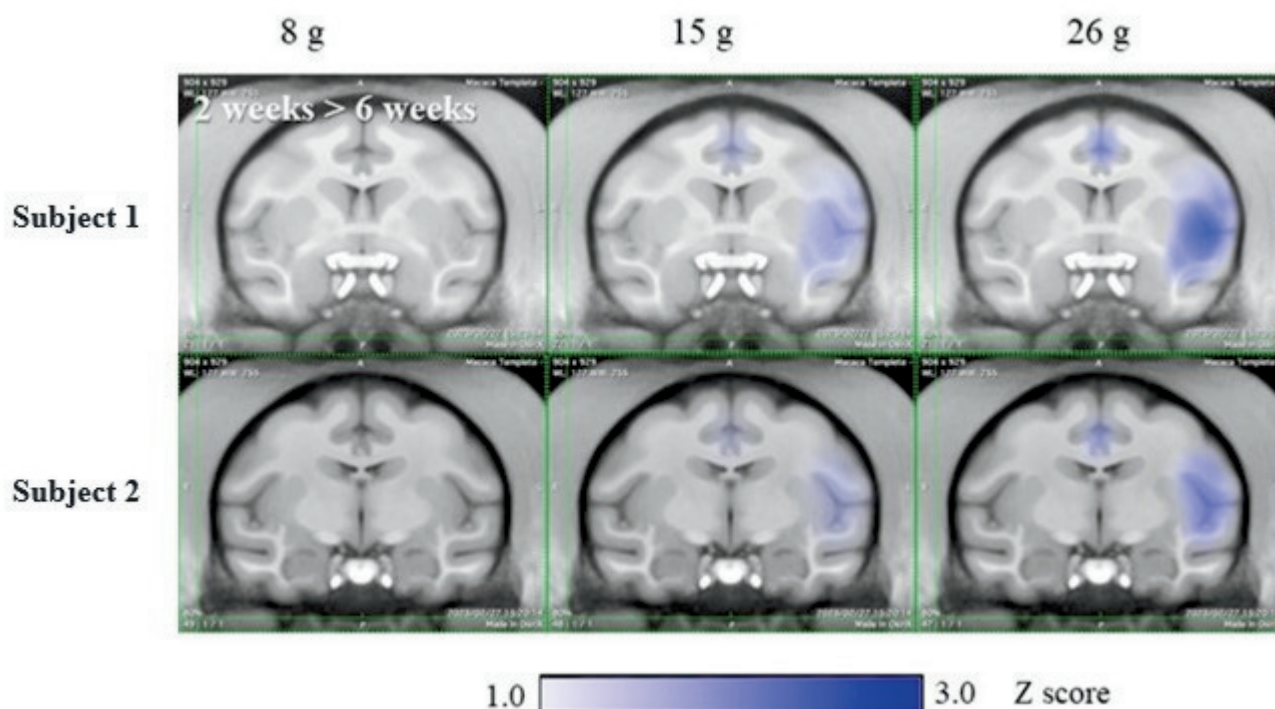
PIPE-791 is a brain penetrant, small molecule LPA1R antagonist that we believe may prevent or reverse the maladaptive changes in the nervous system that lead to chronic pain, offering a targeted and potentially effective non-opioid treatment option for patients suffering from pain conditions associated with a neuropathic component. In our preclinical studies, we assessed the ability of PIPE-791 to reduce pain in a cynomolgus macaque monkey model which utilized functional magnetic resonance imaging (“fMRI”) as a quantitative biomarker of stimulus-evoked pain following chronic constriction injury (“CCI”) of the right sciatic nerve.

Two weeks following CCI robust stimulus-evoked activation of the anterior cingulate cortex (“ACC”), we observed contralateral insular cortex, and secondary somatosensory cortex (“Ins/SII”), effects not seen prior to injury. PIPE-791, dosed QD at 10 mg/kg for 28 days starting two weeks after CCI, resulted in a statistically significant decrease in fMRI activation of the insula and secondary somatosensory cortex (z-score greater than 1.96,  $p < 0.05$ ). A reduction in the ACC region occurred but did not reach statistical significance. We did not observe activation of the ipsilateral thalamus, an expected delayed response to CCI, following PIPE-791 administration, which is supportive of a treatment effect. The reduced activation coincided with measurable concentrations of PIPE-791 in both plasma and CSF. Eight weeks after CCI, or 15 days after the last dose of PIPE-791 when PIPE-791 was not detectable in the plasma, robust regional brain activation returned. The current findings suggest an antinociceptive effect of LPAR1 antagonism in a nonhuman primate model of unilateral neuropathy, based on reduced stimulus-evoked brain activation following treatment and re-appearance of brain activation after treatment termination.

The following figure shows stimulus-evoked brain activation from a single subject 2-weeks following CCI and 4-weeks following PIPE-791 administration at 10 mg/kg/day.



The following figure shows that after four weeks of treatment with PIPE-791 a reduction in stimulus-evoked brain activation in nerve-injured non-human primates was observed.



We observed a statistically significant decrease in mean activation of the contralateral Ins/SII following 26 grams of stimulation at six weeks post-CCI compared to two weeks post-CCI (z-scores greater than 1.96). Brain activation of the ACC appeared to be reduced by PIPE-791 administration, but did not reach statistical significance (z-scores less than 1.96). The table provides mean contrast z-scores of four non-human primates. Bold indicates statistical significance,  $p < 0.05$ , in the table below.

Week 2 > Week 6 Decrease	Filament			Coordinates (mm)
Region	8 g	15 g	26 g	(x, y, z)
L-Ins/SII	0.91	1.48	<b>2.07</b>	(-20, 18, 0)
ACC	0.51	1.19	1.61	(0, 20, 2)
L-Tha	0.39	0.53	0.51	(-10, 14, 0)

#### Clinical Development Plan of PIPE-791 in Chronic Pain

In November 2024, the FDA authorized our IND for the treatment of chronic pain associated with two separate indications, OA and LBP. On March 4, 2025, we announced the initiation of patient dosing in an exploratory PIPE-791 Phase 1b, randomized, double-blind, placebo-controlled, crossover, chronic pain trial. We expect to enroll approximately 40 patients (20 patients with OA, and 20 patients with LBP) at up to five sites, and for a 28-day treatment duration. We anticipate top-line data from our PIPE-791 Phase 1b chronic pain trial in early 2026. This exploratory trial is designed to detect a signal of efficacy to support internal decision-making and possible further clinical development in chronic pain.

## CTX-343

In addition to PIPE-791, our brain penetrant drug candidate, we are also developing CTX-343, a peripherally-restricted LPA1R antagonist, to further expand clinical indications involving LPA1R antagonism.

### *Our CTX-343 Development for Peripheral Fibrotic Disease*

#### Overview of CTX-343 Preclinical *In Vitro* and *In Vivo* Characterization

We based our decision to nominate CTX-343 as a development candidate based on its pharmacodynamic properties assessed in our *in vitro* pharmacology and *in vivo* preclinical studies.

#### *CTX-343 is a Potent LPA1R Antagonist In Vitro*

We tested CTX-343 in a competitive membrane filter binding assay using membranes from cells overexpressing human LPA1. We found that CTX-343 bound human LPA1R with low double-digit nanomolar potency with half maximal inhibitory concentration (IC<sub>50</sub>). We also tested CTX-343 in a functional calcium (Ca<sup>2+</sup>) mobilization assay using 24-hour pre-incubation periods prior to LPA addition. The IC<sub>50</sub> was 48.1 nM. Additionally, we screened CTX-343 against 78 targets (Eurofin SAFETYscan) at a concentration of 30 nM with no appreciable activity.

#### *CTX-343 is an Orally Bioavailable and Peripherally-Restricted LPA1R Antagonist In Vivo*

CTX-343, when administered orally to Sprague-Dawley rats, exhibited a high oral bioavailability of 105% and a low plasma-protein corrected intrinsic clearance from plasma of 14.9 mL/min/kg. We also determined that CTX-343 was peripherally-restricted, with an unbound brain to unbound plasma partitioning coefficient (K<sub>p,uu</sub>) of 0.05.

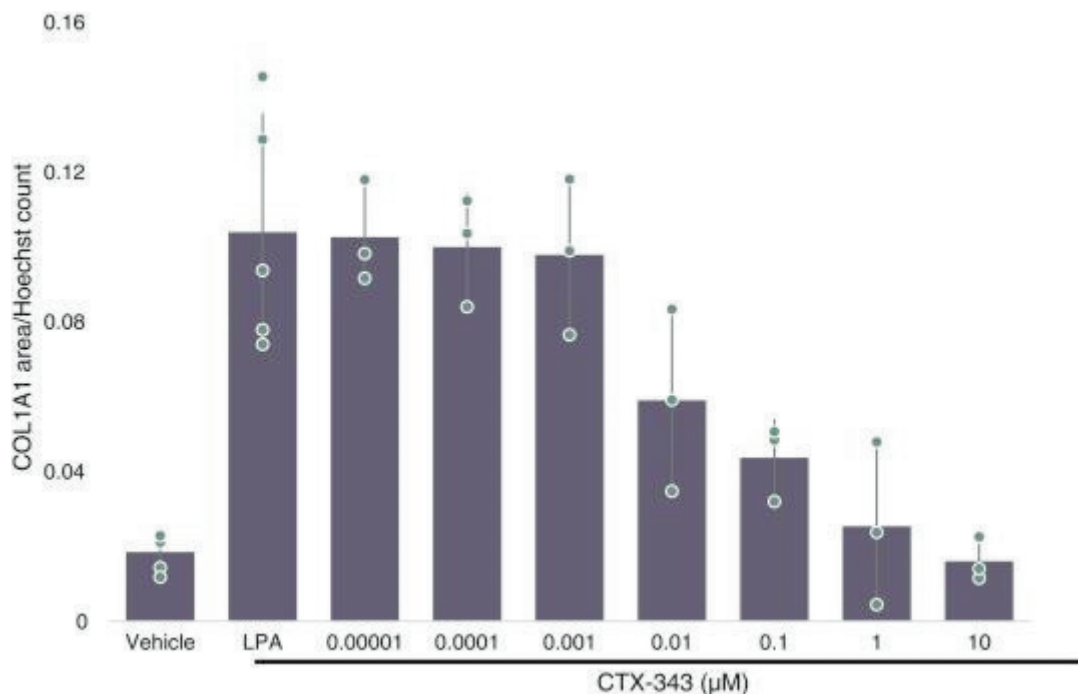
The following table provides a summary of CTX-343's *in vitro* radioligand binding and Ca<sup>2+</sup> mobilization profile, as well as its *in vivo* unbound brain to unbound plasma partitioning coefficient.

Properties	Profile
Radioligand binding K <sub>i</sub> (nM)	5.56 (IC <sub>50</sub> : 19.5)
K <sub>off</sub> (min <sup>-1</sup> )	0.00036
Functional LPA1 Ca <sup>2+</sup> mobilization (nM)	48.1
Rodent K <sub>p,uu</sub> @ 2 h	0.05



### CTX-343 Inhibits LPA1-Induced Fibroblast Collagen Production In Vitro

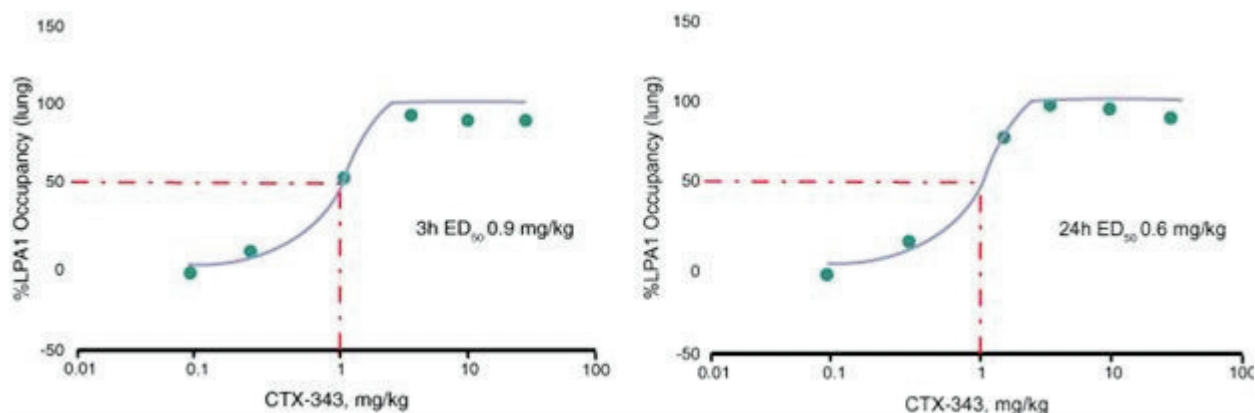
The addition of LPA to fibroblasts results in an increase in collagen production. In a collagen induction assay, CTX-343 inhibited LPA-induced COL1A1 in primary human lung fibroblasts at an IC<sub>50</sub> of 10.2 nM. The following figure shows CTX-343 inhibits LPA1-induced collagen production in human lung fibroblasts.



### CTX-343 In Vivo Lung LPA1R Occupancy

We evaluated the *in vivo* receptor occupancy of CTX-343 in mouse, three- and 24-hours after a single oral dose. We demonstrated that CTX-343 dose-dependently inhibits radioligand binding with a half maximal dosing effect (ED<sub>50</sub>) of 0.9 and 0.6 mg/kg at three- and 24-hours post oral dosing, respectively.

The following figure provides CTX-343's lung receptor occupancy versus oral dose at three hours (left figure) and 24 hours (right figure).



## *Preclinical Assessment of CTX-343 for Risk of Cholestatic Hepatotoxicity*

We evaluated the potential of CTX-343 to elicit general and cholestatic hepatotoxicity in vitro in a SCHH assay. At a concentration of 100 mM, there was a notable absence of any toxicity signal.

## Clinical Development Plan of CTX-343 for Peripheral Fibrotic Disease

We plan to file an IND with the FDA for CTX-343 in mid-2025 and, pending authorization, we plan to initiate a Phase 1 trial of CTX-343 in healthy volunteers by the end of 2025.

## **PIPE-307**

Our second clinical-stage drug candidate, PIPE-307, is a novel, small molecule, selective inhibitor of the muscarinic type 1 M1R, which is in clinical development for the potential treatment of MDD and RRMS. We have completed two Phase 1 trials of PIPE-307 in healthy volunteers, 1) a Phase 1 SAD/MAD trial, and 2) a Phase 1 PET trial. The results of these Phase 1 trials, which support future clinical development of PIPE-307 for both MDD and RRMS, are summarized below. We have received IND authorization from the FDA to conduct a Phase 2 trial in RRMS.

In February 2023, we entered into a license agreement with J&J, under which we granted J&J an exclusive, worldwide license to develop, manufacture and commercialize PIPE-307 in all indications (“J&J License Agreement”). We received an upfront payment of \$50.0 million, and we are eligible to receive milestone payments up to an aggregate of approximately \$1.0 billion and tiered royalties in the low-double digit to high-teen percent range on future net sales of products containing PIPE-307. Additionally, we received a \$25.0 million equity investment from Johnson & Johnson Innovation – JJDC, Inc. (“JJDC”), an affiliate of J&J. We are currently conducting a Phase 2 VISTA trial of PIPE-307 for the potential treatment of RRMS, which initiated in November 2023. In January 2025, we announced that our Phase 2 VISTA trial achieved full enrollment. We expect to have top-line data from this trial in the second half of 2025. In addition, J&J has the right, in its sole discretion, to further develop or elect not to develop PIPE-307 for RRMS or for any other indications. We have an opt-in right to fund a portion of all Phase 3 development costs for PIPE-307 in return for an increase in royalty rates by one to two percentage points. In December 2024, J&J began recruiting an estimated 124 adult participants for a Phase 2 trial of PIPE-307/JNJ-89495120 for the potential treatment of MDD. This trial is a randomized, double-blind, multicenter, placebo-controlled, proof-of-concept study to evaluate the efficacy, safety and tolerability of PIPE-307/JNJ-89495120 as monotherapy in adult participants with MDD. We believe PIPE-307 is the most advanced selective M1R antagonist in clinical development.

## ***PIPE-307 for the Potential Treatment of Depression***

### Disease Background

Depression is one of the most common mood disorders with approximately 280 million people globally and nearly 20% of U.S. adults suffering from the disorder. Depression is associated with significant neuropsychiatric disability and increased mortality risk and is characterized by persistently low or depressed mood, anhedonia or decreased interest in pleasurable activities, feelings of guilt or worthlessness, lack of energy, poor concentration, appetite changes, psychomotor retardation or agitation, sleep disturbances, intense euphoria, high energy, uncontrolled impulsive behaviors or suicidal thoughts or a combination of these.

### Current Approved Therapies

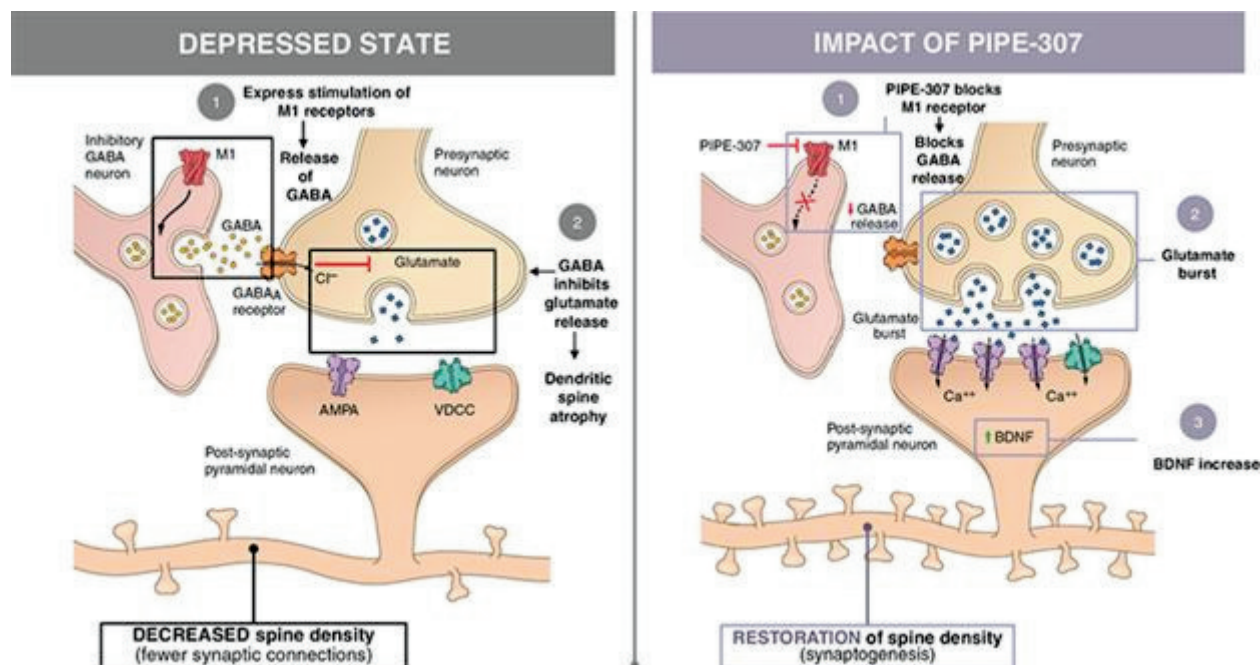
Despite numerous approved treatments, there remains a significant unmet medical need in the treatment of depression. Currently approved therapies include antidepressant drugs such as selective serotonin reuptake inhibitors, serotonin and norepinephrine reuptake inhibitors, antipsychotics and mood stabilizers. It is well recognized that many patients will fail to respond to current therapies and, in many cases, these treatments are only partially effective or not effective at all. Patients treated with these therapies often experience pronounced side effects, such as weight gain, sexual dysfunction, gastrointestinal issues and emotional blunting.

### Scientific Rationale for M1R Antagonism in Depression

The cholinergic neurotransmitter system was first implicated in the pathophysiology of depression in the early 1970s. Centrally active anticholinergic drugs, such as those used to treat Parkinson’s disease, have been reported to cause feelings of euphoria with a sense of well-being, and treatment with non-selective muscarinic antagonists blocked the depressive effects of physostigmine. More recently, repeated treatment with intravenous scopolamine resulted in rapid and

robust antidepressant responses in patients with MDD and borderline personality disorder (“BPD”). The non-specific anticholinergic properties of scopolamine lead to tolerability issues that are contraindicated in the setting of depression. In addition, two small studies found efficacy of adjunctive oral scopolamine compared to placebo when added to citalopram or naltrexone for the treatment of MDD. These data suggest that anticholinergic drugs may be useful as a treatment for mood disorders. Although scopolamine is a non-selective antagonist of all five muscarinic receptors (M1 through M5), its antidepressive effects are mediated by the M1R isoform as evidenced by gene knockout and pharmacological data. The proposed mechanism involves M1R-dependent synaptogenesis in pyramidal neurons in the prefrontal cortex. This effect is directed by blocking M1Rs located on inhibitory gamma-aminobutyric acid (“GABA”) neurons which, in turn, promotes excitatory transmission leading to increased brain-derived neurotrophic factor (“BDNF”) release and dendritic spine formation.

The following figure shows the proposed mechanism of action and resulting action of PIPE-307 in depression.



### ***PIPE-307 for the Potential Treatment of RRMS***

We are also developing, in collaboration with J&J, PIPE-307 for the potential treatment of RRMS, the most common form of MS. A pathological hallmark of all forms of MS is the accumulation of demyelinating lesions that occur in the brain and spinal cord. In healthy neurons, myelin, which is a specialized extension of the plasma membrane of oligodendrocytes, serves as an insulator that allows for rapid and efficient conduction of electrochemical signals along the axon. In MS, loss of myelin leads to slower signal transmission through the axon and eventual permanent loss of neuronal function. We believe treatments targeting remyelination, and the subsequent restoration of axonal conduction, can positively impact clinical disability and address the neurodegeneration associated with RRMS. While the FDA has approved over 20 therapies for RRMS that focus on immune modulation to reduce the annual rate of relapses associated with the inflammatory aspects of the disease, none of these therapies directly promote remyelination.

We believe that PIPE-307 has the potential to address one of the leading causes of long-term neurodegeneration by promoting remyelination. Based on the results of preclinical studies, as well as clinical proof-of-concept established in a Phase 2 trial performed by a third party with clemastine, we believe there is a strong rationale for clinical development of PIPE-307 in RRMS.

Clinical proof-of-concept for M1R antagonism and remyelination in RRMS was demonstrated in a Phase 2 randomized, double-blind, placebo-controlled crossover trial to assess the efficacy of clemastine, an FDA approved H1 antihistamine and non-selective antimuscarinic compound, as a remyelinating agent in RRMS. However, the antihistamine related side effects associated with clemastine complicate use of this drug in the MS patient population. We developed PIPE-307 as a highly-selective M1R antagonist in order to avoid the side effects associated with broad anti-muscarinic agents.



## Disease Background

MS is a chronic, immune mediated disease of the CNS characterized by demyelination and neuroinflammation which ultimately result in axonal loss and clinical disability. Effective treatments for the progressive neurodegeneration in MS remain one of the largest unmet needs for the nearly 1 million patients in the United States and estimated 2.8 million globally living with this disorder in 2020.

RRMS comprises roughly 85% of newly diagnosed MS patients. The clinical course is marked by relapses and remissions with generally no significant progression between relapses. While current treatments for RRMS patients focus on suppressing the immune system to limit inflammation and further loss of the myelin sheath, there are no approved therapies that effectively or directly promote remyelination to mitigate the progressive disability associated with chronic demyelination.

## Current Approved Therapies

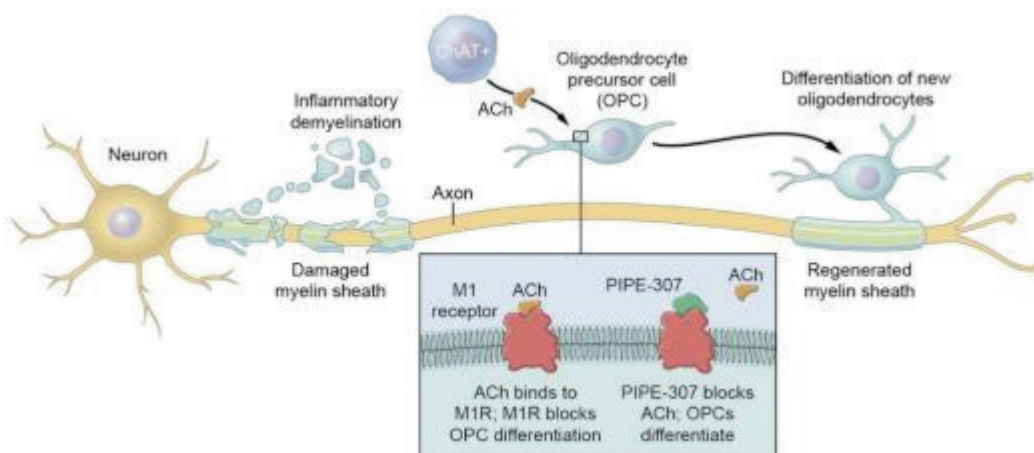
The FDA has approved over twenty DMTs that suppress inflammatory injury and decrease the rate of annual relapses. However, none of these approved therapies, to our knowledge, directly remyelinate nerve fibers or avert neuronal degeneration and disability related to chronic demyelination. We believe that remyelination will address one of the primary pathological aspects of MS that is not addressed by immune-modulatory therapies.

## Scientific Rationale for Remyelination and M1R Antagonism in RRMS

Remyelination has been proposed as one of the most promising approaches to prevent accumulating permanent disability in demyelinating diseases such as MS. Remyelination may even reverse the progressive disability associated with axonal dysfunction that occurs secondary to chronic demyelination.

A key disease hallmark in RRMS is reduced remyelination capacity, and molecular pathways that mediate myelination have long been considered promising therapeutic targets. A third party initially noted the remyelinating potential of antimuscarinic compounds as part of an extensive drug screening investigation using a proprietary micropillar platform. The drug screening identified clemastine, an FDA-approved H1 antihistamine and antimuscarinic compound, as a potential candidate to support remyelination. Clemastine was shown to enhance myelination in a rodent EAE model based on a high affinity for the muscarinic receptors, and M1R was ultimately identified as the molecular target for clemastine in OPCs. Clemastine was subsequently evaluated in a double-blind, randomized, placebo-controlled crossover Phase 2 trial in patients with RRMS, referred to as the ReBuild trial. The ReBuild trial results provided the first evidence of remyelination based on improvement in VEP latency. An associated trend for improvement in a visual measure related to contrast sensitivity was also observed consistent with a treatment effect of remyelination. The measure, referred to as low contrast visual acuity, is known to be impaired in MS patients as compared to age-matched healthy controls. Unfortunately, the side effect profile related to the blocking of the H1 receptor by clemastine prevents further dose escalation studies due to the narrow therapeutic window.

We believe that the results of this Phase 2 trial demonstrate proof-of-concept for M1R antagonism and remyelination in RRMS patients. The following figure shows the proposed mechanism of action and resulting action of PIPE-307 in RRMS.



## Summary of PIPE-307 Completed Phase 1 Healthy Volunteer Trials to Support Development in Depression and RRMS

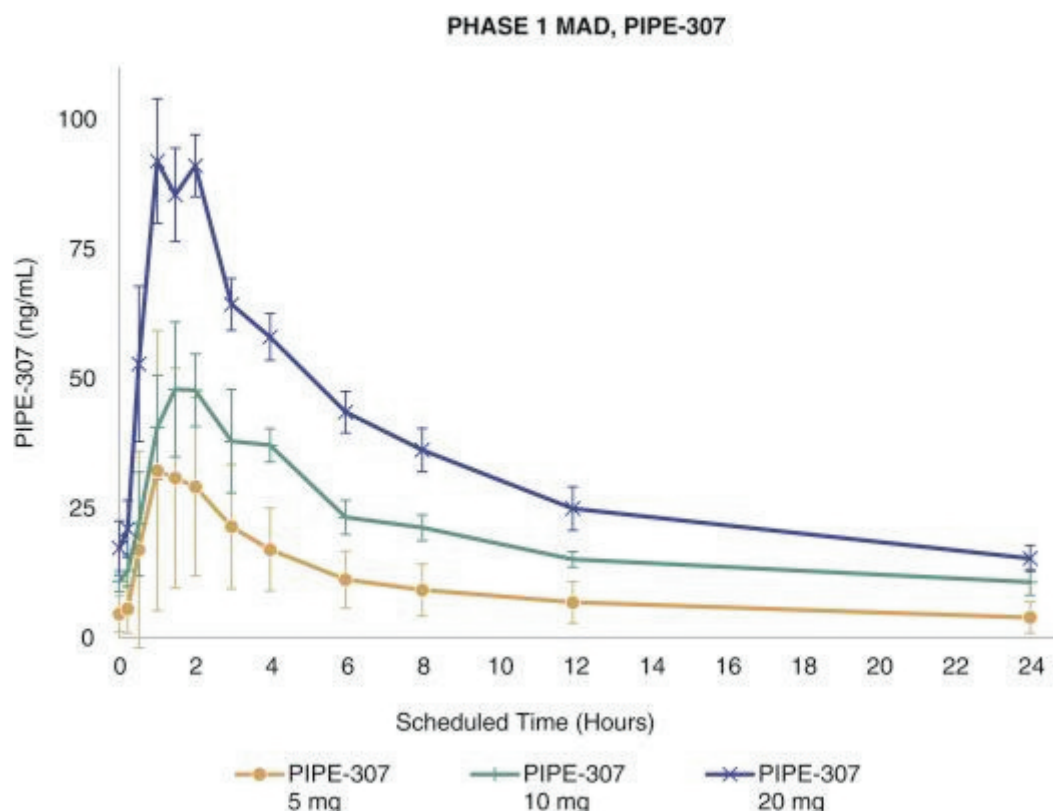
### Phase 1 Healthy Volunteer SAD and MAD Trial

We have conducted a Phase 1, randomized, double-blind, placebo-controlled, safety, tolerability, and PK trial of escalating single and multiple doses of PIPE-307 and the effect of food in healthy volunteers. The study included six planned SAD cohorts (up to 80 mg of single doses of PIPE-307) and three planned MAD cohorts (up to 20 mg of PIPE-307 QD for seven days). All SAD and MAD cohorts were completed as planned with no patients discontinuing the trial. The primary objective of the trial was to assess the safety and tolerability of single and repeat oral doses of PIPE-307 in healthy volunteer subjects. The secondary objective of the trial was to assess the single and repeat dose plasma PK profile of PIPE-307. The trial met the primary and secondary objectives.

TEAEs in both the SAD and MAD components of the Phase 1 trial were generally categorized as mild and transient. There was no clinically significant difference in the AE profile of PIPE-307 between the fasted and fed conditions. No serious or severe AEs were reported among the subjects who received PIPE-307, and no clinically significant effects of PIPE-307 were observed on safety laboratory tests, vital signs, or electrocardiogram. In summary, no dose-limiting AEs or toxicities were observed in the SAD or MAD components of this Phase 1 trial.

We assessed cognitive measures of psychomotor function, attention, memory and executive function at key PK time points during the SAD and MAD cohorts of this Phase 1 trial. We did not observe evidence of any negative effect of PIPE-307 on aspects of higher cognitive function.

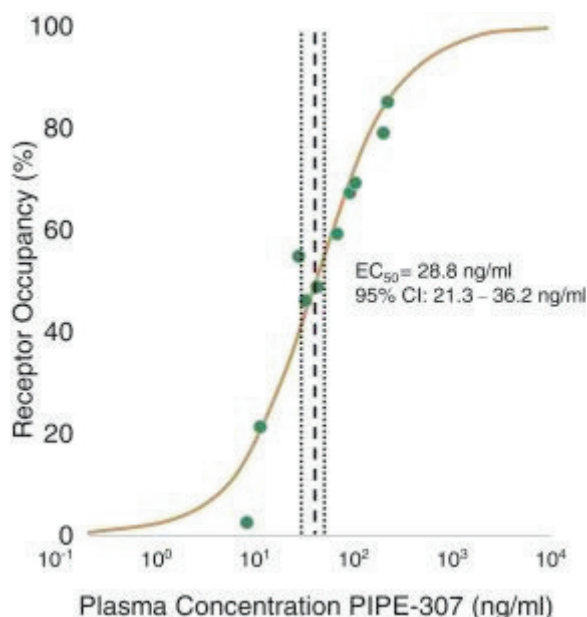
The following figure shows the plasma concentration time profile of the three MAD cohorts after the seventh and final dose of PIPE-307.



## Phase 1 Healthy Volunteer PET Trial

We conducted an open-label Phase 1 trial to assess brain receptor occupancy by PET imaging in healthy volunteers after a single oral dose of PIPE-307. The primary objective was to determine the brain M1AChR occupancy using [<sup>11</sup>C] PIPE-307 PET imaging following a single oral dose of PIPE-307. The secondary objective was to determine the relationship between the plasma concentration of PIPE-307 and the time-course of M1AChR occupancy using [<sup>11</sup>C] PIPE-307 PET imaging, following a single oral dose of PIPE-307. The trial met the primary and secondary objectives. The trial included three dose cohorts (two subjects in each cohort) at 10, 20 and 40 mg. No safety concerns were observed with the single doses administered in this trial. The PET kinetics demonstrated robust quantification and established the estimated human EC<sub>50</sub> of 28.8 ng/mL (95% confidence interval (CI): 21.3-36.2 ng/ml) consistent with a daily PIPE-307 dose range of 10 to 20 mg.

The following figure shows plasma concentrations and brain M1R occupancy following single doses of 10, 20 and 40 mg of PIPE-307.



## ***On-Going Clinical Development of PIPE-307***

### Clinical Development of PIPE-307 for Depression

In December 2024, J&J began recruiting an estimated 124 adult participants for a Phase 2 trial of PIPE-307/JNJ-89495120 for the potential treatment of MDD. This trial is a randomized, double-blind, multicenter, placebo-controlled, proof-of-concept study to evaluate the efficacy, safety and tolerability of PIPE-307/JNJ-89495120 as monotherapy in adult participants with MDD.

### Clinical Development Plan of PIPE-307 for RRMS

In November 2023, we initiated a Phase 2 randomized, double-blind, placebo-controlled, dose-ranging multi-center trial to evaluate the safety and efficacy of oral PIPE-307 as an adjunctive treatment in subjects with RRMS, referred to as the VISTA trial. The primary inclusion criteria are patients aged 18 to 50 years, EDSS of 0 to 6.0 (inclusive), and on stable immunomodulatory treatment over six months prior to screening. The six-month study was designed to enroll approximately 168 subjects into one of three separate arms (1:1:1 randomization ratio, PIPE-307 10 mg: PIPE-307 20 mg: placebo). The co-primary objectives of the trial are to assess the safety of daily oral dosing of PIPE-307, and to assess the effect of six months of PIPE-307 on change in binocular 2.5% low contrast letter acuity (“LCLA”). The key secondary objectives include LCLA response rate, change in monocular 2.5% LCLA, overall disability as measured by the Multiple Sclerosis Functional Composite (including a timed 25-foot walk test and a 9-hole peg test) and the Symbol Digital Modality Test, MRI measures of myelination (magnetization transfer imaging and diffusion tensor imaging), serum neurofilament light chain, and plasma population PK parameters. In January 2025, we announced that we had completed enrollment of this Phase 2 trial. We expect to have top-line results from this trial in the second half of 2025.

## ***PIPE-307 Completed Preclinical Studies to Support Development in Depression and RRMS***

### Summary of PIPE-307 Preclinical Toxicity Studies

The toxicity and safety pharmacology profiles of PIPE-307 have been evaluated in a comprehensive non-clinical program. The pivotal toxicology studies were performed in rodents and dogs and consisted of up to six and nine months, respectively, of daily oral dosing with recovery as appropriate. In addition, GLP safety pharmacology studies in rodents and dogs that evaluated cardiovascular, respiratory, and CNS function were performed as well as embryo-fetal development studies in rodents and rabbits.

### ***PIPE-307 Development in Depression***

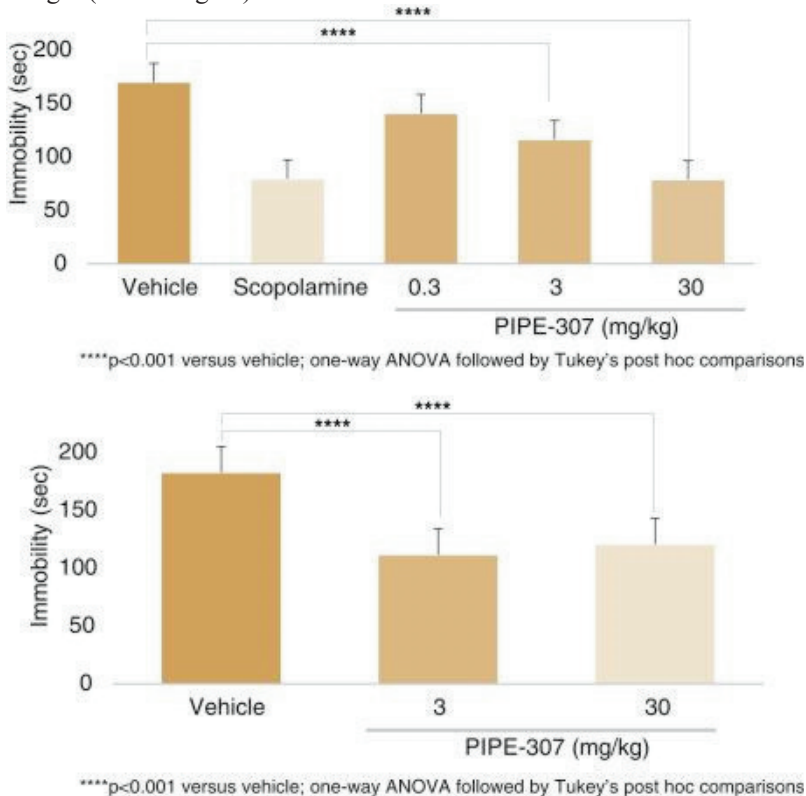
#### Overview of PIPE-307 Preclinical Proof-of-Concept Studies

PIPE-307 is a novel, small molecule, selective inhibitor of M1R. PIPE-307 has been demonstrated to bind with high affinity to the M1R with pronounced selectivity as compared to other muscarinic receptors when tested in cells overexpressing each receptor. In our preclinical studies of PIPE-307, we observed increased mEPSC amplitude and increased presynaptic release events in the mPFC 24 hours after dosage. PIPE-307 improved depression-like behaviors in the Porsolt forced swim test (“PST”).

#### *In Vivo Depression Model*

We evaluated the effects of PIPE-307 on depression-related parameters in rodents in the PST using either a single oral dosing paradigm or seven-day QD dosing paradigm. In the first paradigm, we administered PIPE-307 in rodents orally at 0.3, 3, or 30 mg/kg two hours prior to the PST. We then used scopolamine as positive control, which was administered at a dose of 3 mg/kg by intraperitoneal injection. In the second paradigm, we administered vehicle or PIPE-307 in rodents orally at 3 or 30 mg/kg/day for seven days, with the PST conducted at two hours post-final dose. We observed that administering a single oral dose of PIPE-307 two hours prior to the PST reduced immobility time compared to vehicle in a dose-dependent manner. Following repeated QD oral administration of PIPE-307 for seven days, the efficacy of the 30 mg/kg/day dose was comparable to that observed following a single dose however, the efficacy of the 3 mg/kg/day dose was improved to a level similar to that of the 30 mg/kg/day dose.

The following figures show PIPE-307 effective in rodent PST, including single dose paradigm (top figure) and seven-day QD dosing paradigm (bottom figure).



## PIPE-307 Development in RRMS

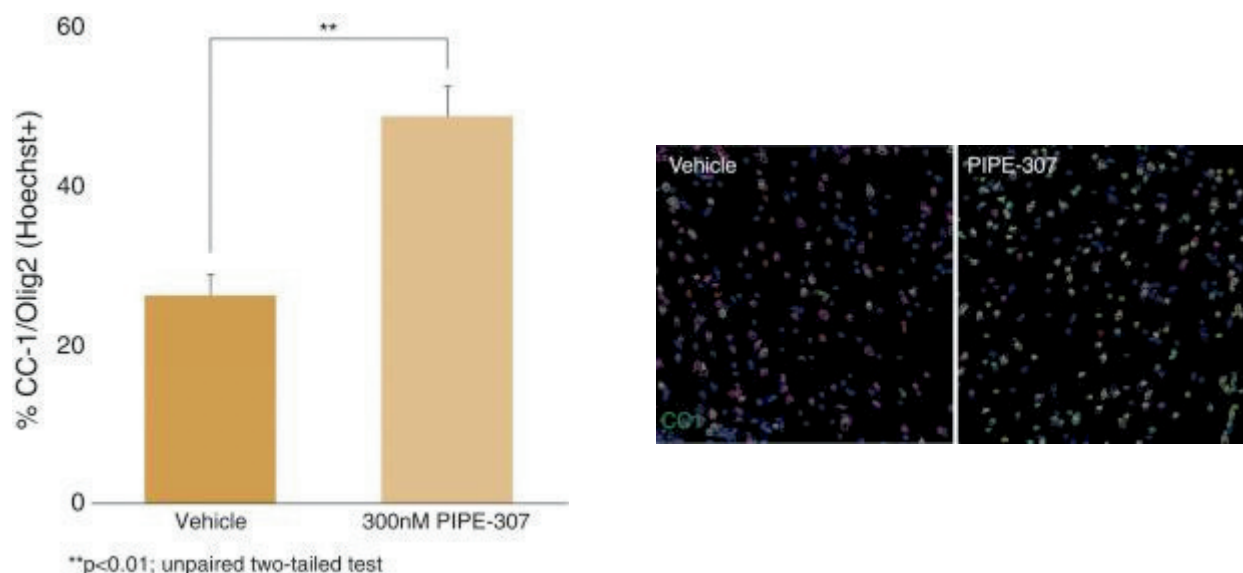
### Overview of PIPE-307 Preclinical Proof-of-Concept Studies

PIPE-307 shows strong potential to remyelinate in both *in vitro* and *in vivo* preclinical studies. In our *in vitro* studies we have demonstrated that PIPE-307 promotes differentiation of OPCs and increases myelin-membrane wrapping in cell culture assays and rodent brain slices. At dose levels that occupy the M1R at EC50, PIPE-307 has been shown to result in significant remyelination in the EAE model with associated functional improvement in motor recovery and VEP latency.

#### PIPE-307 Increases OPC Maturation in Human Brain Tissue In Vitro

We evaluated PIPE-307 in human brain tissue using fresh human cortex from a 66-year-old female donor (gray and white matter). Treatment of the tissue with 300nM PIPE-307 for nine days revealed an increase in mature oligodendrocytes as determined by an increase in adenomatous polyposis coli, or APC clone 1 positive (CC-1+) cells using immunohistochemical analysis.

The following figures show that PIPE-307 increases the number of CC-1+ mature oligodendrocytes in a human organotypic slice culture assay, demonstrating its role in promoting OPC maturation.

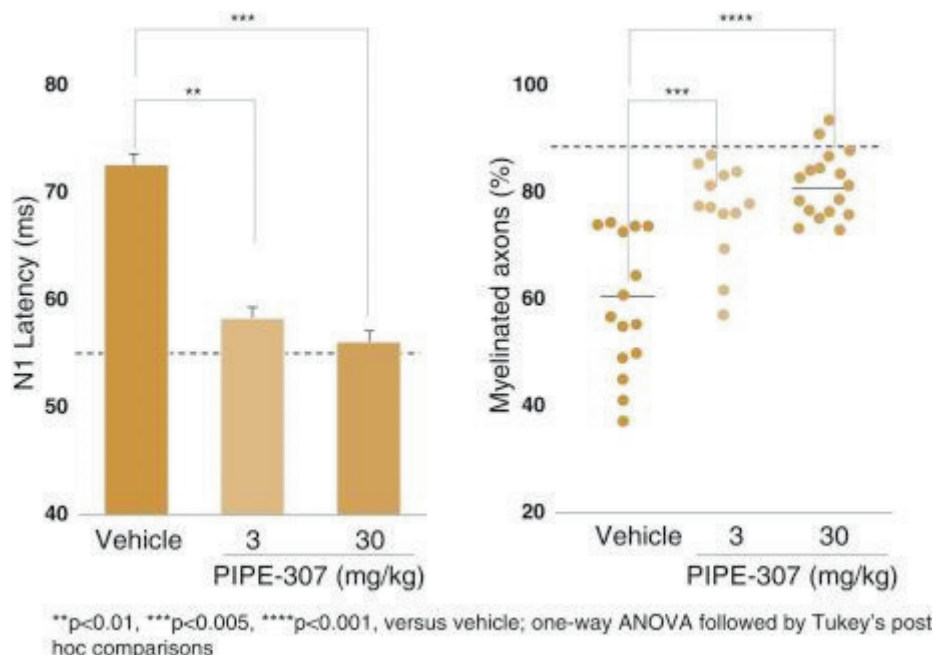


#### In Vivo MS Models

As described above, we have conducted an *in vivo* M1R study. We tested the ability of PIPE-307 to promote remyelination and to restore neuronal function *in vivo* in a rodent EAE model of inflammatory demyelination. We immunized rodents with a peptide corresponding to an epitope on MOG. After approximately nine days, rodents developed EAE followed by flaccid paralysis along with an increase in VEP N1 latencies. PIPE-307 treatment at doses of 3 mg/kg restored VEP N1 latency and led to a statistically significant increase in the percent of axons in the CNS that were myelinated ( $p<0.005$ ; one-way ANOVA).



The following figure shows that PIPE-307 led to statistically significant improvements in the MOG EAE model as measured by VEP latency and axonal myelination.



## Our Discovery Pipeline

We plan to further leverage our drug discovery capabilities to build out a franchise with deliberate focus on developing therapeutics that are synergistic with our existing portfolio. To that end, we have developed a selective calpain inhibitor which was recently moved into preclinical studies. Calpain is a cysteine protease that requires calcium for activation. Inappropriate regulation of the calpain-calpastatin proteolytic system is implicated in a range of significant human pathological processes, including peripheral neuropathies, fibrosis and chronic neutrophilic inflammation. Consequently, blocking calpain with a selective inhibitor could benefit those affected by these disease states.

## Competition

The biotechnology and pharmaceutical industries are characterized by rapid evolution of technologies, fierce competition and strong defense of intellectual property. While we believe that our platform and our knowledge, experience and scientific resources provide us with competitive advantages, we face competition from major pharmaceutical and biotechnology companies, academic institutions, governmental agencies and public and private research institutions, among others.

If any of the drug candidates we are developing, either alone or in collaboration with J&J, are approved, they will compete with established therapies and currently marketed drugs, as well as any drugs potentially in development. It is also possible that these drug candidates will face competition from other pharmaceutical approaches as well as other types of therapies. The key competitive factors affecting the success of the drug candidates we are developing, if approved, are likely to be their efficacy, safety, convenience, price, level of generic competition and availability of reimbursement.

## PIPE-791 for IPF

While there is no pharmacological cure for IPF, there are two FDA-approved therapies to treat the disease: pirfenidone (Esbriet, marketed by Genentech/Roche) and nintedanib (Ofev, marketed by Boehringer Ingelheim). We are also aware of LPA1R targeted drug candidates in development for IPF by Bristol-Meyers Squibb, AbbVie Inc., Horizon Therapeutics plc, and Structure Therapeutics Inc. In addition, there are a number of companies developing drug candidates for IPF utilizing approaches with different mechanisms of action, including but not limited to Roche Holding AG, Boehringer Ingelheim, United Therapeutics Corporation, Pliant Therapeutics, RedX Pharma and Endeavor Biomedicines.

### ***PIPE-791 for Progressive MS***

While there are a number of MS medications approved by the FDA for the “active” form of SPMS, no FDA-approved drugs carry a specific indication for PrMS. Mitoxantrone (Novantrone®, marketed by Serono) is approved for SPMS and ocrelizumab (Ocrevus®, marketed by Genentech/Roche) is approved for PPMS.

### ***PIPE-791 for Chronic Pain***

Standard-of-care medications for pain include NSAIDs such as ibuprofen, naproxen, COX-2 inhibitors, topical agents, anticonvulsants, antidepressants, muscle relaxants and opioids. Many of these approved therapies are offered as over the counter or prescription generics. Our competition may also include other programs in clinical development for the treatment of OA and/or LBP being developed by Vertex Pharmaceuticals Inc., Eli Lilly and Company, GSK plc, Novartis AG and AstraZeneca PLC.

### ***PIPE-307 for Depression***

There are numerous approved therapies for depression, including antidepressant drugs such as selective serotonin reuptake inhibitors, serotonin and norepinephrine reuptake inhibitors, antipsychotics and mood stabilizers. A number of these approved therapies are offered as generics.

### ***PIPE-307 for RRMS***

We are aware of over 20 DMTs that suppress inflammatory injury and decrease the rate of annual relapses. However, to our knowledge, none of these approved therapies, including any generics, effectively promote remyelination to mitigate the progressive disability associated with chronic demyelination.

Many of our current or potential competitors, either alone or with their collaboration partners, have significantly greater financial resources and expertise in research and development, manufacturing, preclinical testing, conducting clinical trials, obtaining regulatory approvals, and marketing approved products than we do. These competitors also compete with us in recruiting and retaining qualified scientific and management personnel and establishing clinical trial sites and patient registration for clinical trials, as well as in acquiring technologies complementary to, or necessary for, our programs. Mergers and acquisitions in the biopharmaceutical 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.

Our commercial opportunity could be reduced or eliminated if our competitors develop and commercialize products that are safer, more effective, have fewer or less severe side effects, are more convenient or are less expensive than any products that we may develop. Our competitors also may obtain FDA or other applicable 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 ability to compete may be affected in many cases by insurers or other third-party payors seeking to encourage the use of generic products. There are generic products currently on the market for certain of the indications that we are pursuing and additional products are expected to become available on a generic basis over the coming years. If our drug candidates are approved, we expect that they will be priced at a significant premium over competitive these generic products.

### **Intellectual property**

We strive to protect and enhance the proprietary technology, inventions, trade secrets and know-how that are commercially important for our business, including by seeking, maintaining and defending patent rights, whether developed internally or licensed from third parties. In addition to patent protection, we rely upon unpatented trade secrets and confidential know-how and continuing technological innovation related to our drug candidate programs, clinical translational approach, and drug development efforts. We seek to protect our proprietary information, in part, using confidentiality agreements with any collaborators, scientific advisors, employees and consultants and invention assignment agreements with our employees. We also have agreements requiring assignment of inventions with selected consultants, scientific advisors and collaborators. Our success will depend in part on our ability to obtain and maintain patent protection for our drug candidates and technologies, to preserve our trade secrets, to operate without infringing the proprietary rights of third parties and to acquire licenses related to enabling technology or products.

### ***PIPE-791***

The patent portfolio for our PIPE-791 program is based upon our owned patent families that include patent applications directed generally to compositions of matter, pharmaceutical compositions, and methods of using the same to treat neurodegenerative disorders, inflammatory diseases, demyelinating diseases, fibrotic diseases, and cancer; and specifically directed to compositions of matter for PIPE-791, pharmaceutical compositions of PIPE-791 and methods of using the same to treat MS. As of February 28, 2025, we own two patent families covering PIPE-791. The first patent family includes pending patent applications in U.S., Australia, Brazil, Canada, Chile, China, Eurasia, Europe, India, Israel, Indonesia, Japan, South Korea, Mexico, Malaysia, New Zealand, Philippines, Singapore and South Africa directed to compositions of matter for PIPE-791, pharmaceutical compositions of PIPE-791 and methods of using the same to treat neurodegenerative disorders, inflammatory diseases, demyelinating diseases, fibrotic diseases, and cancer. The second patent family includes a pending PCT patent application and covers a PIPE-791 polymorph composition of matter and methods of using the same to treat neurodegenerative disorders, inflammatory diseases, demyelinating diseases, fibrotic diseases, and cancer. Any U.S. or ex-U.S. patents that may issue from pending applications in the first patent family are projected to have a statutory expiration date of August 4, 2042, excluding any additional term for patent term adjustments or patent term extensions, if applicable. Any U.S. or ex-U.S. patents that may issue from pending applications in the second patent family are projected to have a statutory expiration date of January 26, 2044, excluding any additional term for patent term adjustments or patent term extensions, if applicable.

### ***PIPE-307***

The patent portfolio for our PIPE-307 program is based upon our owned patent families that include patents and patent applications directed generally to compositions of matter, pharmaceutical compositions, and methods of using the same to treat neurodegenerative disorders; and specifically directed to compositions of matter for PIPE-307, pharmaceutical compositions of PIPE-307 and methods of using the same to treat MS. As of February 28, 2025, we own two patent families covering PIPE-307. The first patent family includes patent applications pending in U.S., Australia, Brazil, Canada, Chile, China, Eurasia, Europe, Hong Kong, India, Israel, Indonesia, Japan, South Korea, Mexico, Malaysia, New Zealand, Philippines, Singapore and South Africa directed to compositions of matter for PIPE-307, pharmaceutical compositions of PIPE-307 and methods of using the same to treat MS. The second patent family includes pending patent applications in U.S., United Arab Emirates, Australia, Bahrain, Brazil, Canada, Chile, China, Colombia, Algeria, Eurasia, Europe, Hong Kong, Indonesia, Israel, India, Jordan, Japan, South Korea, Kuwait, Mexico, Malaysia, New Zealand, Oman, Panama, Peru, Philippines, Qatar, Saudi Arabia, Singapore, Thailand, Ukraine, Vietnam and South Africa and covers a PIPE-307 polymorph composition of matter and methods of using the same to treat MS. Any U.S. or ex-U.S. patents that may issue from pending applications in the first patent family are projected to have a statutory expiration date of October 6, 2040, excluding any additional term for patent term adjustments or patent term extensions, if applicable. Any U.S. or ex-U.S. patents that may issue from pending applications in the second patent family are projected to have a statutory expiration date of April 13, 2042, excluding any additional term for patent term adjustments or patent term extensions, if applicable.

### ***CTX-343***

The patent portfolio for our CTX-343 program is based upon our owned. As of February 28, 2025, we own a pending patent application directed to compositions of matter for CTX-343, pharmaceutical compositions of CTX-343 and methods of using the same to treat fibrotic diseases and cancer. Any U.S. or ex-U.S. patents that may issue from the pending application is projected to have a statutory expiration date of March 11, 2045, excluding any additional term for patent term adjustments or patent term extensions, if applicable.

### ***Patent Term Extensions***

In the United States, the term of a patent covering an FDA-approved drug may, in certain cases, be eligible for a patent term extension under the Hatch-Waxman Act as compensation for the loss of patent term during the FDA regulatory review process. The period of extension may be up to five years, but cannot extend the remaining term of a patent beyond a total of 14 years from the date of product approval. Only one patent among those eligible for an extension and only those claims covering the approved drug, a method for using it, or a method for manufacturing it may be extended. Similar provisions are available in Europe and in certain other jurisdictions to extend the term of a patent that covers an approved drug. It is possible that issued U.S. patents covering the use of products from our intellectual property may be entitled to patent term extensions. If our use of drug candidates or the drug candidate itself receive FDA approval, we intend to apply for patent term extensions, if available, to extend the term of patents that cover the approved use or drug candidate. We also intend to seek patent term extensions in any jurisdictions where available, however, there is no guarantee that the applicable authorities, including the FDA, will agree with our assessment of whether such extensions should be granted, and, even if granted, the length of such extensions.



## **License and Collaboration Agreements**

### ***J&J License Agreement***

In February 2023, we entered into the J&J License Agreement, pursuant to which we granted J&J an exclusive, worldwide license to develop, manufacture and commercialize PIPE-307 in all indications.

J&J is generally responsible for all development, manufacturing and commercialization activities for PIPE-307. Upon J&J deciding to conduct a first Phase 3 clinical trial for a product using PIPE-307, we have an opt-in right to fund a portion of all Phase 3 and subsequent development costs for PIPE-307, with such costs capped annually. If we opt to fund such development costs, then the royalties we are eligible to receive will increase by one to two percentage points.

Consistent with our rights under the J&J License Agreement, we are sponsoring and conducting, at our own expense, a Phase 2 clinical trial of PIPE-307 in patients with RRMS. J&J has the right to discontinue our clinical trial if it has good faith concerns that this study presents safety risks or could have a material adverse effect on its development or commercialization of PIPE-307 and such concerns cannot be resolved between the parties. In addition, J&J has the right, in its sole discretion, to further develop or to elect not to develop PIPE-307 for this indication.

Pursuant to the terms of the J&J License Agreement, we received an upfront payment of \$50.0 million. We are also eligible to receive approximately \$1.0 billion in non-refundable, non-creditable milestone payments, pursuant to the terms of the J&J License Agreement. Additionally, we are eligible to receive tiered royalties in the low-double digit to high-teen percent range on net sales of products containing PIPE-307. Separately, we received a \$25.0 million equity investment from JJDC.

The J&J License Agreement expires on a licensed product-by-product and country-by-country basis upon the last to occur of: (i) the expiration of the last-to-expire licensed patent claim covering the composition of matter of the licensed compound in such licensed product in such country; (ii) the expiration of exclusive marketing rights conferred by a regulatory authority or applicable law (other than patent exclusivity) for such licensed product in such country; and (iii) ten years after the first commercial sale of such licensed product. Either party may terminate the J&J License Agreement in the event of an uncured material breach by the other party or a bankruptcy or insolvency of the other party. J&J may terminate the J&J License Agreement without cause upon prior written notice to us. Upon any termination, all exclusive license rights granted to J&J terminate.

### **Manufacturing**

Our drug candidates consist of small molecules designed to reactivate innate repair pathways to restore function. As a result, we can rely on the well-established and available manufacturing and drug-delivery technologies developed for small molecules over decades by the pharmaceutical industry. We source our APIs from contract manufacturers with a track record of manufacturing in compliance with Good Manufacturing Practice (“cGMP”). After quality control testing, we release our APIs to additional contract manufacturers for formulation and packaging into the final drug product for use in our clinical trials. We expect to continue to use contract manufacturing resources for commercialization of our products, at least until our operations reach a scale sufficient to justify investment in internal manufacturing capacity.

Our third-party contract manufacturers and their facilities, as well as the manufacture of our APIs and drug candidates, are required to be in compliance with cGMP requirements. The cGMP requirements govern manufacturing processes and procedures, including requirements relating to organization of personnel, buildings and facilities, equipment, control of components and packaging containers and closures, production and process controls, packaging and labeling controls, holding and distribution, laboratory controls, records and reports, and returned or salvaged products. Drug candidates used in late-stage clinical trials must be manufactured in accordance with cGMP requirements and manufacturing specifications and processes must satisfy FDA or other authorities’ requirements before any product is approved and before we can offer commercial products. Our third-party manufacturers are also subject to periodic inspections of facilities by the FDA and other authorities. We have assembled a team of employees and consultants to oversee our technical quality and our third-party contract manufacturers.

### **Commercialization**

In light of our stage of development, we have not yet established a sales and marketing organization or distribution capabilities. If PIPE-791 receives marketing approval, we plan to commercialize PIPE-791 in the United States by developing our own sales and marketing organization targeting neurologists. Outside the United States, we intend to establish commercialization strategies for PIPE-791 as we approach possible commercial approval for this drug candidate,

with a primary strategy of collaborations with other companies. J&J is responsible for the commercialization activities for PIPE-307.

## **Government Regulation**

The FDA and comparable regulatory authorities at federal, state and local levels and in other countries impose substantial and burdensome requirements upon companies involved in, among other things, the clinical development, manufacture, marketing, and distribution of drugs, such as those we are developing. These agencies and other federal, state, local, and foreign entities regulate, among other things, the research and development, testing, manufacture, quality control, safety, effectiveness, labeling, packaging, storage, record keeping, approval, advertising and promotion, marketing, distribution, tracking, sale, post-approval monitoring and reporting, sampling, and export and import of our drug candidates. We, along with our vendors, collaboration partners, contract research organizations (“CROs”) and CMOs, will be required to navigate the various preclinical, clinical, manufacturing and commercial approval requirements of the governing regulatory agencies of the countries in which we wish to conduct studies or seek approval of our drug candidates. The process of obtaining regulatory approvals of drug products and ensuring subsequent compliance with appropriate federal, state, local, and foreign statutes and regulations requires the expenditure of substantial time and financial resources.

### ***U.S. Drug Development Process***

In the United States, the FDA regulates drugs under the Federal Food, Drug, and Cosmetic Act (“FDCA”) and its implementing regulations. The process of obtaining regulatory approvals and the subsequent compliance with appropriate federal, state, local, and foreign statutes and regulations requires the expenditure of substantial time and financial resources. Failure to comply with the applicable U.S. requirements at any time during the product development process, approval process, or after approval, may subject an applicant to a variety of administrative or judicial sanctions, such as the FDA’s refusal to approve pending New Drug Applications (“NDA”), withdrawal of an approval, imposition of a clinical hold, issuance of warning or untitled letters, product recalls, product seizures, total or partial suspension of production or distribution, injunctions, fines, refusals of government contracts, restitution, disgorgement, or civil or criminal penalties.

The process required by the FDA before a drug may be marketed in the United States generally involves the following:

- completion of preclinical laboratory tests, animal studies, and formulation studies in compliance with the FDA’s GLP regulations;
- submission to the FDA of an IND which must become effective before human clinical trials may begin and must be updated annually or when significant changes are made;
- approval by an independent institutional review boards (“IRB”) or independent ethics committee (“IEC”) at each clinical trial site before each trial may be initiated;
- performance of adequate and well-controlled human clinical trials in accordance with Good Clinical Practice (“GCP”) requirements to establish the safety and efficacy of the proposed drug product for each indication;
- submission to the FDA of an NDA , after completion of all pivotal trials;
- payment of user fees associated with an NDA;
- satisfactory completion of the product application by an FDA advisory committee review, where appropriate and if applicable;
- a determination by the FDA within 60 days of the receipt of an NDA to file the NDA for review;
- satisfactory completion of an FDA inspection of the manufacturing facility or facilities at which the product is produced to assess compliance with cGMP requirements, and to assure that the facilities, methods, and controls are adequate to preserve the drug’s identity, strength, quality, and purity, and of selected clinical investigation sites to assess compliance with GCPs;
- potential FDA audit of the preclinical and/or clinical trial sites that generated the data in support of the NDA;

- FDA review and approval of the NDA, including consideration of the views of any FDA advisory committee, prior to commercial marketing or sale of the drug in the United States; and
- compliance with any post-approval requirements, including the potential requirement to implement a Risk Evaluation and Mitigation Strategy (“REMS”) or to conduct a post-approval study.

### ***Preclinical Studies***

Preclinical studies are required for submission of an IND and include laboratory evaluation of product chemistry, toxicology, PK, pharmacology, pharmacodynamics, and formulation, as well as animal studies to assess potential safety and efficacy. Prior to beginning the first clinical trial with a drug candidate in the United States, an IND must be submitted to the FDA. An IND is a request by a clinical study sponsor for authorization from the FDA to administer an investigational new drug product to humans. The central focus of an IND submission is on the general investigational plan and the protocol(s) for clinical trials. An IND sponsor must submit the results of the preclinical tests, together with manufacturing information, analytical data, and any available clinical data or literature, among other things, to the FDA as part of an IND. Some preclinical testing may continue even after the IND is submitted. An IND automatically becomes effective 30 days after receipt by the FDA, unless before that time the FDA raises concerns or questions related to one or more proposed clinical trials and places the clinical trial on a clinical hold. In such a case, the IND sponsor and the FDA must resolve any outstanding concerns before the clinical trial can begin. A clinical hold is an order issued by the FDA to the sponsor to delay a proposed clinical investigation or to suspend an ongoing investigation. A partial clinical hold is a delay or suspension of only part of the clinical work requested under the IND. For example, a specific protocol or part of a protocol is not allowed to proceed, while other protocols may do so. Clinical holds also may be imposed by the FDA at any time before or during clinical trials due to safety concerns about ongoing or proposed clinical trials or noncompliance with specific FDA requirements, and the trials may not begin or continue until the FDA notifies the sponsor that the hold has been lifted. As a result, submission of an IND may not result in the FDA allowing clinical trials to commence.

### ***Clinical Trials***

Clinical trials involve the administration of the investigational new drug to human subjects under the supervision of qualified investigators in accordance with GCP requirements, which include the requirement that all research subjects provide their informed consent for their participation in the clinical trial. Clinical trials are conducted under protocols detailing, among other things, the objectives of the trial, the parameters to be used in monitoring safety, and the effectiveness criteria to be evaluated. A protocol for each clinical trial and any subsequent protocol amendments must be submitted to the FDA as part of the IND. In addition, an IRB at each site participating in the clinical trial must review and approve the plan for any clinical trial and the informed consent form before it commences at that site and must monitor the trial until completed.

An IRB is charged with protecting the welfare and rights of trial participants and assesses issues such as whether the risks to individuals participating in the clinical trials are minimized and are reasonable in relation to anticipated benefits. Information about certain clinical trials must be submitted within specific time frames to the National Institutes of Health for public dissemination on their [www.clinicaltrials.gov](http://www.clinicaltrials.gov) website.

Human clinical trials are typically conducted in three sequential phases, which may overlap or be combined:

- **Phase 1:** The drug is initially introduced into healthy human subjects or patients with the target disease or condition and tested for safety, dosage tolerance, absorption, metabolism and distribution of the investigational product in humans, the side effects associated with increasing doses and, if possible, to gain early evidence of its effectiveness. In the case of some products for severe or life-threatening diseases, especially when the product may be too inherently toxic to ethically administer to healthy volunteers, the initial human testing is often conducted in patients with the indicated disease.
- **Phase 2:** The drug is administered to a limited patient population to preliminarily evaluate the efficacy of the product for specific targeted diseases, and to determine dosage tolerance and optimal dosage and to identify possible adverse effects and safety risks. Multiple Phase 2 clinical trials may be conducted to obtain information prior to beginning larger and more expensive Phase 3 clinical trials.
- **Phase 3:** The drug is administered to an expanded patient population, generally at geographically dispersed clinical trial sites, in well-controlled clinical trials to generate enough data to statistically evaluate the efficacy and safety of the product for approval, to establish the overall risk-benefit profile of the product, to provide an adequate basis for product approval, and to further test for safety. Generally, two adequate and well-controlled Phase 3 clinical trials are required by the FDA for approval of an NDA.

Post-approval trials, sometimes referred to as Phase 4 studies, may be conducted after initial marketing approval. These trials are used to gain additional information on the safety, efficacy, or optimal use of the treatment of patients in the approved indication. In certain instances, such as with accelerated approval drugs, the FDA may mandate the performance of Phase 4 trials as a condition of approval of an NDA.

Regulatory authorities, the IRB or the sponsor may suspend a clinical trial at any time on various grounds, including a finding that the research subjects or patients are being exposed to an unacceptable health risk or that the trial is unlikely to meet its stated objectives. Similarly, an IRB can suspend or terminate approval of a clinical trial at its institution if the clinical trial is not being conducted in accordance with the IRB's requirements or if the drug has been associated with unexpected serious harm to patients. In addition, some clinical trials are overseen by an independent group of qualified experts organized by the sponsor, known as a data safety monitoring board or committee. Depending on its charter, this group may determine whether a trial may move forward at designated check points based on certain data from the trial and may halt the clinical trial if it determines that there is an unacceptable safety risk for subjects or other grounds, such as no demonstration of efficacy.

Concurrent with clinical trials, companies usually complete additional animal studies, and must also develop additional information about the chemistry and physical characteristics of the drug and finalize a process for manufacturing the product in commercial quantities in accordance with cGMP requirements. The manufacturing process must be capable of consistently producing quality batches of the drug candidate, and, among other things, the manufacturer must develop methods for testing the identity, strength, quality, and purity of the final drug. In addition, appropriate packaging must be selected and tested, and stability studies must be conducted to demonstrate that the drug candidate does not undergo unacceptable deterioration over its shelf life.

Progress reports detailing the results of the clinical trials and nonclinical studies must be submitted to the FDA at least annually. Written IND safety reports must be submitted to the FDA and the investigators within fifteen days after the trial sponsor determines the information qualifies for reporting for serious and unexpected suspected adverse events, findings from other studies or animal or *in vitro* testing that suggest a significant risk for human volunteers exposed to the product and any clinically important increase in the rate of a serious suspected adverse reaction over that listed in the protocol or investigator brochure. The sponsor must also notify the FDA of any unexpected fatal or life-threatening suspected adverse reaction as soon as possible but in no case later than seven calendar days after the sponsor's initial receipt of the information. Phase 1, Phase 2 and Phase 3 clinical trials may not be completed successfully within any specified period, or at all. There are also requirements governing the reporting of ongoing clinical trials and completed trial results to public registries.

A sponsor may choose, but is not required, to conduct a foreign clinical study under an IND. When a foreign clinical study is conducted under an IND, all IND requirements must be met unless waived. When the foreign clinical study is not conducted under an IND, the sponsor must ensure that the study complies with certain FDA regulatory requirements in order to use the study as support for an IND or application for marketing approval. Specifically, FDA has promulgated regulations governing the acceptance of foreign clinical trials not conducted under an IND, establishing that such studies will be accepted as support for an IND or application for marketing approval if the study was conducted in accordance with GCP, including review and approval by an ethics committee, and use of proper procedures for obtaining informed consent from subjects, and the FDA is able to validate the data from the study through an on-site inspection if FDA deems such inspection necessary. The GCP requirements encompass both ethical and data integrity standards for clinical studies. The FDA's regulations are intended to help ensure the protection of human subjects enrolled in non-IND foreign clinical trials, as well as the quality and integrity of the resulting data. They further help ensure that non-IND foreign studies are conducted in a manner comparable to that required for IND studies. If a marketing application is based solely on foreign clinical data, the FDA requires that the foreign data be applicable to the U.S. population and U.S. medical practice; the studies must have been performed by clinical investigators of recognized competence; and the FDA must be able to validate the data through an on-site inspection or other appropriate means, if the FDA deems such an inspection to be necessary.

### ***Marketing Approval***

Assuming successful completion of the required clinical testing, the results of the preclinical studies and clinical trials, together with detailed information relating to the product's chemistry, manufacture, controls, and proposed labeling, among other things, are submitted to the FDA as part of an NDA requesting approval to market the product for one or more indications. Data may 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 and effectiveness of the investigational drug product to the satisfaction of the FDA. In most cases, the submission of an NDA is subject to a substantial application user fee; a waiver or reduction of such fees may be obtained under certain limited circumstances.

Under the Prescription Drug User Fee Act (“PDUFA”) guidelines that are currently in effect, the FDA has a goal of ten months from the date of “filing” of a standard NDA for a new molecular entity to review and act on the submission. The FDA has approximately two months to make a “filing” decision. Specifically, the FDA conducts a preliminary review of all NDAs within the first 60 days after submission, before accepting them for filing, to determine whether they are sufficiently complete to permit substantive review. The FDA may request additional information rather than accept an NDA 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 reviews an NDA to determine, among other things, whether the drug is safe and effective and whether the facility in which it is manufactured, processed, packaged, or held meets standards designed to assure the product’s continued safety, quality, and purity.

The FDA also may require submission of a REMS plan to ensure that the benefits of the drug outweigh its risks. The REMS plan could include medication guides, physician communication plans, assessment plans, and/or elements to assure safe use, such as restricted distribution methods, patient registries or other risk minimization tools.

The FDA may refer an application for a novel drug to an advisory committee. 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.

Before approving an NDA, the FDA typically will inspect the facility or facilities where the product is manufactured. 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 an NDA, the FDA may inspect one or more clinical trial sites to assure compliance with GCP requirements.

After evaluating the NDA and all related information, including the advisory committee recommendation, if any, and inspection reports regarding the manufacturing facilities and clinical trial sites, the FDA may issue an approval letter, or, in some cases, a complete response letter. A complete response letter generally contains a statement of specific conditions that must be met in order to secure final approval of the NDA and may require additional clinical or preclinical testing in order for the FDA to reconsider the application.

Even with submission of this additional information, the FDA ultimately may decide that the application does not satisfy the regulatory criteria for approval. If and when those conditions have been met to the FDA’s satisfaction, the FDA will typically issue an approval letter. An approval letter authorizes commercial marketing of the drug with specific prescribing information for specific indications.

Even if the FDA approves a product, it may limit the approved indications for use of 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 a drug’s safety after approval, require testing and surveillance programs to monitor the product after commercialization, or impose other conditions, including distribution and use restrictions or other risk management mechanisms under a REMS plan, 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. After approval, some types of changes to the approved product, such as adding new indications, manufacturing changes, and additional labeling claims, are subject to further testing requirements and FDA review and approval.

The Pediatric Research Equity Act, as amended (“PREA”), requires a sponsor to conduct pediatric clinical trials for most drugs, and specifically, for most NDAs or NDA supplements for a new active ingredient, new indication, new dosage form, new dosing regimen or new route of administration. Under PREA, original NDAs and supplements must contain a pediatric assessment unless the sponsor has received a deferral or waiver. The required assessment must evaluate the safety and effectiveness of the product for the claimed indications in all relevant pediatric subpopulations and support dosing and administration for each pediatric subpopulation for which the product is safe and effective. The sponsor or the FDA may request a deferral or full or partial waiver of pediatric clinical trials for some or all of the pediatric subpopulations. A deferral may be granted for several reasons, including a finding that the drug is ready for approval for use in adults before pediatric clinical trials are complete or that additional safety or effectiveness data needs to be collected before the pediatric clinical trials begin.

The FDA will send a noncompliance letter to any sponsor that fails to submit the required assessment, keep a deferral current, or fails to submit a request for approval of a pediatric formulation.



## ***Orphan Drug Designation and Exclusivity***

Under the Orphan Drug Act, the FDA may grant orphan designation to a drug intended to treat a rare disease or condition, which is a disease or condition that affects fewer than 200,000 individuals in the United States, or one that affects more than 200,000 individuals in the United States but for which there is no reasonable expectation that the cost of developing and making a drug available in the United States for this type of disease or condition will be recovered from sales of the product. Orphan designation must be requested before submitting an NDA. After the FDA grants orphan product designation, the identity of the therapeutic agent and its potential orphan use are disclosed publicly by the FDA. Orphan designation does not convey any advantage in or shorten the duration of the regulatory review and approval process.

If a product that has orphan drug designation subsequently receives the first FDA approval for a particular active ingredient for the disease or condition for which it has such designation, the product is entitled to orphan product exclusivity, which means that the FDA may not approve any other applications to market the same drug for the same indication for seven years, except in limited circumstances, such as a showing of clinical superiority to the product with orphan product exclusivity or if the FDA finds that the holder of the orphan product exclusivity has not shown that it can assure the availability of sufficient quantities of the orphan drug to meet the needs of patients with the disease or condition for which the drug was designated. Orphan product exclusivity does not prevent the FDA from approving a different product for the same disease or condition, or the same product for a different disease or condition. Orphan designation also allows for potential financial incentives such as opportunities for grant funding towards clinical trial costs, tax advantages, and user fee waivers.

Orphan exclusivity also could block the approval of one of our products for seven years if a competitor obtains approval of the same drug as defined by the FDA or if our drug candidate is determined to be contained within the competitor's product for the same indication or disease, and we are unable to demonstrate that our product is clinically superior to the competitor product. A designated orphan drug may not receive orphan exclusivity if it is approved for a use that is broader than the indication for which it received orphan designation. In addition, exclusive marketing rights in the United States may be lost if the FDA later determines that the request for designation was materially defective, if the second applicant demonstrates that its product is clinically superior to the approved product with orphan exclusivity or the manufacturer of the approved product is unable to assure sufficient quantities of the product to meet the needs of patients with the rare disease or condition.

## ***FDA-Expedited Development and Review Programs***

The FDA has various programs, including fast track designation, accelerated approval, priority review, and breakthrough therapy designation, which are intended to expedite and facilitate the process for the development and the FDA review of drugs that are intended for the treatment of serious or life-threatening diseases or conditions and demonstrate the potential to address unmet medical needs, and to provide patients with access to the drugs more quickly than standard FDA review timelines typically permit.

To be eligible for a fast track designation, the FDA must determine, based on the request of a sponsor, that a product is intended to treat a serious or life-threatening disease or condition and preclinical or clinical data demonstrates the potential to address an unmet medical need. The FDA will determine that a product will fill an unmet medical need if it will provide a therapy where none exists or provide a therapy that may be potentially superior to existing therapy based on efficacy, or safety or other factors. Fast track designation provides increased opportunities for sponsor interactions with the FDA during preclinical and clinical development. The FDA may also review sections of the NDA for a fast track product on a rolling basis before the complete application is submitted, if the sponsor provides a schedule for the submission of the sections of the NDA, the FDA agrees to accept those sections of the NDA and determines that the schedule is acceptable, and the sponsor pays any required user fees upon submission of the first section of the NDA. If the FDA accepts a portion of an application, this does not necessarily mean that review will commence or proceed before the complete application is submitted. Actual commencement and scheduling of review depends on many factors, including staffing, workload, competing priorities, timeline for completing the application, and the perceived efficiency of commencing review before receipt of the complete submission.

The FDA may give a priority review designation to drugs that, if approved, would provide a significant improvement in safety or effectiveness in the treatment, diagnosis or prevention of a serious disease or condition. A priority review means that the goal for the FDA to review an application is six months, rather than the standard review of 10 months under current PDUFA guidelines. These six-and 10-month review periods are measured from the "filing" date rather than the receipt date for NDAs for new molecular entities, which typically adds approximately two months to the

timeline for review and decision from the date of submission. Products that are eligible for fast track designation may also be eligible for priority review.

In addition, products studied for their safety and effectiveness in treating serious or life-threatening illnesses and that fulfill an unmet medical need may be eligible for accelerated approval. Such products therefore may be approved on the basis of adequate and well-controlled clinical trials establishing that the drug product has an effect on a surrogate endpoint that is reasonably likely to predict clinical benefit, or on a clinical endpoint that can be measured earlier than irreversible morbidity or mortality, that is reasonably likely to predict an effect on irreversible morbidity or mortality or other clinical benefit, taking into account the severity, rarity, or prevalence of the condition and the availability or lack of alternative treatments. As a condition of approval, the FDA may require a sponsor of a drug receiving accelerated approval to perform post-marketing confirmatory studies to verify and describe the predicted effect on irreversible morbidity or mortality or other clinical endpoint, and the drug may be subject to accelerated withdrawal of approval procedures. The FDA may withdraw accelerated approval if, among other things, the confirmatory study fails to verify clinical benefit; the applicant fails to perform required confirmatory studies with due diligence; post-marketing use demonstrates that post-marketing restrictions are inadequate to assure safe use; the applicant fails to adhere to agreed-upon post-marketing restrictions; promotional materials are false or misleading; or, other evidence demonstrates that the product is not shown to be safe or effective under its conditions of use. Additionally, under the Food and Drug Omnibus Reform Act of 2022 (“FDORA”), the FDA is now permitted to require, as appropriate, that such trials be underway prior to approval or within a specific time period after the date of approval for a product granted accelerated approval. Under FDORA, the FDA has increased authority for expedited procedures to withdraw approval of a drug or an indication approved if, for example, the confirmatory trial fails to verify the predicted clinical benefit of the product. In addition, the FDA currently requires pre-approval of promotional materials as a condition for accelerated approval, which could adversely impact the timing of the commercial launch of the product. Drugs granted accelerated approval must meet the same statutory standards for safety and effectiveness as those granted traditional approval.

Sponsors can also request designation of a drug candidate as a “breakthrough therapy.” A breakthrough therapy is defined as a drug that is intended, alone or in combination with one or more other drugs, to treat a serious or life-threatening disease or condition, and preliminary clinical evidence indicates that the drug may demonstrate substantial improvement over existing therapies on one or more clinically significant endpoints, such as substantial treatment effects observed early in clinical development. A drug that receives breakthrough therapy designation is eligible for certain FDA actions as appropriate, such as holding timely meetings and providing advice, intended to expedite the development and review of an application for approval of a breakthrough therapy. The designation includes all the benefits of a fast track designation in addition to intensive guidance on an efficient drug development program beginning as early as Phase 1, and FDA organizational commitment to expedited development, including involvement of senior managers and experienced review staff in a cross-disciplinary review, where appropriate. The breakthrough therapy designation is a distinct status from both accelerated approval and priority review, which can also be granted to the same drug if relevant criteria are met.

Even if a product qualifies for one or more of these programs, the FDA may later decide that the product no longer meets the conditions for qualification or decide that the time period for FDA review or approval will not be shortened. Furthermore, fast track designation, accelerated approval, priority review, and breakthrough therapy designation do not change the standards for approval but may expedite the development or review process. We may explore some of these opportunities for our drug candidates as appropriate.

### ***Post-Approval Requirements***

Drugs 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 program fee requirements for certain eligible products.

The FDA may impose a number of post-approval requirements as a condition of approval of an NDA. For example, the FDA may require post-marketing testing, including Phase 4 clinical trials, and surveillance to further assess and monitor the product’s safety and effectiveness after commercialization. Discovery of previously unknown problems with a product or the failure to comply with applicable FDA requirements can have negative consequences, including adverse publicity, judicial or administrative enforcement, warning letters from the FDA, mandated corrective advertising or communications with doctors, and civil or criminal penalties, among others. Newly discovered or developed safety or effectiveness data may require changes to a product’s approved labeling, including the addition of new warnings and contraindications, and also may require the implementation of other risk management measures.

In addition, drug manufacturers and other entities involved in the manufacture and distribution of approved drugs are required to register their establishments with the FDA and state and local agencies and are subject to periodic unannounced inspections by government agencies for compliance with cGMP and other 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 requirements and impose reporting and documentation requirements upon the sponsor and any third-party manufacturers that the sponsor may decide to use. Accordingly, manufacturers must continue to expend time, money, and effort in the area of production and quality control to maintain cGMP compliance.

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 mandatory 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, complete withdrawal of the product from the market or product recalls;
- safety alerts, Dear Healthcare Provider letters, press releases, or other communications containing warning or other safety information about the product;
- fines, warning letters, untitled letters, or holds on clinical trials;
- refusal of the FDA to approve pending NDAs or supplements to approved NDAs, or suspension or revocation of product approvals;
- product seizure or detention, or refusal to permit the import or export of products;
- injunctions or the imposition of civil or criminal penalties;
- consent decrees, corporate integrity agreements, debarment or exclusion from federal healthcare programs; or
- mandated modification of promotional materials and labeling and issuance of corrective information.

The FDA strictly regulates marketing, labeling, advertising, and promotion of products that are placed on the market. Drugs 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, and a company that is found to have improperly promoted off-label uses may be subject to significant liability, including adverse publicity, untitled or warning letters, requirements to conduct corrective advertising and potential civil and criminal penalties. Physicians may prescribe, in their independent professional medical judgment, legally available products for uses that are not described in the product's labeling and that differ from those tested by us and approved by the FDA. Physicians may believe that such off-label uses are the best treatment for many patients in varied circumstances. The FDA does not regulate physicians in their practice of medicine, including their choices of treatments for their patients. The FDA does, however, restrict drug manufacturer's communications on the subject of off-label use of their products. The federal government has levied large civil and criminal fines against companies for alleged improper promotion of off-label use and has enjoined companies from engaging in off-label promotion. The FDA and other regulatory agencies have also required that companies enter into consent decrees or permanent injunctions under which specified promotional conduct is changed or curtailed. However, companies may share certain truthful and non-misleading information that is otherwise consistent with a product's FDA-approved labeling.

In addition, the distribution of prescription pharmaceutical products is subject to the Prescription Drug Marketing Act, as amended ("PDMA"), which regulates the distribution of drugs and drug samples at the federal level and sets minimum standards for the registration and regulation of drug distributors by the states. Both the PDMA and state laws limit the distribution of prescription pharmaceutical product samples and impose requirements to ensure accountability in distribution.

## ***Market Exclusivity***

Market exclusivity provisions under the FDCA can delay the submission or the approval of certain marketing applications. The FDCA provides a five-year period of non-patent marketing exclusivity within the United States to the first applicant to obtain approval of an NDA for a new chemical entity. A drug is a new chemical entity if the FDA has not previously approved any other new drug containing the same active moiety, which is the molecule or ion responsible for the action of the drug substance.

During the exclusivity period, the FDA may not approve or even accept for review an abbreviated new drug application (“ANDA”) or an NDA submitted under Section 505(b)(2) of the FDCA (a 505(b)(2) NDA) submitted by another company for another drug containing the same active moiety, regardless of whether the drug is intended for the same indication as that of the original innovative drug or for another indication. However, such an application may be accepted for review after four years if it contains a certification of patent invalidity or non-infringement to one of the patents listed with the FDA by the innovator NDA holder.

The FDCA alternatively provides three years of market exclusivity for an NDA, or supplement to an existing NDA, if new clinical investigations, other than bioavailability studies, that were conducted or sponsored by the applicant are deemed by the FDA to be essential to the approval of the application. This three-year exclusivity covers only the modification for which the drug received approval based on the new clinical investigations and does not prohibit the FDA from approving ANDAs or 505(b)(2) NDAs for drugs containing the active agent for the original indication or condition of use. Five-year and three-year exclusivity will not delay the submission or approval of a full NDA. However, an applicant submitting a full NDA would be required to conduct or obtain a right of reference to all of the preclinical studies and adequate and well-controlled clinical trials necessary to demonstrate safety and effectiveness.

Pediatric exclusivity is another type of market exclusivity available in the United States. Pediatric exclusivity provides for an additional six months of marketing exclusivity attached to another period of exclusivity if a sponsor conducts clinical trials in children, in response to a Written Request from the FDA. The FDA may only grant pediatric exclusivity if existing patent or exclusivity protections for the drug would otherwise expire at least nine months after the grant of the pediatric exclusivity; FDA has 180 days to make a pediatric exclusivity determination once the NDA sponsor submits study reports required under the written request. The issuance of a written request does not require the sponsor to undertake the described clinical trials.

## ***Other Healthcare Laws and Compliance Requirements***

Pharmaceutical companies are subject to additional healthcare regulation and enforcement by the federal government and by authorities in the state, local, and foreign jurisdictions in which they conduct their business. Such laws include, without limitation, U.S. federal and state anti-kickback, fraud and abuse, false claims, consumer fraud, pricing reporting, data privacy and security, and transparency laws and regulations, as well as similar foreign laws in the jurisdictions outside the United States. Violations of such laws, or any other governmental regulations that apply, may result in penalties, including, without limitation, civil and criminal penalties, damages, fines, additional reporting and oversight obligations, the curtailment or restructuring of operations, exclusion from participation in governmental healthcare programs, and individual imprisonment.

In the event that third-party reimbursement becomes available for our products, we would also become subject to the various federal and state fraud and abuse laws applicable to pharmaceutical companies. Among other things, these laws may impact our arrangements with customers or potential customers, as well as our consulting and other arrangements with healthcare providers and others who purchase, recommend or order our products. The federal Anti-Kickback Statute (“AKS”) is a criminal law that prohibits, among other things, persons and entities (including a prescription drug manufacturer or a party acting on its behalf) from knowingly and willfully offering, paying, soliciting, or receiving remuneration, directly or indirectly, overtly or covertly, in cash or in kind, in return for or to induce or reward the purchase, lease, order, arrangement for, or recommendation of, any item or service that is reimbursable, in whole or in part, under a federal healthcare program, such as Medicare or Medicaid. A person or entity does not need to have actual knowledge of the statute or specific intent to violate it in order to have committed a violation. Violation of the federal AKS can result in significant civil monetary penalties and criminal fines, as well as imprisonment and exclusion from participation in federal healthcare programs. Although there are a number of statutory exemptions and regulatory safe harbors to the federal AKS protecting certain common business arrangements and activities from prosecution or regulatory sanctions, the exemptions and safe harbors are drawn narrowly, and practices that do not fit squarely within an exemption or safe harbor, or for which no exception or safe harbor is available, may be subject to scrutiny.



In addition, the federal civil and criminal false claims laws (including the civil the False Claims Act (“FCA”), for which claims can be brought by private citizens on behalf of the government through qui tam or whistleblower actions), impose liability (including significant penalties and damages) for, among other things, knowingly presenting, or causing to be presented, false or fraudulent claims for payment of federal funds, and knowingly making, using, or causing to be made, a false record or statement material to an obligation to pay money to the federal government, or knowingly concealing or knowingly and improperly avoiding, decreasing or concealing an obligation to pay money to the federal government. Moreover, the government may assert that a claim including items or services resulting from a violation of the federal AKS constitutes a false or fraudulent claim for purposes of the civil FCA. Because of the threat of treble damages and mandatory penalties per false or fraudulent claim or statement under the FCA, healthcare and pharmaceutical companies often resolve allegations without admissions of liability for significant and material amounts. Pharmaceutical and other healthcare companies also are subject to other federal false claim laws, including, among others, federal criminal healthcare fraud and false statement statutes that extend to non-government health benefit programs.

The fraud provisions of the Health Insurance Portability and Accountability Act of 1996, the Health Information Technology for Economic and Clinical Health Act, and their implementing regulations (collectively, HIPAA) impose criminal liability for knowingly and willfully executing a scheme to defraud any healthcare benefit program, including private third-party payors, and prohibit knowingly and willfully falsifying, concealing or covering up a material fact or making any materially false, fictitious or fraudulent statement or representation, or making or using any false writing or document knowing the same to contain any materially false fictitious or fraudulent statement or entry, in connection with the delivery of or payment for healthcare benefits, items or services.

Further, the federal Physician Payments Sunshine Act requires manufacturers with a product subject to reimbursement under certain federal health care programs, among others, to track and report annually certain data on payments and other transfers of value to U.S.-licensed physicians, teaching hospitals, and various other providers, as well as ownership and investment interests held by certain physicians and their immediate family members in the manufacturer. Analogous state laws addressing these topics may also affect our arrangements.

The majority of states also have statutes similar to the federal AKS and civil FCA that apply to items and services reimbursed under Medicaid and other state health care programs, or in several states, regardless of the payor.

State laws also may require pharmaceutical companies to comply with the pharmaceutical industry’s voluntary compliance guidelines and the relevant compliance guidance promulgated by the federal government, as well as require the registration of pharmaceutical sales representatives and the reporting of pricing information and marketing expenditures.

## **Coverage and Reimbursement**

Sales of any pharmaceutical product depend, in part, on the extent to which such product will be covered by third-party payors, such as federal, state, and foreign government healthcare programs, commercial insurance and managed healthcare organizations, and the level of reimbursement for such product by third-party payors. Significant uncertainty exists as to the coverage and reimbursement status of any newly approved product. Decisions regarding the extent of coverage and amount of reimbursement to be provided are made on a plan-by-plan basis. One third-party payor’s decision to cover a product does not ensure that other payors will also provide coverage for the product. As a result, the coverage determination process can require manufacturers to provide scientific and clinical support for the use of a product to each payor separately, and can be a time-consuming process, with no assurance that coverage and adequate reimbursement will be applied consistently or obtained in the first instance. Payor reimbursement typically is different based on the type and setting for administration. Using Medicare as an example, therapies administered in the physician office usually are reimbursed under Medicare Part B and are billed to Medicare by the physician practice purchasing the product. Conversely, products taken by the patient orally at home usually are reimbursed under Medicare Part D and are billed to the program by the pharmacy dispensing the product. For products administered under the supervision of a physician in a physician office setting, obtaining coverage and adequate reimbursement may be particularly difficult because of the higher prices often associated with such drugs. If Medicare reimbursement is available for such products, it is based on the average sales price for the product plus a certain percentage. Additionally, separate reimbursement for the product itself or the treatment or procedure in which the product is used may not be available, which may impact physician utilization.

In addition, third-party payors are increasingly reducing reimbursements for pharmaceutical products and services. The U.S. government and state legislatures have continued implementing cost-containment programs, including price controls, restrictions on coverage and reimbursement, and requirements for substitution of generic products. Third-party payors are increasingly challenging the prices charged, examining the medical necessity, and reviewing the cost effectiveness of pharmaceutical products, in addition to questioning their safety and efficacy. Increasingly, third-party payors are requiring that drug companies provide them with predetermined discounts from list prices and are challenging



the prices charged for medical products. Further, such payors are increasingly challenging the price, examining the medical necessity and reviewing the cost effectiveness of medical drug candidates. Adoption of price controls and cost-containment measures, and adoption of more restrictive policies in jurisdictions with existing controls and measures, could further limit or delay sales of any product. Decreases in third-party reimbursement for any product or a decision by a third-party payor not to cover a product could reduce physician usage and patient demand for the product.

In international markets, reimbursement and healthcare payment systems vary significantly by country, and many countries have instituted price ceilings on specific products and therapies. For example, the European Union (“EU”) 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. A member state may approve a specific price for the medicinal product, 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. Pharmaceutical products may face competition from lower-priced products in foreign countries that have placed price controls on pharmaceutical products and may also compete with imported foreign products. Furthermore, there is no assurance that a product will be considered medically reasonable and necessary for a specific indication, will be considered cost-effective by third-party payors, that an adequate level of reimbursement will be established even if coverage is available, or that the third-party payors’ reimbursement policies will not adversely affect the ability of manufacturers to sell products profitably.

## **Healthcare Reform**

In the United States and certain foreign jurisdictions, there have been, and we expect there will continue to be, a number of legislative and regulatory changes to the healthcare system that affect the pharmaceutical industry. In March 2010, ACA was signed into law; it substantially changed the way healthcare is financed by both governmental and private payers in the United States. The ACA contains a number of provisions of particular import to the pharmaceutical industry, including those governing enrollment in federal healthcare programs, reimbursement adjustments, and fraud and abuse changes. For example, the ACA requires collection of Medicaid rebates paid for covered outpatient drugs paid by Medicaid managed care organizations; imposes a nondeductible annual fee on pharmaceutical manufacturers or importers who sell “branded prescription drugs” to specified federal government programs; and requires a distinct calculation of rebates owed by manufacturers under the Medicaid Drug Rebate Program for covered outpatient drugs that are inhaled, infused, instilled, implanted, or injected.

The ACA and its implementation continue to evolve as a result of legislative, administrative, and judicial developments. We expect to continue to see changes involving the ACA which may potentially impact pricing, coverage, or reimbursement of our products.

In addition to the ACA, U.S. governments continue to seek to adopt healthcare policies and reforms intended to curb healthcare costs, such as federal or state controls on payment for drugs (including under Medicare, Medicaid, and commercial health plans). For example, the IRA, among other things, requires the U.S. Secretary of Health and Human Services to negotiate, with respect to Medicare units and subject to a specified cap, the price of a set number of certain high Medicare spend drugs and biologicals per year, with negotiated prices set to begin taking effect in 2026. The IRA also makes several changes to the Medicare Part D benefit, including an updated limit on annual out-of-pocket costs, a change in manufacturer liability under the program which could negatively affect our business and financial condition, and sunset of the existing coverage gap and coverage gap discount program. The IRA also establishes a Medicare Part B and Part D inflation rebate scheme, under which manufacturers will owe rebates if, generally speaking, the average sales price of a Part B drug, or the annualized average manufacturer price of a Part D drug, increases faster than the pace of inflation.

## **Government Price Reporting**

Furthermore, a number of government pricing programs create certain price reporting obligations. Under the Medicaid Drug Rebate program, a participating manufacturer is required to pay a rebate to each state Medicaid program for its covered outpatient drugs that are dispensed to Medicaid beneficiaries and paid for by the state Medicaid program as a condition of having federal funds being made available for drugs under Medicaid and Medicare Part B. Those rebates are based on pricing data reported by the manufacturer on a monthly and quarterly basis to CMS.

Federal law requires that a manufacturer also participate in the 340B Drug Pricing program in order for federal funds to be available for the manufacturer’s drugs under Medicaid and Medicare Part B. The 340B program requires participating manufacturers to agree to charge no more than the 340B “ceiling price” for the manufacturer’s covered outpatient drugs to a specified “covered entities,” including community health centers and other entities that receive certain federal grants, as well as hospitals that serve a certain disproportionate share of low-income patients, among other

requirements. The 340B ceiling price is calculated based on the information reported under the Medicaid Drug Rebate program.

Also under federal law, manufacturers must report to CMS, on a quarterly basis, average sales price information for certain categories of drugs that are paid under the Medicare Part B program. Manufacturers calculate average sales price based on a statutorily defined formula as well as regulations and guidance. CMS may use the reported information to determine payment rates for drugs under Medicare Part B.

In addition, starting in 2023, manufacturers must pay refunds to Medicare for single source drugs or biologicals, or biosimilar biological products, reimbursed under Medicare Part B and packaged in single-dose containers or single-use packages for units of discarded drug reimbursed by Medicare Part B in excess of 10 percent of total allowed charges under Medicare Part B for that drug. A failure to pay refunds for discarded drugs under the discarded drug refund program could be subject us to civil monetary penalties of 125 percent of the refund amount.

Finally, in order to be eligible to have its products paid for with federal funds under the Medicaid and Medicare Part B programs and purchased by the Big Four agencies and certain federal grantees, a manufacturer is required to participate in the VA FSS pricing program, established under Section 603 of the Veterans Health Care Act of 1992. Under this program, the manufacturer is obligated to make its covered drugs available for procurement on an FSS contract and charge a price to the Big Four agencies that is no higher than the FCP, which is a price calculated pursuant to a statutory formula. The FCP is derived from the Non-FAMP, which the manufacturer calculates and reports to the VA on a quarterly and annual basis. Pursuant to applicable law, knowing provision of false information in connection with a Non-FAMP filing can subject a manufacturer to significant penalties for each item of false information. The FSS contract also contains extensive disclosure and certification requirements. Under Section 703 of the National Defense Authorization Act for FY 2008, the manufacturer is required to pay quarterly rebates to DoD on utilization of its innovator products that are dispensed through DoD's Tricare network pharmacies to Tricare beneficiaries. The rebates are calculated as the difference between the annual Non-FAMP and FCP for the calendar year that the product was dispensed.

## **Foreign Regulations**

In addition to regulations in the United States, we will be subject to a variety of foreign regulations governing clinical trials and commercial sales and distribution of our products. Whether or not we obtain FDA approval for a product, we must obtain approval by the comparable regulatory authorities of foreign countries before we can commence clinical trials, and approval of foreign countries or economic areas, such as the EU and the UK, before we may market products in those countries or areas. The approval process and requirements governing the conduct of clinical trials, product licensing, pricing, and reimbursement vary greatly from place to place, and the time may be longer or shorter than that required for FDA approval. Other foreign regulators such as the European Medicines Agency in the EU and the MHRA in the UK require compliance with GCPs for conducting, recording and reporting the results of clinical trials to assure that data and reported results are credible and accurate and that the rights, integrity and confidentiality of trial participants are protected. In terms of product licensing, the EU has its own European wide procedure for the authorization of eligible medicines, referred to as the centralized procedure where there is a single application, a single evaluation and a single authorization throughout the EU. This centralized procedure also covers Northern Ireland. A separate product licensing procedure applies in Great Britain (including England, Scotland and Wales) ("GB"). From January 1, 2024, eligible GB marketing authorization applications can benefit from a new International Recognition Procedure that will allow the MHRA to conduct targeted assessments by recognizing approvals from trusted reference regulatory agencies in Australia, Canada, the EU, Japan, Singapore, Switzerland and the US.

Within the EU and the UK, regulatory protections are afforded to medicinal products such as data exclusivity. On April 26, 2023, the European Commission adopted a proposal for a new Directive and a new Regulation. In April 2024, the European Parliament published their amendments to the Commission proposal. If made into law, this proposal will revise and replace the existing general pharmaceutical legislation and will affect the existing period of regulatory protection afforded to medicinal products in the EU and Northern Ireland. The legislative process for this reform is expected to take several years, and adoption of the new legislation is not expected to take place before 2026.

## **Data Privacy and Security Laws**

We receive, transmit and store personal data. Numerous federal, state and international laws address privacy, data protection and the collection, storing, sharing, use, disclosure and protection of personal data and other user data. The legislative and regulatory landscape for privacy and data protection continues to evolve, and there has been an increasing focus on privacy and data protection issues which may affect our business. For example, in California, the California Consumer Privacy Act ("CCPA"), as amended by the California Privacy Rights Act ("CPRA"), establishes certain

requirements for data use and sharing transparency and provides California consumers (as defined in the law) certain rights concerning the use, disclosure, and retention of their personal data, with certain exceptions including for clinical trial data and data subject to HIPAA. Such rights include the right to opt out of certain sales of personal information. The CCPA also prohibits covered businesses from discriminating against consumers (e.g., charging more for services) for exercising any of their CCPA rights. The CCPA provides for potentially severe statutory penalties, and a private right of action for data breaches involving certain types of personal information. The CPRA, approved by a November 2020 ballot initiative, introduced significant amendments to the CCPA and established and funded a dedicated California privacy regulator, the California Privacy Protection Agency (“CPPA”). The amendments introduced by the CPRA went into effect on January 1, 2023, and new implementing regulations continue to be introduced by the CPPA. Failure to comply with the CCPA may result in, among other things, significant civil penalties, and injunctive relief, or statutory or actual damages. Similarly, there are legislative proposals in the EU, the United States, at both the federal and state level, as well as other jurisdictions that could impose new obligations or limitations. For example, other states, including Virginia, Colorado, Utah, and Connecticut have enacted privacy laws similar to the CCPA. Moreover, other states such as Washington and Nevada have passed health privacy specific legislation. While we do not believe we are currently subject to the CCPA, we or our business partners may be subject to similar privacy legislations, and we continue to assess the impact of privacy legislation and regulatory developments on our business as additional information and guidance becomes available. The legislative and regulatory landscape for privacy and data protection continues to evolve, and there has been an increasing focus on privacy and data protection issues which may affect our business. Failure to comply with these laws and regulations could result in government enforcement actions and create liability for us (including the imposition of significant civil and/or criminal penalties), private litigation and/or adverse publicity that could negatively affect our business.

Additionally, HIPAA imposes privacy and security obligations on covered entity health care providers, health plans, and health care clearinghouses, as well as their “business associates” – certain persons or entities that create, receive, maintain, or transmit protected health information in connection with providing a specified service or performing a function on behalf of a covered entity. The U.S. Department of Health and Human Services (“HHS”) (through the Office for Civil Rights) as well as state Attorneys General have direct enforcement authority over covered entities and business associates with regard to compliance with HIPAA regulations. We may obtain health information from third parties that are subject to privacy and security requirements under HIPAA. Although we may not directly be subject to HIPAA, we could potentially be subject to criminal penalties if we, our affiliates, or our agents knowingly obtain individually identifiable health information maintained by a HIPAA-covered entity in a manner that is not authorized or permitted by HIPAA.

The Federal Trade Commission (“FTC”) also sets expectations for taking appropriate steps to safeguard consumers' personal information, and providing a level of privacy or security commensurate to promises made to individuals. The FTC expects a company's data privacy and security measures to be reasonable and appropriate in light of the sensitivity and volume of consumer information it holds, the size and complexity of its business, and the cost of available tools to improve security and reduce vulnerabilities. Failure to meet these standards may constitute unfair or deceptive acts or practices in violation of Section 5 of the FTC Act. The FTC also has the power to enforce the Health Breach Notification Rule, which imposes notification obligations on companies for breaches of certain health information contained in personal health records. Enforcement by the FTC under the FTC Act and Health Breach Notification Rule can result in civil penalties or enforcement actions.

Additionally, to the extent we extend clinical trial or other activity into other jurisdictions, we may be subject to international data protection laws. EU member states, the United Kingdom, Switzerland and other jurisdictions have also adopted data protection laws and regulations, which impose significant compliance obligations. In the EEA and the United Kingdom, the collection and use of personal data, including clinical trial data, is governed by the provisions of the General Data Protection Regulation including the local implementation legislation in EU Members States and the UK (collectively, “GDPR”). The GDPR places obligations and restrictions on the ability to collect, analyze, use and transfer personal data, including health data from clinical trials. For example these obligations and restrictions include ensuring the lawfulness of processing personal data (including obtaining valid consent of the individuals to whom the personal data relates, where applicable), disclosing information on processing details to the individuals, ensuring and documenting the adequacy, relevance and necessity of the personal data collected, ensuring that personal data is deleted or anonymized after they are no longer needed for the purposes for which they are collected, ensuring that personal data are adequately protected, ensuring that security incidents are detected, handled and reported to individuals and competent authorities where required, and allowing individuals to exercise their privacy rights. . Other obligations relate to the sharing of personal data with third parties, including the transfer of personal data out of the EEA or the United Kingdom to third countries including the US. Enforcement by EEA and UK regulators is generally active, and failure to comply with the GDPR or applicable member state/UK local law may result in, amongst others, warnings, orders for compliance and/or significant fines (including possible fines of up to 4% of global annual turnover for the preceding financial year or €20 million (whichever is higher). The GDPR also confers a private right of action on data subjects and consumer associations to lodge complaints with data protection authorities, seek judicial remedies, and obtain compensation for damages resulting from violations of the GDPR.

Further, the UK Government may amend/update UK data protection law, which may result in changes to our business operations and potentially incur commercial cost. Guidance on implementation and compliance practices are often updated, or otherwise revised.

These privacy and data protection laws and regulations increase our responsibility and liability in relation to personal data that we process and compliance has been and is expected to continue to be difficult, constantly evolving, costly and time consuming. Compliance requires a flexible privacy framework and substantial resources. We may be required to expend significant capital and other resources to ensure ongoing compliance with applicable privacy and data protection laws, to protect against security incidents, or to alleviate issues caused by such incidents. Compliance efforts will likely be an increasing and substantial cost in the future.

## **Corporate Information**

We were incorporated in the state of Delaware in 2009 as Versense Pharmaceuticals, Inc. (“Versense”). Versense changed its corporate name to Inception 3, Inc. (“Inception”), in October 2011, and commenced active operations in July 2012. In May 2018, Inception changed its corporate name to Sirocco Therapeutics, Inc. (“legacy Sirocco”). A separate entity named Pipeline Therapeutics, Inc. (“legacy Pipeline”) was founded and incorporated in the state of Delaware in May 2017. On May 7, 2019, legacy Sirocco acquired legacy Pipeline in a merger transaction. In January 2020, legacy Pipeline was merged into legacy Sirocco and ceased to exist; and legacy Sirocco changed its name to Pipeline Therapeutics, Inc. In November 2023, Pipeline Therapeutics, Inc. changed its name to Contineum Therapeutics, Inc. Our principal executive offices are located at 3565 General Atomics Court, Suite 200, San Diego, California 92121. Our telephone number is (858) 333-5280. Our website address is [www.contineum-tx.com](http://www.contineum-tx.com). Information contained on the website is not incorporated by reference into this report. We have included our website address in this report solely as an inactive textual reference.

## **Employees and Human Capital Resources**

### ***Human Capital***

As of December 31, 2024, we had 41 employees, all of which were full-time employees. Of our full-time employees, 30 are engaged in research and development activities and the remaining employees are engaged in general and administrative activities. Twenty-seven percent of our employees have an M.D. or a Ph.D. From time to time, we also retain independent contractors to support our organization. None of our employees are represented by a labor union or covered by collective bargaining agreements, and we believe our relationship with our employees is good.

### ***Talent Development, Compensation and Retention***

We focus on attracting, retaining, and cultivating talented individuals. The principal purposes of our equity and cash incentive plans are to attract, retain and reward personnel through the granting of stock-based and cash-based compensation awards, in order to increase stockholder value and the success of our company by motivating such individuals to perform to the best of their abilities and achieve our objectives.

Our values-based culture and our employees are a critical component of our success. We strive to create a supportive and professional environment for our employees. We expend considerable management time and attention, and financial resources, to attracting, retaining, and motivating exceptional individuals at our company.

### ***Inclusive Workplace***

We are committed to creating and maintaining a workplace that fosters diversity and an inclusive work environment that supports our workforce. Our management team and employees are also expected to exhibit and promote honest, ethical, and respectful conduct in the workplace. All of our employees must adhere to a code of business conduct and ethics that sets standards for appropriate behavior and are required to attend annual training on the code of business conduct and ethics.

## **Facilities**

Our corporate headquarters is located at 3565 General Atomics Court, San Diego, California, where we lease approximately 24,695 square feet of office and laboratory space. The lease commenced in October 2024 and expires October 2029. We believe that our facilities are sufficient to meet our current operations and that any additional space we may require will be available on commercially reasonable terms.



## Environmental Matters

Our laboratory operations require the use of hazardous materials, which subject us to a variety of federal, state and local environmental and safety laws and regulations. Some of the regulations under the current regulatory structure provide for strict liability, holding a party potentially liable without regard to fault or negligence. We could be held liable for damages and fines as a result of our business operations should contamination of the environment or individual exposure to hazardous substances occur. We cannot predict how changes in laws or development of new regulations will affect our business operations or the cost of compliance.

## Legal Proceedings

We are not currently subject to any legal proceedings. From time to time, we may become involved in legal proceedings arising in the ordinary course of our business. Regardless of outcome, litigation can have an adverse impact on us due to defense and settlement costs, diversion of management resources, negative publicity, reputational harm and other factors.

## Item 1A. Risk Factors.

### RISK FACTORS

*Investing in our common stock is speculative and involves a high degree of risk. Before investing in our common stock, you should consider carefully the risks and uncertainties described below, together with the other information contained in this report, including the section titled “Management’s Discussion and Analysis of Financial Condition and Results of Operations” and our financial statements and the related notes, before investing in our common stock. The risks and uncertainties described below are not the only ones we face. Additional risks and uncertainties not currently known to us or that we currently deem to be immaterial also may materially adversely affect our business, financial condition and/or operating results. If any of the following risks occur, our business, financial condition, results of operations and future growth prospects could be materially and adversely affected. In these circumstances, the market price of our common stock could decline, and you may lose all or part of your investment. This report also contains forward-looking statements that involve risks and uncertainties. Our actual results could differ materially from those anticipated in the forward-looking statements as a result of a number of factors, including the risks described below. See “Special Note Regarding Forward-Looking Statements” elsewhere in this report.*

#### Risks Related to Development, Clinical Testing, and Regulatory Approval

***We are heavily dependent on the success of PIPE-791, our lead drug candidate, and PIPE-307, both of which are in the early stages of clinical development. If these drug candidates do not progress through clinical development, eventually receive regulatory approval or, even if approved, are not successfully commercialized, our business will be materially adversely harmed.***

We currently have no products that are approved for commercial sale and may never be able to develop a marketable product. To date, we have invested a significant portion of our efforts and financial resources on the development of PIPE-791 and PIPE-307. We wholly-own, and are pursuing the clinical development of, PIPE-791 for the treatment of IPF, PrMS and chronic pain associated with two separate indications, OA and LBP. In February 2023, we entered into the J&J License Agreement, pursuant to which we granted J&J an exclusive, worldwide license to develop, manufacture and commercialize PIPE-307 in all indications in exchange for an upfront payment and the right to receive future milestone payments and royalties. We are conducting a Phase 2 clinical trial of PIPE-307 for the potential treatment of RRMS, and in December 2024, J&J began recruiting an estimated 124 adult participants for a Phase 2 trial of PIPE-307/JNJ-89495120 for the potential treatment of MDD. This trial is a randomized, double-blind, multicenter, placebo-controlled, proof-of-concept study to evaluate the efficacy, safety and tolerability of PIPE-307/JNJ-89495120 as monotherapy in adult participants with MDD. After we complete the Phase 2 clinical for PIPE-307 for the potential treatment of RRMS, J&J has sole discretion to determine whether to pursue further development of PIPE-307 for this indication or any other indication. Our future success is, therefore, dependent on our ability to successfully complete clinical development for, obtain regulatory approval for, and successfully commercialize PIPE-791 and on J&J’s efforts to successfully complete clinical development for, obtain regulatory approval for, and successfully commercialize PIPE-307. We cannot be certain that we or J&J, respectively, will be able to successfully complete any of these activities or that, even if PIPE-791 and/or PIPE-307 receive regulatory approval, such products will be able to successfully compete against therapies and technologies offered by other companies.



The research, testing, manufacturing, labeling, approval, sale, packaging, marketing, and distribution of drug products are subject to extensive regulation by the FDA and comparable regulatory authorities in other countries. We are not permitted to market or sell PIPE-791, and J&J will not be permitted to market or sell PIPE-307, in the United States until we or J&J, as applicable, receive approval of a NDA from the FDA for such drug candidate. Further, we are not permitted to market or sell PIPE-791, and J&J will not be permitted to market or sell PIPE-307, in any foreign countries until we or J&J, as applicable, receive the requisite approvals from such countries. Neither we nor J&J have submitted an NDA to the FDA or comparable applications to other regulatory authorities for PIPE-791 or PIPE-307, respectively, in any indication. Neither party will be in a position to do so for several years, if ever. If we are unable to obtain the necessary regulatory approvals for PIPE-791 in any country, we will not be able to commercialize such drug candidate in that country. Similarly, if J&J is unable to obtain the necessary regulatory approvals for PIPE-307 in any country, it will not be able to commercialize such drug candidate in that country. In both cases, our financial position will be materially adversely affected, and we may not be able to generate sufficient revenue to continue our business.

***Clinical drug development is a lengthy, expensive and risky process with uncertain timelines and uncertain outcomes. The results of earlier preclinical studies and clinical trials, including those conducted by third parties, may not be predictive of future results. If clinical trials for the drug candidates we develop do not meet safety or efficacy endpoints or are prolonged or delayed, these drug candidates may not receive the required regulatory approvals, and therefore could not be commercialized on a timely basis or at all. Further, the results of our preclinical studies, clinical trials, or analyses may not be indicative of results that may be obtained in later trials.***

Before obtaining marketing approval from regulatory authorities for the sale of the drug candidates we develop, these drug candidates must undergo extensive clinical trials to demonstrate their safety and efficacy in humans. The research and development of drugs is extremely risky. Only a small percentage of drug candidates that enter the clinical development process ever receive marketing approval. Failure or delay can occur at any time during the clinical trial process. To date, we have focused substantially all of our efforts and financial resources on identifying, acquiring, and developing drug candidates, including conducting preclinical studies and early-stage clinical trials. Clinical testing is expensive and can take many years to complete, and we cannot be certain that any clinical trials for the drug candidates we develop will be conducted as planned or completed on schedule, if at all. Our inability to successfully complete preclinical and clinical development for PIPE-791 could result in additional costs to us and negatively impact our ability to generate revenue. Similarly, if J&J cannot successfully complete preclinical and clinical development for PIPE-307, we will not be eligible to receive future milestone payments or royalties under the J&J License Agreement. As a result, our future success is dependent on our ability and the ability of J&J to successfully develop, obtain regulatory approval for, and then successfully commercialize PIPE-791 and PIPE-307, respectively. We currently generate no revenues from sales of any products, and we may never be able to develop or commercialize a marketable product. Further, we may never generate additional milestone payments or royalties under the J&J License Agreement.

PIPE-791 and PIPE-307 are currently in the early stages of clinical development. We completed a Phase 1 clinical trial of PIPE-791 in healthy volunteers in support of clinical development in IPF, PrMS and in November 2024 we received authorization of our IND from the FDA to initiate an exploratory Phase 1b, randomized, double-blind, placebo-controlled, crossover study of PIPE-791 in chronic pain associated with OA and LBP. We have completed two Phase 1 trials of PIPE-307 in healthy volunteers and are conducting a Phase 2 trial of PIPE-307 for the potential treatment of RRMS. In December 2024, J&J began recruiting an estimated 124 adult participants for a Phase 2 trial of PIPE-307/JNJ-89495120 for the potential treatment of MDD. This trial is a randomized, double-blind, multicenter, placebo-controlled, proof-of-concept study to evaluate the efficacy, safety and tolerability of PIPE-307/JNJ-89495120 as monotherapy in adult participants with MDD. The results from our preclinical studies and the early clinical trials for these drug candidates may not be predictive of the results of the current clinical trials being conducted and any later-stage clinical trials conducted for these drug candidates. In addition, results of third-party studies, as well as our evaluations of third-party compounds, may not be predictive of results for our drug candidates. Drug candidates in clinical trials, including PIPE-791 and PIPE-307, may fail to show the desired safety and efficacy traits despite having progressed through preclinical studies and early-stage clinical trials. A number of companies in the pharmaceutical industry have suffered significant setbacks in advancing through the clinical trial process due to lack of efficacy or adverse safety profiles, notwithstanding earlier promising results. In addition, conclusions based on promising data from analyses of clinical results may be shown to be incorrect in subsequent clinical trials that have pre-specified end points or may not be considered adequate by regulatory authorities. Even if the current and anticipated clinical trials for PIPE-791 and PIPE-307 are completed as planned, we cannot be certain that their results will support the safety and efficacy requirements sufficient to pursue later clinical trials and eventually obtain regulatory approval, and, as a result, we may never generate commercial revenues from these drug candidates. Moreover, if we or J&J are not able to differentiate PIPE-791 and PIPE-307, respectively, against other approved products for the indications being targeted for PIPE-791 and PIPE-307, or if any of the other circumstances described above occur, our business would be materially harmed and our ability to generate revenue from these drug candidates would be severely impaired.

Clinical trial failure may result from a multitude of factors including flaws in trial design, dose selection, placebo effect, patient enrollment criteria, relatively smaller sample size in earlier clinical trials, and failure to demonstrate favorable safety or efficacy traits. As such, failure in clinical trials can occur at any stage of testing. A number of companies in the biopharmaceutical industry have suffered setbacks in the advancement of clinical trials due to lack of efficacy or adverse safety profiles, notwithstanding promising results in earlier trials, and we cannot be certain that we will not face similar setbacks. Based upon negative or inconclusive results, we may decide, or regulators may require us, to conduct additional clinical trials or preclinical studies. In addition, data obtained from clinical trials are susceptible to varying interpretations, and regulators may not interpret the data from these trials as favorably as we do, which may further delay, limit or prevent marketing approval. Furthermore, as more drug candidates within a particular class of drugs proceed through clinical development to regulatory review and approval, the amount and type of clinical data that may be required by regulatory authorities may increase or change. The outcome of preclinical testing and early clinical trials may not be predictive of the success of later clinical trials, and preliminary or interim results of a clinical trial do not necessarily predict final results. For example, PIPE-791 and/or PIPE-307 may fail to show the desired safety and efficacy in clinical development despite positive results in preclinical studies, or having successfully advanced through early-stage clinical trials. The failure of any of drug candidate to demonstrate safety and efficacy in any clinical trial or for any indication could negatively impact the perception of the use of this drug candidate to treat other indications and the perception of any other drug candidate we develop (and therefore hinder the ability to successfully move forward with the development of the drug candidate in other indications or the development of our other drug candidates) or cause regulatory authorities to require additional testing before approving any of the drug candidates we develop.

***We may experience delays in initiating and successfully completing the clinical trials that we intend to conduct, including our current and planned clinical trials for PIPE-791 and PIPE-307. Any delays in initiating and successfully completing our clinical trials could increase our costs, slow the development and approval process and harm the commercial prospects of our drug candidates. Similarly, J&J may experience delays in initiating and completing the clinical development of PIPE-307, which would delay our receipt of potential milestone payments or royalties under the J&J License Agreement. Any of these occurrences could materially harm our business, financial condition and results of operations.***

We may experience delays in initiating and completing any clinical trials that we intend to conduct, including our current and planned clinical trials for PIPE-791 and PIPE-307, and we do not know whether our clinical trials will begin on time, need to be redesigned, enroll sufficient numbers of patients on time, or be completed on schedule, or at all. J&J will face similar concerns for any future clinical trials it conducts for PIPE-307. A clinical trial can be delayed for a variety of reasons, including delays related to:

- the FDA or comparable foreign regulatory authorities disagreeing as to the design or implementation of the clinical trial;
- obtaining regulatory approval to commence the clinical trial;
- reaching an agreement on acceptable terms with prospective CROs and clinical trial sites, the terms of which can be subject to extensive negotiation and may vary significantly among different CROs and trial sites;
- obtaining IRB approval at each site within the United States or IEC or other approval at sites outside the United States;
- recruiting suitable patients to participate in the clinical trial in a timely manner and in sufficient numbers;
- having patients complete the clinical trial or return for post-treatment follow-up;
- imposition of a clinical hold by regulatory authorities, including as a result of unforeseen safety issues or side effects or failure of clinical trial sites or investigators to adhere to regulatory requirements or follow trial protocols;
- clinical sites or investigators deviating from the clinical trial protocol or dropping out of the clinical trial, potentially necessitating the addition of new sites or investigators;
- third-party contractors failing to comply with regulatory requirements or meet their contractual obligations in a timely manner, or at all, or deviating from the clinical trial protocol;

- addressing patient safety concerns that arise during the clinical trial, including a decision by the initiating party, regulatory authorities, or IRBs, IECs or other relevant entities to suspend or terminate the clinical trial;
- adding a sufficient number of clinical trial sites;
- increased or unforeseeable costs in conducting a clinical trial;
- timely manufacturing sufficient quantities of a drug candidate, and accessing sufficient quantities of other materials (e.g. placebo, equipment) for use in the clinical trial; and
- potential disruptions caused by public health emergencies (“PHEs”) such as COVID-19, including difficulties in initiating clinical sites, enrolling and retaining participants, diversion of healthcare resources away from clinical trials, travel or quarantine policies that may be implemented, and other factors.

A clinical trial may also be suspended or terminated by the initiating party, the IRBs or IECs of the institutions in which such clinical trial is being conducted, the FDA or other regulatory authorities, or recommended for termination by a Data and Safety Monitoring Board (“DSMB”) for such trial. Such authorities may impose a suspension or termination or recommend an alteration due to a number of factors, including failure to conduct the clinical trial in accordance with regulatory requirements, such as GCP requirements, or the clinical trial protocols, inspection of the clinical trial operations or clinical trial site by the FDA or other regulatory authorities resulting in the imposition of a clinical hold, unforeseen safety issues or adverse side effects, failure to demonstrate a benefit from using a drug, changes in governmental regulations or administrative actions, or lack of adequate funding to continue the clinical trial. Further, J&J has the right to discontinue the clinical trial we are currently conducting for PIPE-307 if it has good faith concerns that such study presents safety risks or could present material adverse effects for the development or commercialization of PIPE-307 generally.

Furthermore, we rely on CROs and clinical trial sites to ensure the proper and timely conduct of our clinical trials and, while we have agreements governing their committed activities, we have limited influence over their actual performance, as described in the section titled “—Risks related to our dependence on third parties.”

If the commencement or completion of any clinical trials for PIPE-791 or PIPE-307 is delayed, or if a clinical trial is terminated prior to completion, the commercial prospects of the applicable drug candidate could be harmed, and our ability to generate revenues or royalties from such drug candidate may be delayed. In addition, any delays in our clinical trials could increase our costs, slow the development and approval process and jeopardize our ability to commence product sales and generate revenues. Any of these occurrences could materially harm our business, financial condition and results of operations. In addition, many of the factors that may cause, or lead to, a delay in the commencement or completion of a clinical trial may also ultimately lead to the denial of regulatory approval of the applicable drug candidate.

Principal investigators for our clinical trials may serve as scientific advisors or consultants to us from time to time and receive compensation in connection with such services. Under certain circumstances, we may be required to report some of these relationships to the FDA. The FDA may conclude that a financial relationship between us and a principal investigator has created a conflict of interest or otherwise affected interpretation of a clinical trial. The FDA may therefore question the integrity of the data generated at the applicable clinical trial site, and the utility of the clinical trial itself may be jeopardized. This could result in a delay in approval, or rejection, of our marketing applications by the FDA and may ultimately lead to the denial of marketing approval of a drug candidate.

***The regulatory approval processes of the FDA and comparable foreign regulatory authorities are unpredictable, lengthy, and time-consuming, and if we are ultimately unable to obtain regulatory approval for PIPE-791 or any other drug candidates that we develop or J&J is unable to obtain regulatory approval for PIPE-307, our business will be substantially harmed.***

The time required to obtain approval by the FDA and comparable foreign regulatory authorities is unpredictable but typically takes many years following the commencement of clinical trials and depends upon numerous factors, including the indication being studied and the substantial discretion of the regulatory authorities. In addition, approval policies, regulations, or the type and amount of clinical data necessary to gain approval for an indication may change during a drug candidate’s clinical development and may vary among jurisdictions. We have not obtained regulatory approval for PIPE-791, and J&J has not obtained regulatory approval for PIPE-307. It is possible that neither of these drug candidates or future drug candidates will receive the regulatory approvals required for commercialization. We are not permitted to market PIPE-791 or any other drug candidates that we develop in the United States until we receive approval of an NDA from the

FDA. Similarly, J&J will not be permitted to market PIPE-307 in the United States until it receives approval of an NDA from the FDA.

Prior to obtaining approval to commercialize a drug candidate in the United States or abroad, the initiating party must demonstrate with substantial evidence from well-controlled clinical trials, and to the satisfaction of the FDA or comparable foreign regulatory authority, that such drug candidate is safe and effective for its intended indication. In addition, data obtained from preclinical trials and clinical trials are susceptible to varying interpretations, and regulatory authorities may not interpret this data as favorably as the initiating party, which may further delay, limit, or prevent development efforts, clinical trials, or marketing approval. For example, even if we believe the preclinical or clinical data for PIPE-791 in an indication is promising, such data may not be sufficient to support approval by the FDA and other comparable regulatory authorities for this indication. Furthermore, as more competing drug candidates within a class of drugs proceed through clinical development to regulatory review and approval, the amount and type of clinical data that may be required by regulatory authorities may increase or change.

The FDA or any foreign regulatory authority can delay, limit, or deny approval of PIPE-791, PIPE-307 or any other drug candidates that we develop for any indication, or require us or J&J, as applicable, to conduct additional preclinical or clinical testing or abandon a program for many reasons, including:

- the FDA or comparable foreign regulatory authorities may disagree with the design or implementation of a clinical trial;
- the initiating party may be unable to demonstrate to the satisfaction of the FDA or comparable foreign regulatory authorities that a drug candidate is safe and effective for its proposed indication;
- serious and unexpected drug-related side effects experienced by participants in a clinical trial or by individuals using drugs similar to the drug candidate being studied in the clinical trial, or other products containing an active ingredient in such drug candidate;
- negative or ambiguous results from a clinical trial or results that may not meet the level of statistical significance required by the FDA or comparable foreign regulatory authorities for approval;
- the inability to demonstrate that a drug candidate's clinical and other benefits outweigh its safety risks;
- the FDA or comparable foreign regulatory authorities may disagree with the interpretation of data from preclinical studies or clinical trials;
- the data collected from clinical trials may not be acceptable or sufficient to support the submission of an NDA or other submission or to obtain regulatory approval in the United States or elsewhere, and the initiating party may be required to conduct additional clinical trials;
- the FDA's or the applicable foreign regulatory authority's disagreement regarding the formulation, the labeling, and/or the specifications of a drug candidate;
- the FDA or comparable foreign regulatory authorities may fail to approve or find deficiencies with the manufacturing processes or facilities of third-party manufacturers that produced the drug candidate for use in the clinical trials; and
- the approval policies or regulations of the FDA or comparable foreign regulatory authorities may significantly change in a manner rendering the clinical data insufficient for approval.

Of the large number of drugs in development, only a small percentage successfully complete the regulatory approval processes and are commercialized. The lengthy approval process, as well as the unpredictability of future clinical trial results, may result in the failure of PIPE-791 and/or PIPE-307 to obtain the required regulatory approvals for commercialization in any indication, which would significantly harm our business, results of operations and prospects.

In addition, the FDA or the applicable foreign regulatory authority also may approve a drug candidate for a more limited indication or patient population than originally requested, and the FDA or applicable foreign regulatory authority may approve a drug candidate with a label that does not include the labeling claims necessary or desirable for the successful



commercialization of that drug candidate. Any of the foregoing circumstances could materially harm the commercial prospects for the drug candidates we develop and our business.

***We may not be successful in our efforts to identify and develop additional drug candidates or identify additional indications. Due to our limited resources and access to capital, we must prioritize development of a limited number of drug candidates, the choice of which may prove to be wrong and adversely affect our business and prospects.***

We intend to explore the development of PIPE-791 in indications in addition to IPF, PrMS and chronic pain associated, initially, with OA and LBP. In addition, we have designated CTX-343, a peripherally-restricted LPA1R antagonist, as a drug candidate. We also intend to continue to explore additional drug candidates based on our clinical translational approach and drug development efforts. In each case, we may fail to successfully identify additional indications for PIPE-791, develop CTX-343, or identify viable new drug candidates for clinical development. If we fail to identify additional indications for PIPE-791 or additional potential drug candidates, our business and growth plans could be materially harmed. Further, under the terms of our License Agreement with J&J, J&J has sole discretion to determine whether to pursue further development of PIPE-307 for RRMS or any other indication.

Research programs to develop additional indications for our existing drug candidates and to develop additional drug candidates based on our clinical translational approach requires substantial technical, financial, and human resources whether or not they are ultimately successful. Our research programs may initially show promise in identifying potential indications or drug candidates, yet fail to yield results for clinical development for several reasons, including:

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

Because we have limited financial and human resources, we intend to initially focus on research programs and drug candidates for a limited set of indications. As a result, we may forego or delay pursuit of opportunities with other drug candidates or for other indications that could have greater commercial potential or a greater likelihood of success. Our resource allocation decisions may cause us to fail to capitalize on viable commercial products or profitable market opportunities.

Accordingly, there can be no assurance that we will ever be able to identify additional therapeutic opportunities for our drug candidates or to develop suitable potential drug candidates through our internal research and development programs, which could materially adversely affect our future growth and prospects. We may focus our efforts and resources on potential drug candidates or other potential programs that ultimately prove to be unsuccessful.

***We have and may continue to conduct future clinical trials outside of the United States. The FDA and other regulatory authorities or ethics committees may not accept data from such trials, in which case our development plans will be delayed, which could materially harm our business and financial condition.***

We have previously conducted clinical trials outside of the United States, including our Phase 1 clinical trial of PIPE-307, which was conducted under authorization of the Australian Therapeutic Goods Administration (“TGA”) and the National Health and Medical Research Council (“NHMRC”) and a Phase 1b PET study of PIPE-307, which was conducted under the authorization of the Research Ethics Committee (“REC”) and the MHRA in the United Kingdom. We completed our Phase 1b PET clinical trial for PIPE-307 in RRMS in the United Kingdom, and we are conducting our Phase 1b PET clinical trial for PIPE-791 in IPF and PrMS in the United Kingdom. We also plan to conduct additional clinical trials outside the United States in the future. Although the FDA and other foreign regulatory authorities may accept data from clinical trials conducted outside the United States, acceptance of this data is subject to certain conditions imposed by these regulators. For example, non-clinical toxicology studies for our Phase 1b PET study of PIPE-307 were performed in China that were not GLP compliant and – as China is not a signatory on the Organization for Economic Co-operation and Development (“OECD”), Mutual Acceptance of Data system, a multilateral agreement that allows participating countries to share the results of various non-clinical tests performed using OECD methods and principles – the non-clinical data were not considered acceptable to support the trial. While the Phase 1b was approved on the basis of clinical safety data, the MHRA stated that prior to Marketing Authorization Approval of PIPE-307 in the United Kingdom, an inspection or further



evaluation could be triggered. Further, in cases where data from foreign clinical trials are intended to serve as the basis for marketing approval in the United States, the FDA will generally not approve the application on the basis of foreign data alone unless (i) the data are applicable to the U.S. population and U.S. medical practice; and (ii) the trials were performed by clinical investigators of recognized competence and pursuant to GCP regulations. In general, the patient population for any clinical trials conducted outside the United States must be representative of the population for whom we intend to label the drug candidate in the United States. Additionally, the FDA's clinical trial requirements, including sufficient size of patient populations and statistical powering, must be met. Many foreign regulatory authorities have similar approval requirements for clinical trials. In addition, such trials would be subject to the applicable local laws of the foreign jurisdictions where the trials are conducted. Further, the FDA must be able to validate the data from the clinical trial through an onsite inspection if it deems such inspection necessary. In addition, when clinical trials are conducted only at sites outside of the United States, such trials may not be subject to IND review, meaning the FDA may not provide advance comment on the clinical protocols for the trials, and therefore there is an additional potential risk that the FDA could determine that the trial design or protocol for a non-U.S. clinical trial was inadequate, which would likely require an additional clinical trial in order to obtain FDA approval. If the FDA does not accept data from any clinical trials we conduct outside the United States, it would likely result in the need for additional clinical trials, which would be costly and time consuming and delay our drug development plans, which could materially harm our business, financial condition, results of operations and prospects.

Conducting clinical trials outside the United States also exposes us to additional risks, including risks associated with:

- additional foreign regulatory requirements;
- foreign exchange fluctuations;
- patient monitoring and compliance;
- compliance with foreign manufacturing, customs, shipment and storage requirements (including licensing requirements);
- cultural differences in medical practice and clinical research;
- diminished protection of intellectual property in some countries; and
- tax and local corporate structure considerations.

***Enrollment and retention of patients in clinical trials is an expensive and time-consuming process and could be made more difficult or rendered impossible by multiple factors outside our control.***

The timely completion of clinical trials in accordance with their protocols depends, among other things, on the ability to enroll a sufficient number of patients who remain in the trial until its conclusion.

We may encounter delays in enrolling, or be unable to enroll, a sufficient number of patients to complete any of our clinical trials, and even once enrolled, we may be unable to retain a sufficient number of patients to complete any of our trials. J&J may encounter similar difficulties in enrolling and retaining patients in any clinical trials it initiates for PIPE-307. Patient enrollment and retention in clinical trials depends on many factors, including:

- the patient eligibility criteria defined in the protocol;
- the size of the patient population required for analysis of the clinical trial's primary endpoints;
- the nature of the clinical trial protocol;
- the existing body of safety and efficacy data with respect to the drug candidate;
- the proximity of patients to clinical sites;

- the ability to recruit clinical trial investigators with the appropriate competencies, motivation and experience;
- clinicians' and patients' perceptions as to the potential risks and advantages of the drug candidate being studied in relation to other available therapies, including any new drugs or medical devices that may be approved for the indications being studied;
- the availability of approved products that treat the same indications as the drug candidate being studied;
- the proximity and availability of clinical trial sites for prospective patients;
- the ability to monitor patients adequately during and after treatment;
- competing clinical trials being conducted by other companies or institutions;
- the ability to obtain and maintain patient consents;
- the risk that patients enrolled in clinical trials will drop out of the trials before completion; and
- factors we may not be able to control that may limit patients, principal investigators or staff or clinical site availability, such as uncertain geopolitical conditions or pandemics, such as the recent COVID-19 pandemic or changes in government budgets, priorities or policies which result in reduced allocations to government agencies that fund research and development activities, such as the U.S. National Institutes of Health, or targeted cancellations by the U.S. federal government of certain grants or contracts.

In addition, any clinical trials we conduct for PIPE-791 or J&J conducts for PIPE-307 will compete with other clinical trials for drug candidates and medical devices that are in the same therapeutic areas as these drug candidates, and this competition could reduce the number and types of patients available to us or J&J, because some patients who might have opted to enroll in any PIPE-791 or PIPE-307 clinical trials may instead opt to enroll in a clinical trial being conducted by a competitor. Furthermore, any negative results we or J&J report in the clinical trials for PIPE-791 and PIPE-307 may make it difficult or impossible to recruit and retain patients in other clinical trials of that same drug candidate. Delays or failures in planned patient enrollment or retention may result in increased costs or program delays, which could have a harmful effect on the continued development of a drug candidate or could render further commercial development impossible.

***Interim and preliminary “top-line” data from our clinical trials that we announce or publish from time to time may change as more patient data becomes available and is subject to audit and verification procedures that could result in material changes in the final data.***

From time to time, we may publicly disclose interim, top-line or preliminary data from the clinical trials we conduct, which is based on a preliminary analysis of then-available data. The final results from these clinical trials and any related findings and conclusions are subject to change following a more comprehensive review of the data related to the particular trial. We also make assumptions, estimations, calculations and conclusions as part of our analyses of data, and we may not have received or had the opportunity to fully and carefully evaluate all data. In addition, interim data from clinical trials that we may complete are subject to the risk that one or more of the clinical outcomes may materially change as patient enrollment continues and more patient data becomes available. As a result, the top-line or preliminary results that we report may differ from future results of the same trial, or different conclusions or considerations may qualify such results, once additional data has been received and fully evaluated. Top-line or preliminary data also remains subject to audit and verification procedures that may result in the final data being materially different from the top-line or preliminary data we previously published. As a result, top-line and preliminary data should be viewed with caution until final data is available and published. Adverse differences between interim data and final data could significantly harm our business prospects. Further, disclosure of interim data by us or by our competitors could result in volatility in the price of our common stock.

Further, others, including regulatory agencies, may not accept or agree with our assumptions, estimates, calculations, conclusions or analyses or may interpret or weigh the importance of data differently, which could impact the value of the particular program, the approvability or commercialization of the particular drug candidate or product and our company in general. In addition, the information we choose to publicly disclose regarding a particular clinical trial is based

on what is typically extensive information, and you or others may not agree with what we determine is material or otherwise appropriate information to include in our disclosure.

If the interim, top-line or preliminary data that we report differ from actual results, or if others, including regulatory authorities, disagree with the conclusions reached, our ability to obtain approval for, and commercialize, the drug candidates we develop may be harmed, which could harm our business, financial condition, results of operations and prospects.

***The administration of PIPE-791 and/or PIPE-307 may cause serious adverse events or undesirable side effects, which may halt their clinical development, delay or prevent marketing approval, or, if approved, require them to be taken off the market, include safety warnings, or otherwise limit their sales.***

Serious adverse events or undesirable side effects caused by PIPE-791 or PIPE-307 could cause us or J&J, as applicable, or regulatory authorities to interrupt, delay, or halt the clinical trials and could result in a more restrictive label or the delay or denial of regulatory approval by the FDA or other comparable foreign regulatory authorities for these drug candidates. Results of any clinical trial for PIPE-791 or PIPE-307 could reveal a high and unacceptable severity and prevalence of side effects. If unacceptable side effects arise in the development of any drug candidate, we or J&J, as applicable, the FDA, or the IRBs or IECs at the institutions in which a study is being conducted, or the DSMB, if constituted for a clinical trial, could recommend a suspension or termination of the clinical trial, or the FDA or comparable foreign regulatory authorities could prohibit the further development of or deny approval of a drug candidate for any or all targeted indications. In addition, drug-related side effects could affect patient recruitment or the ability of enrolled patients to complete a clinical trial or result in potential product liability claims. In addition, these side effects may not be appropriately recognized or managed by the treating medical staff. We or J&J, as applicable, may need to train medical personnel regarding the proper administration protocols for PIPE-791 and PIPE-307 and to understand the potential side effect profiles for these drug candidates. Inadequate training in recognizing or managing the potential side effects of PIPE-791 or PIPE-307 could result in patient injury or death. Any of these occurrences may harm our business, financial condition, results of operations and prospects significantly.

Additionally, if PIPE-791, PIPE-307 or any other drug candidate we develop receives marketing approval, and the use of the approved product causes undesirable side effects, a number of potentially significant negative consequences could result, including:

- regulatory authorities may suspend, withdraw, or limit approvals of such product, or seek an injunction against its manufacture or distribution, or take other market action in relation to such product;
- regulatory authorities may require a product recall, or we or J&J, as applicable, may decide to initiate a voluntary recall of the product;
- regulatory authorities may require additional warnings on the product's label, such as a "black box" warning or contraindications;
- additional restrictions may be imposed on the marketing of the product or the manufacturing processes for the product or any component thereof;
- we or J&J, as applicable, may be required to implement a REMS or create a medication guide outlining the risks of such side effects for distribution to patients;
- we or J&J, as applicable, may be required to conduct post-market studies or agree to post marketing commitments;
- we or J&J, as applicable, could be sued and held liable for harm caused to patients;
- the product may become less competitive; and
- our reputation may suffer.

Any of these events could prevent us or J&J, as applicable, from achieving or maintaining market acceptance of PIPE-791 or PIPE-307, if approved, and could significantly harm our business, financial condition, results of operations and prospects.

***Changes in funding for the FDA, other government agencies or comparable foreign regulatory authorities could hinder their ability to hire and retain key leadership and other personnel, or otherwise prevent new products and services from being developed or commercialized in a timely manner or otherwise prevent these agencies or authorities from performing normal business functions on which the operations of our business may rely, which could negatively impact our business.***

The ability of the FDA or comparable foreign regulatory authorities to review and approve new products, to provide feedback on clinical trials and development programs, to meet with sponsors and to otherwise review regulatory submissions can be affected by a variety of factors, including government budget and funding levels, ability to hire and retain key leadership and other personnel, the sufficiency of user fees, and statutory, regulatory, and policy changes. Average review times at the agency have fluctuated in recent years as a result. In addition, government funding of other government agencies or comparable foreign regulatory authorities on which our operations may rely, including those that fund research and development activities is subject to the political process, which is inherently fluid and unpredictable.

Disruptions at the FDA, other government agencies or comparable foreign regulatory authorities may also slow the time necessary for new drugs to be reviewed or approved by necessary government agencies, which would adversely affect our business. For example, over the last several years, the U.S. government has shut down several times and certain regulatory agencies, such as the FDA, have had to furlough critical employees and stop critical activities. If a prolonged government shutdown occurs, it could significantly impact the ability of the FDA to timely review and process our regulatory submissions, which could have a material adverse effect on our business.

***The market opportunities for the drug candidates we develop, if approved, may be smaller than we anticipate and, as a result, our commercial opportunities may be limited.***

We are initially developing PIPE-791 for the treatment of IPF, PrMS and chronic pain associated, initially, with OA and LBP. We are also developing PIPE-307, in collaboration with J&J. Our projections of the number of eligible patients for each of these indications are based on our beliefs and estimates. These estimates have been derived from a variety of sources, including scientific literature, patient foundations, and market research, and may prove to be incorrect. Further, new sources may reveal a change in the estimated number of eligible patients, and the number of patients may turn out to be lower than expected. Additionally, the potentially addressable patient populations for these programs or our future drug candidates may be limited. For example, even if we obtain FDA approval for PIPE-791 for the treatment of IPF, PrMS or chronic pain, the target population approved by the FDA may be more limited than what we currently anticipate. Even if we obtain significant market share for any drug candidate, if approved, if the potential target populations are smaller, we may never achieve profitability without obtaining marketing approval for additional indications.

***We have never obtained marketing approval for any drug candidate and we may be unable to obtain, or may be delayed in obtaining, marketing approval for any drug candidate.***

We have never obtained marketing approval for any drug candidate. It is possible that the FDA or other foreign regulatory authority may refuse to accept for substantive review any NDAs or similar submission that we submit for PIPE-791 or that J&J may submit for PIPE-307. The FDA may also conclude after review of the data that we or J&J submit that our applications are insufficient to obtain marketing approval for PIPE-791 or PIPE-307, respectively. If the FDA, or other foreign regulatory authority does not accept or approve any NDAs submitted for PIPE-791 or PIPE-307, it may require that we or J&J conduct additional clinical, preclinical, manufacturing validation or other studies and submit that data before it will reconsider the application. Depending on the extent of these or any other required studies, approval of any NDA or similar submission for PIPE-791 or PIPE-307 may be delayed or, in the case of PIPE-791, require us to expend more resources than we have available. It is also possible that additional studies, if performed and completed, may not be considered sufficient by the FDA or other foreign regulatory authority to approve any NDAs or similar submission submitted for PIPE-791 or PIPE-307. Any delay in obtaining, or an inability to obtain, marketing approvals would prevent us from commercializing PIPE-791 and J&J from commercializing PIPE-307, and prevent us from generating revenues from these drug candidates to support our continued operations and plans. If any of these outcomes occur, our business, financial condition and results of operations would be significantly harmed.

***Even if we obtain FDA approval for a drug candidate in the United States, we may never obtain approval for the drug candidate in any other jurisdiction or commercialize the drug candidate in the United States or in any other jurisdiction, which would limit our ability to realize its full market potential.***

In order to market any product in a particular jurisdiction, we must establish and comply with numerous and varying regulatory requirements regarding safety and efficacy on a country-by-country basis. Approval by the FDA in the United States does not ensure approval by comparable regulatory authorities in other countries or jurisdictions nor does it

ensure that we will be able to successfully commercialize such approved drug candidate in the United States or in other jurisdictions. However, the failure to obtain approval in one jurisdiction may negatively impact our ability to obtain approval elsewhere. In addition, clinical trials conducted in one country may not be accepted by regulatory authorities in other countries, and regulatory approval in one country does not guarantee regulatory approval in any other country. Further, successful commercialization in the United States does not guarantee successful commercialization in other jurisdictions.

Approval processes vary among countries and can involve additional product testing and validation and additional administrative review periods. Seeking foreign regulatory approval could result in difficulties and increased costs for us and require additional preclinical studies or clinical trials, which could be costly and time-consuming. Regulatory requirements can vary widely from country to country and could delay or prevent the introduction of our products in those countries. We do not have any drug candidates approved for sale in any jurisdiction, including in international markets, and we do not have experience in obtaining regulatory approval in international markets. If we fail to comply with regulatory requirements in international markets or to obtain and maintain required approvals, or if regulatory approvals in international markets are delayed, our target market will be reduced and we will be unable to realize the full market potential of any product we develop.

***Even if we obtain regulatory approval for any drug candidate, we will still face extensive and ongoing regulatory requirements and obligations, which may result in significant additional expense, and any drug candidates, if approved, may face future development and regulatory difficulties.***

Any drug candidate for which we obtain marketing approval, along with the manufacturing processes, post-approval clinical data, labeling, packaging, distribution, adverse event reporting, monitoring, storage, recordkeeping, export, import, and advertising and promotional activities for such product, among other things, will be subject to extensive and ongoing requirements of and review by the FDA and other regulatory authorities. These requirements include submissions of safety and other post-marketing information and reports, establishment registration and drug listing requirements, continued compliance with current cGMP and GCP requirements for any clinical trials conducted post-approval, 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 and GCP and requirements for any clinical trials that we conduct post-approval.

Even if marketing approval of a drug candidate is granted, the approval may be subject to limitations on the indicated uses for which the drug candidate may be marketed or to the conditions of approval, including a requirement to implement a REMS. If a drug candidate receives marketing approval, the accompanying label may limit the approved indicated use of the product, which could limit sales of the product. The FDA, or comparable foreign regulators, may also require costly post-marketing studies or clinical trials and surveillance to monitor the safety or efficacy of a product. The FDA closely regulates the post-approval marketing and promotion of drugs to ensure drugs are marketed only for the approved indications and in accordance with the provisions of the approved labeling. The FDA imposes stringent restrictions on manufacturers' communications regarding off-label use, and if we market our products for uses beyond their approved indications, we may be subject to enforcement action for off-label marketing. Violations of the FDCA relating to the promotion of prescription drugs, may lead to FDA enforcement actions and investigations alleging violations of federal and state healthcare fraud and abuse laws, as well as state consumer protection laws.

In addition, later discovery of previously unknown adverse events or other problems with our products, manufacturers, or manufacturing processes or failure to comply with regulatory requirements, may yield various results, including:

- restrictions on manufacturing such products;
- restrictions on the labeling or marketing of products;
- restrictions on product distribution or use;
- requirements to conduct post-marketing studies or clinical trials;
- warning letters or untitled letters;



- refusal to approve pending applications or supplements to approved applications that we submit;
- recalls or market withdrawals of products;
- fines, restitution, or disgorgement of profits or revenues;
- suspension or withdrawal of marketing approvals;
- refusal to permit the import or export of our products;
- product seizure; and
- injunctions, consent decrees, or the imposition of civil or criminal penalties.

Further, the policies from the FDA or other comparable regulatory authorities may change, and additional government regulations may be enacted that could prevent, limit, or delay regulatory approval of a drug candidate. If we are slow or unable to adapt to changes in existing requirements or the adoption of new requirements or policies, or if we are not able to maintain regulatory compliance, we may lose any marketing approval that we may have obtained, which would adversely affect our business, prospects, and ability to achieve or sustain profitability.

We also cannot predict the likelihood, nature, or extent of government regulation that may arise from future legislation or administrative or executive action, either in the United States or abroad. The policies of the FDA and of other comparable regulatory authorities may change and additional government regulations may be enacted that could prevent, limit, or delay regulatory approval of a drug candidate. If we are slow or unable to adapt to changes in existing requirements or the adoption of new requirements or policies, or if we are not able to maintain regulatory compliance, we may lose any marketing approval that we may have obtained, and we may not achieve or sustain profitability, which would adversely affect our business, prospects, financial condition, and results of operations. Furthermore, noncompliance by us or any collaborator with regulatory requirements, including safety monitoring or pharmacovigilance, may also result in significant financial penalties, which would adversely affect our business.

***We may seek a breakthrough therapy and/or orphan drug designation for PIPE-791 or future drug candidates, but we might not receive such designations, and even if we do, we may not maintain such designations, and such designations may not lead to faster development, regulatory review or approval, and will not increase the likelihood that the drug candidate will receive marketing approval.***

We may seek a breakthrough therapy and/or orphan drug designation for PIPE-791, or other drug candidates we may develop. A breakthrough therapy is defined as a drug that is intended, alone or in combination with one or more other drugs, to treat a serious or life-threatening disease or condition, and preliminary clinical evidence indicates that the drug may demonstrate substantial improvement over existing therapies on one or more clinically significant endpoints, such as substantial treatment effects observed early in clinical development. For drugs that have been designated as breakthrough therapies, interaction and communication between the FDA and the sponsor of the trial can help to identify the most efficient path for clinical development while minimizing the number of patients placed in ineffective control regimens. Drugs designated as breakthrough therapies by the FDA may also be eligible for priority review if supported by clinical data at the time the NDA is submitted to the FDA. We may also seek fast track designation for some of our drug candidates. If a drug is intended for the treatment of a serious or life-threatening condition and preclinical or clinical data demonstrates the potential to address an unmet medical need, the drug sponsor may apply for fast track designation.

Regulatory authorities in some jurisdictions, including the United States, may designate drugs for relatively small patient populations as orphan drugs. Under the Orphan Drug Act of 1983, the FDA may designate a drug 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, or a patient population of greater than 200,000 individuals in the United States but for which there is no reasonable expectation that the cost of developing the drug will be recovered from sales in the United States alone. In the United States, orphan drug designation entitles a party to financial incentives such as opportunities for grant funding towards clinical trial costs, tax advantages and user fee waivers. After the FDA grants orphan drug designation, the generic identity of the drug and its potential orphan use are disclosed publicly by the FDA. Orphan drug designation, however, neither shortens the development time or regulatory review time of a drug nor gives the drug any advantage in the regulatory review or approval process. Generally, if a drug with an orphan drug designation subsequently receives the first marketing approval for the targeted indication, then the drug is entitled to a seven-year period of

marketing exclusivity that precludes the applicable regulatory authority from approving another marketing application for the same drug for the same indication for the exclusivity period except in limited situations, such as a showing of clinical superiority to the product with orphan drug exclusivity or where the manufacturer is unable to assure sufficient product quantity. For purposes of small molecule drugs, the FDA defines “same drug” as a drug that contains the same active moiety and is intended for the same use as the drug in question. A designated orphan drug may not receive orphan drug exclusivity if it is approved for a use that is broader than the indication for which it received orphan drug designation.

The FDA has broad discretion whether or not to grant breakthrough therapy, fast track and/or orphan drug designation to any drug candidate. Accordingly, even if we believe that a drug candidate meets the criteria for designation as a breakthrough therapy or orphan drug, the FDA may disagree and instead determine not to make such a designation. Even if we receive breakthrough therapy and/or orphan drug designation, the receipt of such designation may not result in a faster development or regulatory review or approval process compared to drugs considered for approval under conventional FDA procedures and does not assure ultimate approval by the FDA. In addition, even if a drug candidate qualifies as a breakthrough therapy or orphan drug, the FDA may later decide that it no longer meets the conditions for qualification or decide that the time period for FDA review or approval will not be shortened. Even if we were to obtain orphan drug designation for a drug candidate, we may not obtain orphan exclusivity and that exclusivity may not effectively protect the drug from the competition of different drugs for the same condition, which could be approved during the exclusivity period. Additionally, after an orphan drug is approved, the FDA could subsequently approve another application for the same drug for the same indication if the FDA concludes that the later drug is shown to be safer, more effective or makes a major contribution to patient care. Orphan drug exclusive marketing rights in the United States also may be lost if the FDA later determines that the request for designation was materially defective or if the manufacturer is unable to assure sufficient quantity of the drug to meet the needs of patients with the rare disease or condition. The failure to obtain a breakthrough therapy, fast track and/or orphan drug designation or admission for any drug candidates we may develop, the inability to maintain that designation for the duration of the applicable period, or the inability to obtain or maintain orphan drug exclusivity could reduce our ability to make sufficient sales of the applicable drug candidate to balance our expenses incurred to develop it, which would have a negative impact on our operational results and financial condition. The FDA may withdraw fast track designation if it believes that the designation is no longer supported by data from our clinical development program. Fast track designation alone does not guarantee qualification for the FDA’s priority review procedures.

***We may seek approval of our drug candidates, where applicable, under the FDA’s accelerated approval pathway. This pathway, even if granted for PIPE-791 or any other future drug candidates, may not lead to a faster development, regulatory review or approval process or launch and it does not increase the likelihood that our drug candidates will receive marketing approval in the United States.***

We may seek accelerated approval of PIPE-791 and for future drug candidates from the FDA. A product may be eligible for accelerated approval if it treats a serious or life-threatening condition and generally provides a meaningful advantage over available therapies. In addition, it must demonstrate an effect on a surrogate endpoint that is reasonably likely to predict clinical benefit or on a clinical endpoint that can be measured earlier than irreversible morbidity or mortality (“IMM”) that is reasonably likely to predict an effect on IMM or other clinical benefit. If granted, accelerated approval is usually contingent on the sponsor’s agreement to conduct, in a diligent manner, additional post-approval confirmatory studies to verify and describe the drug’s clinical benefit. Under the FDORA, the FDA is permitted to require, as appropriate, that a post-approval confirmatory study or studies be underway prior to approval or within a specified time period after the date of approval for a product granted accelerated approval. FDORA also requires sponsors to send updates to the FDA every 180 days on the status of such studies, including progress toward enrollment targets, and the FDA must promptly post this information publicly. FDORA also gives the FDA increased authority to withdraw approval of a drug or biologic granted accelerated approval on an expedited basis if the sponsor fails to conduct such studies in a timely manner, send the necessary updates to the FDA, or if such post-approval studies fail to verify the drug’s predicted clinical benefit. Under FDORA, the FDA is empowered to take action, such as issuing fines, against companies that fail to conduct with due diligence any post-approval confirmatory study or submit timely reports to the agency on their progress. In addition, the FDA currently requires, unless otherwise informed by the agency, pre-approval of promotional materials for products receiving accelerated approval, which could adversely impact the timing of the commercial launch of the product. Thus, even if we do seek to utilize the accelerated approval pathway, we may not be able to obtain accelerated approval and, even if we do, we may not experience a faster development, regulatory review or approval process for that product. In addition, receiving accelerated approval does not assure that the product’s accelerated approval will eventually be converted to a traditional approval.

***Potential product liability lawsuits against us could cause us to incur substantial liabilities and limit commercialization of any products that we may develop.***

The use of any drug candidate in our clinical trials and the sale of any products for which we obtain marketing approval exposes us to the risk of product liability claims. Product liability claims might be brought against us by patients, healthcare providers, pharmaceutical companies or others selling or otherwise coming into contact with our products. On occasion, large judgments have been awarded in class action lawsuits based on drugs that had unanticipated adverse effects. If we cannot successfully defend against product liability claims, we could incur substantial liability and costs. In addition, regardless of merit or eventual outcome, product liability claims may result in:

- impairment of our business reputation and significant negative media attention;
- withdrawal of participants from our clinical trials;
- significant costs to defend the litigation;
- distraction of management's attention from our primary business;
- substantial monetary awards to patients or other claimants;
- inability to commercialize a drug candidate;
- product recalls, withdrawals or labeling, marketing or promotional restrictions;
- decreased market demand for any product; and
- loss of revenue.

The product liability insurance we currently carry, and any additional product liability insurance coverage we acquire in the future, may not be sufficient to reimburse us for 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. If we obtain marketing approval for any drug candidate, we intend to acquire insurance coverage to include the sale of commercial products; however, we may be unable to obtain product liability insurance on commercially reasonable terms or in adequate amounts. 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 adversely affect our business, financial condition and results of operation, including preventing or limiting the commercialization of any drug candidates we develop.

***The biopharmaceutical industry is subject to extensive regulatory obligations and policies that are subject to change, including due to judicial challenges.***

On June 28, 2024, the U.S. Supreme Court issued an opinion holding that courts reviewing agency action pursuant to the Administrative Procedure Act “must exercise their independent judgment” and “may not defer to an agency interpretation of the law simply because a statute is ambiguous.” The decision will have a significant impact on how lower courts evaluate challenges to agency interpretations of law, including those by the FDA and other agencies with significant oversight of the biopharmaceutical industry. The new framework is likely to increase both the frequency of such challenges and their odds of success by eliminating one way in which the government previously prevailed in such cases. As a result, significant regulatory policies will be subject to increased litigation and judicial scrutiny. Any resulting changes in regulation may result in unexpected delays, increased costs, or other negative impacts on our business that are difficult to predict but could have a material adverse effect on our business and financial condition.

## Risks Related to our Financial Position and Need for Additional Capital

***We have incurred significant operating expenses since inception and anticipate that our operating expenses will continue to significantly increase for the foreseeable future. As a result, we may be unable to sustain profitability, and if we are unable to achieve sustained profitability, the market value of our common stock will likely decline.***

We are a clinical-stage biotechnology company with a limited operating history. To date, we have devoted our efforts to research and development, building our operations, establishing and maintaining our intellectual property portfolio, raising capital, identifying drug candidates for commercialization, conducting preclinical studies and clinical trials, negotiating and entering into the J&J License Agreement and completing our initial public offering. As a result, we have incurred significant operating expenses and net losses since our formation.

Investment in pharmaceutical product development is highly speculative because it entails substantial upfront capital expenditures and significant risk that any potential drug candidate will fail to advance through clinical development and eventually gain regulatory approval and become commercially viable. We expect to incur significant additional operating losses for the next several years as we continue to develop PIPE-791 in multiple indications, complete the Phase 2 clinical trial for PIPE-307 in RRMS, and endeavor to advance the development of other drug candidate we identify through our preclinical development efforts, complete preclinical studies and clinical trials, seek regulatory approval and prepare to commercialize any approved product. The costs of advancing drug candidates into each clinical phase tend to increase substantially over the duration of the clinical development process. Therefore, the total costs to advance any drug candidate to marketing approval in even a single jurisdiction are substantial.

We expect our operating expenses to increase substantially for the foreseeable future as we:

- complete our current and planned future clinical trials for PIPE-791 for our initial indications in IPF, PrMS and chronic pain as well as other potential indications;
- complete our current clinical trial for PIPE-307 in RRMS;
- expand our product development programs, and develop other drug candidates such as CTX-343;
- seek regulatory approvals for PIPE-791, and any other drug candidates we develop;
- secure a commercial manufacturing source and supply chain capacity sufficient to produce commercial quantities of any drug candidate for which we obtain regulatory approval;
- establish a sales, marketing and distribution infrastructure to commercialize any drug candidates for which we may obtain marketing approval;
- maintain, expand, and protect our intellectual property portfolio;
- hire additional clinical, scientific, commercial, operational, financial and management personnel, including personnel to support operations as a public company; and
- acquire or in-license other drug candidates or technologies.

Furthermore, our ability to successfully develop, obtain regulatory approval for and commercialize any drug candidate and generate product revenue is subject to substantial additional risks and uncertainties, as described under “—Risks related to development, clinical testing, and regulatory approval” and “—Risks related to commercialization.” As a result, we expect to continue to incur significant operating expenses and negative cash flows for the foreseeable future. These operating expenses and negative cash flows have had, and will continue to have, an adverse effect on our stockholders’ equity and working capital. The amount of our future operating expenses, and any resulting net losses, will depend, in part, on the rate of future growth of our operating expenses and our ability to generate revenues. If we are unable to develop and commercialize one or more drug candidates or if revenues from any product that receives marketing approval or any milestone payments or royalties we receive under the J&J License Agreement are insufficient, we will not be able to maintain profitability. Even if we successfully commercialize one or more of our drug candidates or J&J successfully commercializes PIPE-307, we may continue to incur substantial research and development and other expenses to identify and develop additional drug candidates. We may not be able to achieve sustained profitability or meet outside expectations for our profitability. If we are unable to achieve sustained profitability or to meet outside expectations for our

profitability, we will not be able to implement our business plans and the value of our common stock will be materially adversely affected and you may suffer substantial losses in your investment.

***We have a limited operating history and the drug candidates we have developed are in the early stages of clinical development, which may make it difficult to evaluate the prospects for our future viability.***

We began operations in 2012. Our operations to date have been limited to research and development, building our operations, establishing and maintaining our intellectual property portfolio, raising capital, identifying drug candidates for commercialization, conducting preclinical studies and clinical trials, negotiating and entering into the J&J License Agreement and completing our initial public offering. PIPE-791 and PIPE-307 are in the early stages of clinical development. We have not obtained marketing approval for any drug candidate, and we have not demonstrated the ability to successfully manufacture a commercial-scale product, or arrange for a third party to do so on our behalf, or conduct sales and marketing activities necessary for successful product commercialization. Consequently, predictions about our future success or viability may not be as accurate as they could be if we had a longer operating history or a history of successfully developing and commercializing pharmaceutical products.

In addition, as a business with a limited operating history, we may encounter unforeseen expenses, difficulties, complications, delays and other known and unknown challenges. We will eventually need to transition from a company with a preclinical and early clinical stage focus to a company capable of supporting later stage clinical trials, regulatory approvals and manufacturing and commercial activities. We may not be successful in such a transition and, as a result, our business may be adversely affected.

As we continue to build our business, we expect our financial condition and operating results may fluctuate significantly from quarter to quarter and year to year due to a variety of factors, many of which are beyond our control. Accordingly, the results of any quarterly or annual period are not necessarily indicative of future operating performance.

***We will require significant additional capital to complete the development and commercialization of PIPE-791 and the other drug candidates we select for development.***

We expect to spend substantial funds to complete the development of, seek regulatory approvals for and, if approved, commercialize PIPE-791 in IPF, PrMS, chronic pain and any other potential indications we elect to pursue. We will also incur costs to complete our Phase 2 clinical trial for PIPE-307 in RRMS and, could potentially incur significant costs related to PIPE-307 to the extent we have the opportunity and decide to opt-in to fund a portion of all Phase 3 development costs for PIPE-307. We also expect to spend substantial funds to identify and develop new drug candidates based on our clinical translational approach and development efforts.

Our future funding requirements, both near and long-term, will depend on many factors, including, but not limited to:

- the initiation, progress, timing, costs and results of our clinical trials through all phases of development for PIPE-791 in IPF, PrMS, chronic pain and any other potential indications we elect to pursue and for any other drug candidates we select for development;
- costs to complete our Phase 2 clinical trial for PIPE-307 in RRMS and potential additional costs related to PIPE-307 to the extent we have the opportunity and decide to opt-in to fund a portion of all Phase 3 development costs for PIPE-307 in any indication;
- the outcome, timing and cost of meeting regulatory requirements established by the FDA and other comparable foreign regulatory authorities, including any additional clinical trials required by the FDA or other comparable foreign regulatory authorities;
- the willingness of the FDA and other comparable foreign regulatory authorities to accept our clinical trial designs, as well as data from our completed and planned clinical trials and preclinical studies, as the basis for review and approval of PIPE-791 in IPF, PrMS and/or chronic pain or in any other potential indications we elect to pursue and for any other drug candidates we select for development;
- the costs related to maintaining our collaboration with J&J for the development of PIPE-307;



- the cost of filing, prosecuting, defending, and enforcing our patent claims and other intellectual property rights;
- the cost of defending potential intellectual property disputes, including patent infringement actions brought by third parties against us;
- the effect of competing technological and market developments;
- the cost and timing of completion of commercial-scale manufacturing activities;
- the costs of operating as a public company;
- the cost of making royalty, milestone or other payments under current and any future in-license agreements;
- the extent to which we in-license or acquire other drug candidates, products, technologies or businesses;
- the cost of establishing sales, marketing and distribution capabilities for PIPE-791 and any our drug candidates we develop, if approved; and
- the initiation, progress, and timing of our commercialization of any drug candidate for which we obtain regulatory approval.

Based on these plans, we will require significant additional capital to complete these development activities and implement our commercialization and business plans, which we may acquire through additional equity offerings, debt financings, marketing and distribution arrangements and other collaborations, strategic alliances and licensing arrangements or other sources. Adequate additional financing may not be available to us on acceptable terms, or at all. If events or circumstances occur such that we do not obtain additional funding, we may need to delay, reduce or eliminate our product development or future commercialization efforts, which could have a material adverse effect on our business, results of operations or financial condition. Further, if we raise funds through future licensing or other similar commercial arrangements with third parties, similar to the J&J License Agreement, we may be required to relinquish valuable rights to our technology, future revenue streams, research programs or drug candidates or may be required to grant licenses on terms that may not be favorable to us and/or may reduce the value of our common stock. Our failure to raise capital as and when needed would have a negative effect on our financial condition and our ability to pursue our business strategy. In addition, attempting to secure additional financing may divert the time and attention of our management from day-to-day activities and harm our development efforts.

#### **Risks Related to our Existing Collaboration Agreement and any Collaboration Agreements we may enter into in the Future**

***If the J&J License Agreement does not result in the successful development of PIPE-307, our business, financial condition and results of operations will be harmed.***

In February 2023, we entered into the J&J License Agreement with J&J, pursuant to which we received a non-refundable, non-creditable \$50.0 million payment in exchange for granting J&J exclusive worldwide rights to develop, manufacture, and commercialize products containing PIPE-307. Under the J&J License Agreement, we are also eligible to receive future milestone payments and tiered royalties in the low-double digit to high-teen percent range on net sales of products containing PIPE-307. J&J is generally responsible for all development, manufacturing, and commercialization activities for PIPE-307. We are conducting, at our own expense, a Phase 2 clinical trial of PIPE-307 for the potential treatment of RRMS, after which J&J may, in its sole discretion, further develop PIPE-307 for such indication. Therefore, even if our Phase 2 clinical trial of PIPE-307 shows positive results, J&J may decide not to further develop PIPE-307 for the potential treatment of RRMS. Further, J&J may prevent or discontinue such clinical trial if it has good faith concerns that such study presents safety risks or could present material adverse effects for the development or commercialization of PIPE-307 generally. Upon J&J deciding to conduct a first Phase 3 clinical trial for a product using PIPE-307, we have an opt-in right to fund a portion of all Phase 3 development costs and other subsequent development costs for PIPE-307 in exchange for increased royalties.

The success of our collaboration with J&J is dependent on J&J successfully completing clinical trials, obtaining regulatory approval and ultimately successfully manufacturing and commercializing PIPE-307. J&J's activities related to PIPE-307, and the benefits of the collaboration to us, are subject to all the risks relating to product development, regulatory approval and commercialization described in "Risks related to development, clinical testing, and regulatory approval" set forth above. In addition, our collaboration with J&J poses additional risks to us, including the following:

- J&J has significant discretion in determining the efforts and resources that it will apply to the collaboration;
- J&J may not perform its obligations as expected;
- the clinical trials conducted as part of the collaboration may not be successful;
- J&J may not pursue development and/or commercialization of PIPE-307 even if it achieves regulatory approval or may elect not to continue or renew development or commercialization of PIPE-307 based on clinical trial results, changes in J&J's strategic focus or available funding or external factors, such as an acquisition, that divert resources or create competing priorities;
- J&J may delay clinical trials for PIPE-307, provide insufficient funding for its clinical trials, stop a clinical trial or abandon PIPE-307, repeat or conduct new clinical trials or require a new formulation of PIPE-307 for clinical testing;
- we have limited access to, or are restricted from disclosing, certain information regarding J&J's development and commercialization of PIPE-307 as well as our own Phase 2 clinical trial of PIPE-307 for the potential treatment of RRMS and, consequently, we will have limited ability to inform our stockholders about the status or results of the clinical development of PIPE-307, including our existing Phase 2 clinical trial of PIPE-307 and any trial that J&J conducts with PIPE-307;
- J&J could independently develop, or develop with third parties, products that compete directly or indirectly with PIPE-307 if it believes that competitive products are more likely to be successfully developed or can be commercialized under terms that are more economically attractive than PIPE-307;
- J&J may view any drug candidates we develop by ourselves, or in collaboration with another third party, as competitive with its other drug candidates or products, which may cause J&J to cease to devote resources to the development and commercialization of PIPE-307;
- even if it obtains marketing approval for PIPE-307, J&J may not commit sufficient resources to the marketing, distribution and commercialization of PIPE-307;
- disagreements with J&J, including disagreements over proprietary rights, contract interpretation or the preferred course of development of any programs or drug candidates, may cause delays or termination of the research, development, manufacture or commercialization of PIPE-307, may lead to additional responsibilities for us with respect to the development of PIPE-307 or may result in litigation or arbitration, any of which would be time-consuming and expensive;
- J&J may not properly maintain or defend our intellectual property rights or may use our proprietary information in such a way as to invite litigation that could jeopardize or invalidate our intellectual property or proprietary information or expose us to potential litigation;
- disputes may arise with J&J with respect to the ownership of intellectual property developed pursuant to the collaboration;
- J&J may infringe the intellectual property rights of third parties, which may expose us to litigation and potential liability; and
- J&J may terminate the collaboration for convenience and, if terminated, we could be required to raise additional capital to pursue further development or commercialization of PIPE-307.

If our collaboration with J&J does not result in the successful development and commercialization of PIPE-307, or if J&J terminates its agreement with us, we may not receive any future milestone or royalty payments under the collaboration. If we do not receive the payments we expect under our collaboration with J&J, our business, financial condition and operating results will be adversely impacted and we may need additional resources to continue to develop PIPE-791 and our other drug candidates.

***We may not recognize the financial and other benefits of any additional collaborations or strategic alliances that we may enter into in the future for the development and commercialization of our drug candidates.***

The clinical trial and regulatory approval process and the potential manufacturing and commercialization of PIPE-791 in multiple indications and the other drug candidates we select for development will require the investment of substantial additional capital. In addition to the J&J License Agreement, we may seek and form additional strategic alliances, or create joint ventures or collaborations or enter into acquisitions or additional licensing arrangements with third parties that we believe will help to accelerate or augment our clinical trial, regulatory approval, manufacturing and commercialization efforts with respect to PIPE-791 and any future drug candidates that we elect to develop. These transactions can entail numerous operational and financial risks, and we cannot be certain that we will achieve the financial and other benefits that led us to enter into such arrangements.

We will face significant competition in seeking appropriate collaborators. We may not be successful in our efforts to establish future strategic partnerships or other alternative arrangements for our drug candidates because they may be deemed to be at too early of a stage of development for collaborative effort and third parties may not view our drug candidates as having the requisite potential to demonstrate safety and efficacy. Our ability to reach a definitive agreement for a collaboration will depend, among other things, upon our assessment of the collaborator's resources and expertise, the terms and conditions of the proposed collaboration and the proposed collaborator's evaluation of a number of factors. Those factors may include the following:

- the design or results of clinical trials for the drug candidate;
- the likelihood of approval of the drug candidate by the FDA or comparable foreign regulatory authorities;
- the potential market for the drug candidate;
- the costs and complexities of manufacturing and delivering such drug candidate to patients;
- the potential of competing products;
- the existence of uncertainty with respect to our ownership of, or the intellectual protection for, the drug candidate, which can exist if there is a challenge to such ownership or intellectual property rights without regard to the merits of the challenge; and
- industry and market conditions generally.

The collaborator may also consider alternative drug candidates or technologies for similar indications that may be available to collaborate on and whether such a collaboration could be more attractive than the one with us for our drug candidate. We may also be restricted under any license agreements from entering into agreements on certain terms, or at all, with potential collaborators.

As a result, we may not be able to negotiate collaborations on a timely basis, on acceptable terms, or at all. If we do not have sufficient funds, we may not be able to further develop our drug candidates or bring them to market and generate product revenue without collaborations. If we fail to enter into collaborations and do not have sufficient funds or expertise to undertake the necessary development and commercialization activities, we may not be able to further develop our drug candidates or bring them to market and generate product sales revenue, which would harm our business prospects, financial condition and results of operations.

Even if we do enter into a collaboration agreement for PIPE-791 or another drug candidate we select for development, we may not recognize the potential financial and other benefits of the collaboration. When we collaborate with a third party, we relinquish some or all of the control of the clinical trial and regulatory approval process and the potential manufacturing and commercialization of the drug candidate. In addition, all of the risks relating to product

development, regulatory approval and commercialization summarized and described in this report also apply to the activities of our collaborators. Further, the collaborator may terminate its agreement with us. As a result, a collaboration may not result in the successful development and commercialization of our drug candidate, and we may not receive any milestone or royalty payments under the collaboration. If we do not receive the payments we expect under these agreements, our development of drug candidates could be delayed and we may need additional resources to develop our drug candidates.

***We may seek to grow our business through in-licensing transactions or otherwise by acquiring drug candidates or complementary products, technologies or businesses. The failure to properly identify these drug candidates, products, technologies or businesses, as well as the failure to successfully complete transactions or to integrate any such drug candidates, products, technologies or businesses that we do in-license or acquire with our existing business, could harm our business, financial condition and operating results.***

In the future, we may enter into transactions to in-license or acquire rights to drug candidates or to complementary products or technologies, or to acquire other businesses. Even if we do identify suitable candidates, we may not be able to enter into such transactions on favorable terms, or at all. Any such in-licenses or acquisitions of drug candidates may not result in our ability to successfully develop and obtain regulatory approval for such drug candidates. In addition, any such transactions may not strengthen our financial position or our competitive position or commercialization efforts, and these transactions may be viewed negatively by analysts, investors, customers, or other third parties with whom we have relationships. We may decide to use our available cash resources or incur debt in connection with an in-licensing or acquisition transaction, be required to make significant milestone or royalty payments, or issue our common stock or other equity securities as consideration for the transaction, which would reduce our operating runway or the percentage ownership of our existing stockholders. We could incur losses resulting from undiscovered liabilities of the in-licensed or acquired drug candidate, product technology or the acquired business that are not covered adequately by the indemnification we may obtain from the licensor or seller of such assets or business. In addition, we may not be able to successfully integrate any acquired drug candidates, personnel, technologies, and operations into our existing business in an effective, timely, and nondisruptive manner. Such transactions may also divert management attention from day-to-day responsibilities, increase our expenses, and reduce our cash available for operations and other uses. We cannot predict the number, timing or size of future in-licenses or acquisitions or the effect that any such transactions might have on our business, financial condition and operating results.

### **Risks Related to our Intellectual Property**

***If we are unable to obtain, maintain and enforce intellectual property protection for our technology and drug candidates or if the scope of the intellectual property protection we obtain is not sufficiently broad, our competitors could develop and commercialize technology and products similar or identical to ours, and our ability to successfully commercialize and generate revenues from our drug candidates may be adversely affected.***

Our success depends in large part on our ability to obtain, maintain and enforce intellectual property protection for the technology and drug candidates we develop. We seek to protect our proprietary position by filing patent applications in the United States and abroad related to our technologies and drug candidates that are important to our business and by in-licensing intellectual property related to such technologies and drug candidates. If we are unable to obtain or maintain patent protection with respect to any proprietary technology or drug candidate, our business, financial condition, results of operations and prospects could be materially harmed.

The patent prosecution process is expensive, time-consuming, and complex, and we may not be able to file, prosecute, maintain, defend, or license all necessary or desirable patent applications at a reasonable cost or in a timely manner. It is also possible that we will fail to identify patentable aspects of our research and development output before it is too late to obtain patent protection. Moreover, in some circumstances, we do not have the right to control the preparation, filing, and prosecution of patent applications, or to maintain, enforce, and defend the patents, covering technology that we license from third parties. Therefore, these in-licensed patents, and applications may not be prepared, filed, prosecuted, maintained, defended, and enforced in a manner consistent with the best interests of our business.

The patent position of pharmaceutical and biotechnology companies generally is highly uncertain, involves complex legal and factual questions and has in recent years been the subject of much litigation. In addition, the scope of patent protection outside of the United States is uncertain and laws of foreign countries may not protect our rights to the same extent as the laws of the United States or vice versa. For example, European patent law restricts the patentability of methods of treatment of the human body more than U.S. law does. With respect to both owned and in-licensed patent rights, we cannot predict whether the patent applications we and our licensors are currently pursuing will issue as patents in any particular jurisdiction or whether the claims of any issued patents will provide sufficient protection from competitors.

Further, we may not be aware of all third-party intellectual property rights potentially relating to our drug candidates. In addition, publications of discoveries in the scientific literature often lag behind the actual discoveries, and patent applications in the United States and other jurisdictions are typically not published until 18 months after filing, or in some cases not published at all. Therefore, neither we nor our licensors can know with certainty whether either we or our licensors were the first to make the inventions claimed in the patents and patent applications we own or in-license now or in the future, or that either we or our licensors were the first to file for patent protection of such inventions. As a result, the issuance, scope, validity, enforceability, and commercial value of our owned and in-licensed patent rights are uncertain. Moreover, our owned and in-licensed pending and future patent applications may not result in patents being issued which protect our technology and drug candidates, in whole or in part, or which effectively prevent others from commercializing competitive technologies and products. Changes in either the patent laws or interpretation of the patent laws in the United States and other countries may diminish the value of our patents and our ability to obtain, protect, maintain, defend, and enforce our patent rights, narrow the scope of our patent protection and, more generally, could affect the value or narrow the scope of our patent rights.

Moreover, we or our licensors may be subject to a third-party pre-issuance submission of prior art to the United States Patent and Trademark Office (“USPTO”) or become involved in opposition, derivation, revocation, reexamination, *inter partes* review, post-grant review or interference proceedings challenging our patent rights or the patent rights of others. An adverse determination in any such submission, proceeding or litigation could reduce the scope of, or invalidate, our patent rights, allow third parties to commercialize our technology or drug candidates and compete directly with us, without payment to us, or result in our inability to manufacture or commercialize drugs without infringing third-party patent rights. If the breadth or strength of protection provided by our patents and patent applications is threatened, regardless of the outcome, it could dissuade companies from collaborating with us to license, develop or commercialize current or future drug candidates.

Additionally, the coverage claimed in a patent application can be significantly reduced before the patent is issued, and its scope can be reinterpreted after issuance. Even if our owned and in-licensed patent applications issue as patents, they may not issue in a form that will provide us with any meaningful protection, prevent competitors from competing with us or otherwise provide us with any competitive advantage. The issuance of a patent is not conclusive as to its inventorship, scope, validity or enforceability, and our owned and in-licensed patents may be challenged in the courts or patent offices in the United States and abroad. Such challenges may result in loss of exclusivity or freedom to operate or in patent claims being narrowed, invalidated or held unenforceable, in whole or in part, which could limit our ability to stop others from using or commercializing similar or identical technology and products, or limit the duration of the patent protection of our technology and drug candidates. Such proceedings also may result in substantial cost and require significant time from our management and employees, even if the eventual outcome is favorable to us. Given the amount of time required for the development, testing and regulatory review of new drug candidates, patents protecting such candidates might expire before or shortly after such candidates are commercialized. Furthermore, our competitors may be able to circumvent our owned or in-licensed patents by developing similar or alternative technologies or products in a non-infringing manner. As a result, our owned and in-licensed patent portfolio may not provide us with sufficient rights to exclude others from commercializing technology and products similar or identical to any of our technology and drug candidates.

***Patent terms may be inadequate to protect our competitive position on our drug candidates for an adequate amount of time.***

Patents have a limited lifespan. In the United States, if all maintenance fees are timely paid, the natural expiration of a patent is generally 20 years from its earliest United States non-provisional filing date. Various extensions may be available, but the life of a patent, and the protection it affords, is limited. Even if patents covering our drug candidates are obtained, once the patent life has expired, we may be open to competition from competitive products, including generics or biosimilars. Given the amount of time required for the development, testing, and regulatory review of new drug candidates, patents protecting such candidates might expire before or shortly after such candidates are commercialized. As a result, our owned and licensed patent portfolio may not provide us with sufficient rights to exclude others from commercializing products similar or identical to ours.

***If we do not obtain patent term extension in the United States under the Hatch-Waxman Act and in foreign countries under similar legislation, thereby potentially extending the term of our marketing exclusivity for any drug candidates we may develop, our business may be materially harmed.***

In the United States, the patent term of a patent that covers an FDA-approved drug may be eligible for limited patent term extension, which permits patent term restoration as compensation for the patent term lost during the FDA regulatory review process. The Drug Price Competition and Patent Term Restoration Act of 1984, also known as the Hatch-Waxman Act, permits a patent term extension of up to five years beyond the expiration of the patent. The length of the



patent term extension is related to the length of time the drug is under regulatory review. Patent extension cannot extend the remaining term of a patent beyond a total of 14 years from the date of product approval. In addition, only one patent applicable to an approved drug 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. Similar provisions are available in Europe and certain other non-United States jurisdictions to extend the term of a patent that covers an approved drug. While, in the future, if and when our drug candidates receive FDA approval, we expect to apply for patent term extensions on patents covering those drug candidates, there is no guarantee that the applicable authorities will agree with our assessment of whether such extensions should be granted, and even if granted, the length of such extensions. We may not be granted patent term extension either in the United States or in any foreign country because of, for example, failing to exercise due diligence during the testing phase or regulatory review process, failing to apply within applicable deadlines, failing to apply prior to expiration of relevant patents, or otherwise failing to satisfy applicable requirements. Moreover, the term of extension, as well as the scope of patent protection during any such extension, afforded by the governmental authority could be less than we request. If we are unable to obtain any patent term extension or the term of any such extension is less than we request, our competitors may obtain approval of competing products following the expiration of our patent rights, and our business, financial condition, results of operations, and prospects could be materially harmed.

It is possible that we will not obtain patent term extension under the Hatch-Waxman Act for a United States patent covering any of our drug candidates that we may identify even where that patent is eligible for patent term extension, or if we obtain such an extension, it may be for a shorter period than we had sought. Further, for our licensed patents, we may not have the right to control prosecution, including filing with the USPTO, of a petition for patent term extension under the Hatch-Waxman Act. Thus, if one of our licensed patents is eligible for patent term extension under the Hatch-Waxman Act, we may not be able to control whether a petition to obtain a patent term extension is filed, or obtained, from the USPTO.

Also, there are detailed rules and requirements regarding the patents that may be submitted to the FDA for listing in the Approved Drug Products with Therapeutic Equivalence Evaluations (“Orange Book”). We may be unable to obtain patents covering our drug candidates that contain one or more claims that satisfy the requirements for listing in the Orange Book. Even if we submit a patent for listing in the Orange Book, the FDA may decline to list the patent, or a manufacturer of generic drugs may challenge the listing. If one of our drug candidates is approved and a patent covering that drug candidate is not listed in the Orange Book, a manufacturer of generic drugs would not have to provide advance notice to us of any abbreviated new drug application filed with the FDA to obtain permission to sell a generic version of such drug candidate.

***Changes to patent laws in the United States and other jurisdictions could diminish the value of patents in general, thereby impairing our ability to protect our products.***

Changes in either the patent laws or interpretation of patent laws in the United States, including patent reform legislation such as the Leahy-Smith America Invents Act (“Leahy-Smith Act”) could increase the uncertainties and costs surrounding the prosecution of our owned and in-licensed patent applications and the maintenance, enforcement, or defense of our owned and in-licensed issued patents. The Leahy-Smith Act includes a number of significant changes to United States patent law. These changes include provisions that affect the way patent applications are prosecuted, redefine prior art, provide more efficient and cost-effective avenues for competitors to challenge the validity of patents, and enable third-party submission of prior art to the USPTO during patent prosecution, and additional procedures to attack the validity of a patent at USPTO-administered post-grant proceedings, including post-grant review, *inter partes* review, and derivation proceedings. Assuming that other requirements for patentability are met, prior to March 2013, in the United States, the first to invent the claimed invention was entitled to the patent, while outside the United States, the first to file a patent application was entitled to the patent. After March 2013, under the Leahy-Smith Act, the United States transitioned to a first-to-file system in which, assuming that the other statutory requirements for patentability are met, the first inventor to file a patent application will be entitled to the patent on an invention regardless of whether a third party was the first to invent the claimed invention. As such, the Leahy-Smith Act and its implementation could increase the uncertainties and costs surrounding the prosecution of our patent applications and the enforcement or defense of our issued patents, all of which could have a material adverse effect on our business, financial condition, results of operations, and prospects.

In addition, the patent positions of companies in the development and commercialization of biologics and pharmaceuticals are particularly uncertain. Recent U.S. Supreme Court rulings have narrowed the scope of 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, the laws and regulations governing patents could change in unpredictable ways that could have a material adverse effect on our patent rights and our ability to protect, defend and enforce our patent rights in the future.

***If we are unable to obtain licenses from third parties on commercially reasonable terms or fail to comply with our obligations under such agreements, our business could be harmed.***

It may be necessary for us to use the patented or proprietary technology of third parties to commercialize our products, in which case we would be required to obtain a license from these third parties. If we are unable to license such technology, or if we are forced to license such technology on unfavorable terms, our business could be materially harmed. If we are unable to obtain a necessary license, we may be unable to develop or commercialize the affected drug candidates, which could materially harm our business and the third parties owning such intellectual property rights could seek either an injunction prohibiting our sales or an obligation on our part to pay royalties and/or other forms of compensation. Even if we are able to obtain a license, it may be non-exclusive, thereby giving our competitors access to the same technologies licensed to us.

If we are unable to obtain rights to required third-party intellectual property rights or maintain the existing intellectual property rights we have, we may be required to expend significant time and resources to redesign our technology, drug candidates, or the methods for manufacturing them or to develop or license replacement technology, all of which may not be feasible on a technical or commercial basis. If we are unable to do so, we may be unable to develop or commercialize the affected technology and drug candidates, which could harm our business, financial condition, results of operations, and prospects significantly.

Additionally, if we fail to comply with our obligations under license agreements, our counterparties may have the right to terminate these agreements, in which event we might not be able to develop, manufacture or market, or may be forced to cease developing, manufacturing or marketing, any product that is covered by these agreements or may face other penalties under such agreements. Such an occurrence could materially adversely affect the value of the drug candidate being developed under any such agreement. Termination of these agreements or reduction or elimination of our rights under these agreements, or restrictions on our ability to freely assign or sublicense our rights under such agreements when it is in the interest of our business to do so, may result in our having to negotiate new or reinstated agreements with less favorable terms, cause us to lose our rights under these agreements, including our rights to important intellectual property or technology, or impede, or delay or prohibit the further development or commercialization of, one or more drug candidates that rely on such agreements.

***Although we are not currently involved in any litigation, we may become involved in lawsuits to protect or enforce our patent or other intellectual property rights, which could be expensive, time-consuming and unsuccessful.***

Competitors and other third parties may infringe, misappropriate or otherwise violate our issued patents or other intellectual property. As a result, we may need to file infringement, misappropriation or other intellectual property related claims, which can be expensive and time-consuming. Any claims we assert against perceived infringers could provoke such parties to assert counterclaims against us alleging that we infringe, misappropriate or otherwise violate their intellectual property. In addition, in a patent infringement proceeding, such parties could counterclaim that the patents we have asserted 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. Third parties may institute such claims before administrative bodies in the United States or abroad, even outside the context of litigation. Such mechanisms include re-examination, post-grant review, *inter partes* review, interference proceedings, derivation proceedings, and equivalent proceedings in foreign jurisdictions (e.g., opposition proceedings). The outcome following legal assertions of invalidity and unenforceability is unpredictable.

An adverse result in any such proceeding could put one or more of our owned patents at risk of being invalidated or interpreted narrowly and could put any of our owned patent applications at risk of not yielding an issued patent. A court may also refuse to stop the third party from using the technology at issue in a proceeding on the grounds that our owned patents do not cover such technology. 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 or trade secrets could be compromised by disclosure during this type of litigation. Any of the foregoing could allow such third parties to develop and commercialize competing technologies and products and have a material adverse impact on our business, financial condition, results of operations, and prospects.

Interference or derivation proceedings provoked by third parties or brought by us or declared by the USPTO may be necessary to determine the priority of inventions with respect to our patents or patent applications. An unfavorable outcome could require us to cease using the related technology or to attempt to license rights to it from the prevailing party. Our

business could be harmed if the prevailing party does not offer us a license on commercially reasonable terms or at all, or if a non-exclusive license is offered and our competitors gain access to the same technology. Our defense of litigation or interference or derivation proceedings may fail and, even if successful, may result in substantial costs, and distract our management and other employees. In addition, the uncertainties associated with litigation could have a material adverse effect on our ability to raise the funds necessary to continue our clinical trials, continue our research programs, license necessary technology from third parties, or enter into development partnerships that would help us bring our drug candidates to market.

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. There could also be public announcements of the results of hearings, motions, or other interim proceedings or developments. If securities analysts or investors perceive these results to be negative, it could have a material adverse effect on the price of our common stock.

***Third parties may initiate legal proceedings alleging that we are infringing, misappropriating or otherwise violating their intellectual property rights, the outcome of which would be uncertain and could have a material adverse effect on the success of our business.***

Our commercial success depends upon our ability to develop, manufacture, market and sell our drug candidates and use our proprietary technologies without infringing, misappropriating or otherwise violating the intellectual property and proprietary rights of third parties. There is considerable patent and other intellectual property litigation in the pharmaceutical and biotechnology industries. We may become party to, or threatened with, adversarial proceedings or litigation regarding intellectual property rights with respect to our technology and drug candidates, including interference proceedings, post grant review, *inter partes* review, and derivation proceedings before the USPTO and similar proceedings in foreign jurisdictions such as oppositions before the European Patent Office. Numerous U.S. and foreign issued patents and pending patent applications, which are owned by third parties, exist in the fields in which we are pursuing development candidates. As the biotechnology and pharmaceutical industries expand and more patents are issued, the risk increases that our technologies or drug candidates that we may identify may be subject to claims of infringement of the patent rights of third parties.

The legal threshold for initiating litigation or contested proceedings is low, so that even lawsuits or proceedings with a low probability of success might be initiated and require significant resources to defend. Litigation and contested proceedings can also be expensive and time-consuming, and our adversaries in these proceedings may have the ability to dedicate substantially greater resources to prosecuting these legal actions than we can. The risks of being involved in such litigation and proceedings may increase if and as our drug candidates near commercialization and as we gain the greater visibility associated with being a public company. Third parties may assert infringement claims against us based on existing patents or patents that may be granted in the future, regardless of merit. We may not be aware of all such intellectual property rights potentially relating to our technology and drug candidates and their uses, or we may incorrectly conclude that third party intellectual property is invalid or that our activities and drug candidates do not infringe such intellectual property. Thus, we do not know with certainty that our technology and drug candidates, or our development and commercialization thereof, do not and will not infringe, misappropriate or otherwise violate any third party's intellectual property.

Third parties may assert that we are employing their proprietary technology without authorization. There may be third-party patents or patent applications with claims to materials, formulations, methods of manufacture or methods for treatment related to the discovery, use or manufacture of the drug candidates that we may identify or related to our technologies. Because patent applications can take many years to issue, there may be currently pending patent applications which may later result in issued patents that the drug candidates that we may develop may be found to infringe. In addition, third parties may obtain patents in the future and claim that use of our technologies infringes upon these patents. Moreover, as noted above, there may be existing patents that we are not aware of or that we have incorrectly concluded are invalid or not infringed by our activities. If any third-party patents were held by a court of competent jurisdiction to cover, for example, the manufacturing process of the drug candidates that we may develop, any molecules formed during the manufacturing process or any final product itself, the holders of any such patents may be able to block our ability to commercialize such drug candidate unless we obtained a license under the applicable patents, or until such patents expire.

Parties making claims against us may obtain injunctive or other equitable relief, which could effectively block our ability to further develop and commercialize the drug candidates that we may identify. Defense of these claims, regardless of their merit, would involve substantial litigation expense and would be a substantial diversion of employee resources from our business. In the event of a successful claim of infringement against us, we may have to pay substantial damages, including treble damages and attorneys' fees for willful infringement, pay royalties, redesign our infringing products, or

obtain one or more licenses from third parties, which may be impossible or require substantial time and monetary expenditure.

We may choose to take a license or, if we are found to infringe, misappropriate or otherwise violate a third party's intellectual property rights, we could also be required to obtain a license from such third party to continue developing, manufacturing and marketing our technology and drug candidates. However, we may not be able to obtain any required license on commercially reasonable terms or at all. Even if we were able to obtain a license, it could be non-exclusive, thereby giving our competitors and other third parties access to the same technologies licensed to us and could require us to make substantial licensing and royalty payments. We could be forced, including by court order, to cease developing, manufacturing and commercializing the infringing technology or product. In addition, we could be found liable for significant monetary damages, including treble damages and attorneys' fees, if we are found to have willfully infringed a patent or other intellectual property right and could be forced to indemnify our customers or collaborators. A finding of infringement could prevent us from commercializing our drug candidates or force us to cease some of our business operations, which could materially harm our business. In addition, we may be forced to redesign our drug candidates, seek new regulatory approvals, and indemnify third parties pursuant to contractual agreements. Claims that we have misappropriated the confidential information or trade secrets of third parties could have a similar material adverse effect on our business, financial condition, results of operations, and prospects.

***Intellectual property litigation or other legal proceedings relating to intellectual property could cause us to spend substantial resources and distract our personnel from their normal responsibilities.***

Even if resolved in our favor, litigation or other legal proceedings relating to intellectual property claims may cause us to incur significant expenses and could distract our technical and management 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 substantial adverse effect on the price of our common stock. Such litigation or proceedings could substantially increase our operating losses and reduce the resources available for development activities or any future sales, marketing, or distribution activities. We may not have sufficient financial or other resources to conduct such litigation or proceedings adequately. 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 may also have an advantage in such proceedings due to their more mature and developed intellectual property portfolios. Uncertainties resulting from the initiation and continuation of intellectual property litigation or other proceedings could compromise our ability to compete in the marketplace.

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

Periodic maintenance, renewal and annuity fees and various other government fees on any issued patent and pending patent application must be paid to the USPTO and foreign patent agencies in several stages or annually over the lifetime of our owned and in-licensed patents and patent applications. The USPTO and various foreign governmental patent agencies require compliance with a number of procedural, documentary, fee payment and other similar provisions during the patent application process. In certain circumstances, we rely on our licensing partners to pay these fees to, or comply with the procedural and documentary rules of, the relevant patent agency. With respect to our patents, we rely on an annuity service, outside firms, and outside counsel to remind us of the due dates and to make payment after we instruct them to do so. While an inadvertent lapse can in many cases be cured by payment of a late fee or by other means in accordance with the applicable rules, there are situations in which noncompliance 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. Non-compliance events that could result in abandonment or lapse of a patent or patent application include failure to respond to official actions within prescribed time limits, non-payment of fees and failure to properly legalize and submit formal documents. In such an event, potential competitors might be able to enter the market with similar or identical products or technology. If we or our licensors fail to maintain the patents and patent applications covering our drug candidates, it would have a material adverse effect on our business, financial condition, results of operations, and prospects.

***We may not be able to protect our intellectual property and proprietary rights throughout the world.***

Filing, prosecuting, and defending patents on drug candidates in all countries throughout the world would be prohibitively expensive. In addition, the laws of some foreign countries do not protect intellectual property rights to the same extent as federal and state laws in the United States, and even where such protection is nominally available, judicial and governmental enforcement of such intellectual property rights may be lacking. Consequently, we may not be able to prevent third parties from practicing our inventions in all countries outside the United States, or from selling or importing



products made using our inventions in and into the United States or other jurisdictions. Competitors may use our technologies in jurisdictions where we have not obtained patent protection to develop their own products and, further, may export otherwise infringing products to territories where we have patent protection or licenses, but 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.

Many companies have encountered significant problems in protecting and defending intellectual property rights in foreign jurisdictions. The legal systems of certain countries, particularly certain developing countries, do not favor the enforcement of patents, trade secrets, and other intellectual property protection, particularly those relating to biotechnology products, which could make it difficult for us to stop the infringement of our patents or marketing of competing products in violation of our intellectual property and proprietary rights generally. In addition, certain jurisdictions do not protect, to the same extent or at all, inventions that constitute new methods of treatment.

Proceedings to enforce our intellectual property and proprietary 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. Accordingly, our efforts to enforce our intellectual property and proprietary rights around the world may be inadequate to obtain a significant commercial advantage from the intellectual property that we develop or license.

Many countries have compulsory licensing laws under which a patent owner may be compelled to grant licenses to third parties. In addition, many countries limit the enforceability of patents against government agencies or government contractors. In these countries, the patent owner may have limited remedies, which could materially diminish the value of such patent. If we or any of our licensors are forced to grant a license to third parties with respect to any patents relevant to our business, our competitive position may be impaired, and our business, financial condition, results of operations, and prospects may be adversely affected.

***We may be subject to claims challenging the inventorship or ownership of our patents and other intellectual property.***

We or our licensors may be subject to claims that former employees, collaborators or other third parties have an interest in our owned or in-licensed patents, trade secrets, or other intellectual property as an inventor or co-inventor. For example, we or our licensors may have inventorship disputes arise from conflicting obligations of employees, consultants or others who are involved in developing our drug candidates. Litigation may be necessary to defend against these and other claims challenging inventorship or our or our licensors' ownership of our owned or in-licensed patents, trade secrets, or other intellectual property. If we or our licensors fail in defending any such claims, in addition to paying monetary damages, we may lose valuable intellectual property rights, such as exclusive ownership of, or right to use, intellectual property that is important to our drug candidates. Even if we are successful in defending against such claims, litigation could result in substantial costs and be a distraction to management and other employees. Any of the foregoing could have a material adverse effect on our business, financial condition, results of operations and prospects.

***We may be subject to claims by third parties asserting that our employees, consultants or contractors have wrongfully used or disclosed confidential information of third parties, or we have wrongfully used or disclosed alleged trade secrets of their current or former employers, or claims asserting we have misappropriated their intellectual property, or claiming ownership of what we regard as our own intellectual property.***

Many of our employees, consultants and contractors were previously employed at universities or other pharmaceutical or biotechnology companies, including potential competitors. Although we try to ensure that our employees, consultants, and contractors do not use the proprietary information or know-how of others in their work for us, we may be subject to claims that these individuals or we have used or disclosed intellectual property, including trade secrets or other proprietary information, of any such individual's current or former employer. Litigation may be necessary to defend against these claims.

In addition, while it is our policy to require our employees, consultants and contractors who may be involved in the development of intellectual property to execute agreements assigning such intellectual property to us, we may be unsuccessful in executing such an agreement with each party who in fact develops intellectual property that we regard as our own. Our intellectual property assignment agreements with them may not be self-executing or may be breached, and we may be forced to bring claims against third parties, or defend claims they may bring against us, to determine the ownership of what we regard as our intellectual property. Such claims could have a material adverse effect on our business, financial conditions, results of operations, and prospects.



If we fail in prosecuting or defending any such claims, in addition to paying monetary damages, we may lose valuable intellectual property rights or personnel, which could have a material adverse effect on our competitive business position and prospects. Such intellectual property rights could be awarded to a third party, and we could be required to obtain a license from such third party to commercialize our technology or products, which license may not be available on commercially reasonable terms, or at all, or such license may be non-exclusive. Even if we are successful in prosecuting or defending against such claims, litigation could result in substantial costs and be a distraction to our management and employees.

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

In addition to seeking patents for some of our technology and drug candidates, we also rely on trade secrets and confidentiality agreements to protect our unpatented know-how, technology, and other proprietary information, to maintain our competitive position. We seek to protect our trade secrets and other proprietary technology, in part, by entering into non-disclosure and confidentiality agreements with parties who have access to them, such as our employees, corporate collaborators, outside scientific collaborators, CROs, contract manufacturers, consultants, advisors, and other third parties. We also enter into confidentiality and invention or patent assignment agreements with our employees and consultants. We cannot guarantee that we have entered into such agreements with each party that may have or has had access to our trade secrets or proprietary technology. Despite these efforts, any of these parties may breach the agreements and disclose our proprietary information, including our trade secrets, and we may not be able to obtain adequate remedies for such breaches. Detecting the disclosure or misappropriation of a trade secret and enforcing a claim that a party illegally disclosed or misappropriated a trade secret is difficult, expensive, and time-consuming, and the outcome is unpredictable. In addition, some courts inside and outside of the United States are less willing or unwilling to protect trade secrets. If any of our trade secrets were to be lawfully obtained or independently developed by a competitor or other third party, we would have no right to prevent them, or those to whom they communicate it, from using that technology or information to compete with us. If any of our trade secrets were to be disclosed to or independently developed by a competitor or other third party, our competitive position would be materially and adversely harmed.

***If our trademarks and trade names are not adequately protected, then we may not be able to build name recognition in our markets of interest and our business may be adversely affected.***

Our registered and unregistered trademarks or trade names may be challenged, infringed, circumvented, or declared generic or determined to be infringing on other marks. We may not be able to protect our rights to these trademarks and trade names, which we need to build name recognition among potential collaborators or customers in our markets of interest. At times, competitors may adopt trade names or trademarks similar to ours, thereby impeding our ability to build brand identity and possibly leading to market confusion. In addition, there could be potential trade name or trademark infringement claims brought by owners of other registered trade names or trademarks that incorporate variations of our unregistered trade names or trademarks. Over the long term, if we are unable to successfully register our trade names and trademarks and establish name recognition based on our trade names and trademarks, then we may not be able to compete effectively, and our business may be adversely affected. Our efforts to enforce or protect our proprietary rights related to trade names and trademarks may be ineffective and could result in substantial costs and diversion of resources and could adversely impact our financial condition or 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:

- 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 in-licensed intellectual property rights;
- it is possible that our owned and in-licensed pending patent applications or those we may own or in-license in the future 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 cannot ensure that any of our pending patent applications, if issued, or those of our licensors, will include claims having a scope sufficient to protect our drug candidates;
- we cannot ensure that any patents issued to us or our licensors will provide a basis for an exclusive market for our commercially viable drug candidates or will provide us with any competitive advantages;
- we cannot ensure that our commercial activities or drug candidates will not infringe upon the patents of others;
- we cannot ensure that we will be able to successfully commercialize our drug candidates on a substantial scale, if approved, before the relevant patents that we own, or license expire;
- 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 our Dependence on Third Parties**

***We currently rely on third-party CMOs for the production of clinical supplies of PIPE-791 and PIPE-307 and we intend to rely on CMOs for our future drug candidates, as well as to supply the raw materials necessary to produce our drug candidates. We may elect to continue to rely on CMOs for the production of commercial supplies of PIPE-791, if approved. Our dependence on CMOs may impair our development of drug candidates and may impair their commercialization, which would adversely impact our business and financial position.***

We do not own facilities to manufacture PIPE-791, PIPE-307 or any of our drug candidates in development. Instead, we rely on and expect to continue to rely on CMOs for the supply of cGMP grade clinical trial materials of PIPE-791 and any other drug candidates we develop. We have relied on CMOs to supply the clinical trial materials for our Phase 2 clinical trial of PIPE-307 and, going forward, J&J may continue to rely on CMOs for the future development, manufacture and potential commercialization of PIPE-307. We intend to continue to rely on CMOs for the production of commercial supplies of PIPE-791, if approved. Reliance on CMOs may expose us to more risk than if we were to manufacture our drug candidates ourselves. If any CMO we engage is unable to provide sufficient supply of any drug candidate we develop, we may be unable to arrange for an alternative supply or to do so on commercially reasonable terms or in a timely manner, which could delay any clinical trials, the commercial launch of a drug candidate, if approved, or, regarding any commercial supply, result in a shortage in supply that could negatively impact our revenues. Transitioning to a new CMO for a drug candidate is time consuming and costly. We have identified, but have not contracted with, other CMOs as back-up for the manufacture and supply of PIPE-791. As a result, if the CMO currently involved in the manufacture and supply of PIPE-791, WuXi AppTec, experiences a delay or disruption, we may not have sufficient quantities of PIPE-791 for our clinical trials and may not be able to transition to a new CMO in a timely or cost-effective manner, or at all, which would negatively impact our ability to develop, complete our planned clinical trials for PIPE-791.

Similarly, we contract for the supply of the APIs and other raw materials necessary to produce PIPE-791. We currently intend to contract in the future for the supply of these APIs and other raw materials for any other drug candidate we develop. Supplies of our APIs or other raw materials could be interrupted from time to time and we cannot be certain that alternative supplies could be obtained within a reasonable time frame, at an acceptable cost, or at all. In addition, a disruption in the supply of any required API or other raw material could delay the commencement of a planned clinical trial or the delay the commercial launch of a drug candidate, if approved, or result in a shortage in supply, which would impair our ability to generate revenues. Growth in the costs and expenses of our APIs or other raw materials may also impair our

ability to cost-effectively manufacture a drug candidate. In addition, there may be a limited number of suppliers for the APIs or other raw materials that we may use to manufacture a drug candidate, and we cannot be certain that we will be able to engage such suppliers in a timely manner or at all. If we are unable to do so, clinical development of a drug candidate, commercialization for any approved product, or our business could be adversely affected.

The facilities used to manufacture the drug candidates we develop, as well as the included APIs, must be inspected by the FDA and comparable foreign regulatory authorities. While we provide oversight of manufacturing activities, we do not and will not control the execution of manufacturing activities by, and are or will be dependent on, our CMOs for compliance with cGMP requirements for the manufacture of a drug candidate. In addition, we have limited control over the ability of our CMOs to maintain adequate quality control, quality assurance, and qualified personnel, and we were not involved in developing our CMOs' policies and procedures. As a result, we are subject to the risk that a drug candidate may have manufacturing defects that we have limited ability to prevent. If a CMO cannot successfully manufacture material that conforms to our specifications and the regulatory requirements, we will not be able to secure or maintain regulatory approval for the use of the drug candidate in clinical trials, or for commercial distribution of the drug candidate, if approved.

If the FDA or comparable foreign regulatory authority finds deficiencies with or does not approve these facilities for the manufacture of the drug candidates we develop or if it withdraws any such approval or finds deficiencies in the future, we may need to find alternative manufacturing facilities, which would delay our development program and planned clinical trials and significantly impact our ability to develop, obtain regulatory approval for, or commercialize such drug candidates, if approved. In addition, any failure to achieve and maintain compliance with laws, regulations, and standards related to manufacturing could subject us to risks, including the risk that we may have to suspend the manufacture of a drug candidate, that obtained approvals could be revoked, and that the FDA or another governmental regulatory authority may take enforcement actions, including untitled letters, warning letters, seizures, injunctions, or product recalls. In addition, foreign CMOs may be subject to U.S. legislation, sanctions, trade restrictions and other foreign regulatory requirements which could increase the cost or reduce the supply of material available to us, delay the procurement or supply of such material or have an adverse effect on our ability to secure significant commitments from governments to purchase our potential therapies. For example, if enacted, legislation pending in Congress known as the BIOSECURE Act would prohibit U.S. federal agencies from entering into or renewing a contract with any company that uses biotechnology equipment or services produced or provided by a "biotechnology company of concern" in the performance of that contract. It would also prohibit loans or grant funding from U.S. federal agencies to entities that use any biotechnology equipment or services produced or provided by a "biotechnology company of concern" in the performance of the government grant or loan. The effects of this legislation, if enacted, is unknown; however, it could have the downstream effect of restricting the ability of pharmaceutical companies that enter into contracts with or receive funding from U.S. federal agencies from purchasing services or equipment from certain Chinese biotechnology companies, including those that are specifically named in the proposed BIOSECURE Act, as well as supply chain disruptions or delays. The current version of the BIOSECURE Act introduced in the House of Representatives names WuXi Biologics and WuXi AppTec, our current CMO for the manufacture and supply of PIPE-791 as "biotechnology companies of concern" and includes a grandfathering provision allowing biotechnology equipment and services provided or produced by named "biotechnology companies of concern" under a contract or agreement entered into before the effective date until January 1, 2032. Depending on whether the BIOSECURE Act becomes law, what the final language of the BIOSECURE Act includes, and how the law is interpreted by U.S. federal agencies, we could be potentially restricted from pursuing U.S. federal government business or government reimbursement for our products in the future if we continue to use WuXi Biologics, WuXi AppTec or other suppliers or partners identified as "biotechnology companies of concern" beyond this grandfathering period. In addition to the BIOSECURE Act, any additional executive action, legislative action, or potential sanctions with China could materially impact our work with WuXi AppTec. U.S. executive agencies have the ability to designate entities and individuals on various governmental prohibited and restricted parties lists. Depending on the designation, potential consequences can range from a comprehensive prohibition on all transactions or dealings with designated parties, or a limited prohibition on certain types of activities, such as exports and financing activities, with designated parties. Furthermore, CMOs may breach existing agreements they have with us because of factors beyond our control. They may also terminate or refuse to renew their agreement at a time that is costly or otherwise inconvenient for us. If we were unable to find an adequate CMO or another acceptable solution in time, our clinical trials could be delayed, or our commercial activities could be harmed.

Finding new CMOs or third-party suppliers involves additional cost and requires our management's time and focus. In addition, there is typically a transition period when a new CMO commences work. Although we have not, and do not intend to, begin a clinical trial unless we believe we have on hand, or will be able to obtain, a sufficient supply of the drug candidate to complete the clinical trial, any significant delay in the supply of the drug candidate or the raw materials needed to produce the drug candidate, could adversely affect our business in a number of ways, including but not limited to:

- an inability to initiate or continue clinical trials of our drug candidates under development;
- delay in submitting regulatory applications, or receiving marketing approvals, for our drug candidates;
- loss of the cooperation of an existing or future collaborator;
- subjecting third-party manufacturing facilities or our manufacturing facilities to additional inspections by regulatory authorities;
- economic loss and additional costs resulting from starting materials, intermediates, API or drug product that cannot be used in clinical trials or for other purposes;
- requirements to cease development or to recall batches of our drug candidates; and
- in the event of approval to market and commercialize our drug candidates, an inability to meet commercial demands for our product or any other future drug candidates.

As part of their manufacture of our drug candidates, our CMOs and third-party suppliers are expected to comply with and respect the proprietary rights of others. If a CMO or third-party supplier fails to acquire the proper licenses or otherwise infringes the proprietary rights of others in the course of providing services to us, we may have to find alternative CMOs or third-party suppliers or defend against claims of infringement, either of which would significantly impact our ability to develop, complete our planned clinical trials, obtain regulatory approval for, or commercialize a drug candidate, if approved.

***We rely on third parties to conduct our ongoing clinical trials of PIPE-791 and PIPE-307 and expect to rely on third parties to conduct future clinical trials of PIPE-791 and any other drug candidates that we develop. If these third parties do not successfully carry out their contractual duties, comply with regulatory requirements or meet expected deadlines, we may not be able to obtain regulatory approval for or commercialize the drug candidates we develop and our business could be substantially harmed.***

We do not have the ability to independently conduct clinical trials. We rely and expect to continue to rely on medical institutions, clinical investigators, contract laboratories and other third parties, such as CROs, to conduct or otherwise support clinical trials for the drug candidates we develop. We may also rely on academic and private non-academic institutions to conduct and sponsor clinical trials relating to these drug candidates. We will not control the design or conduct of the investigator-sponsored trials, and it is possible that the FDA or non-U.S. regulatory authorities will not view these investigator-sponsored trials as providing adequate support for future clinical trials, whether controlled by us or third parties, for any one or more reasons, including elements of the design or execution of the trials or safety concerns or other trial results.

Such arrangements will likely provide us certain information rights with respect to the investigator-sponsored trials, including access to and the ability to use and reference the data, including for our own regulatory filings, resulting from the investigator-sponsored trials. However, we would not have control over the timing and reporting of the data from investigator-sponsored trials, nor would we own the data from the investigator-sponsored trials. If we are unable to confirm or replicate the results from the investigator-sponsored trials or if negative results are obtained, we would likely be further delayed or prevented from advancing further clinical development of our drug candidates. Further, if investigators or institutions breach their obligations with respect to the clinical development of our drug candidates, or if the data prove to be inadequate compared to the first-hand knowledge we might have gained had the investigator-sponsored trials been sponsored and conducted by us, then our ability to design and conduct any future clinical trials ourselves may be adversely affected.

We rely and expect to continue to rely heavily on these parties for execution of clinical trials for the drug candidates we develop and control only certain aspects of their activities. Nevertheless, we are responsible for ensuring that each of our clinical trials is conducted in accordance with the applicable protocol, legal and regulatory requirements and scientific

standards, and our reliance on CROs will not relieve us of our regulatory responsibilities. For any violations of laws and regulations during the conduct of our clinical trials, we could be subject to warning letters or enforcement action that may include civil penalties up to and including criminal prosecution.

We, our principal investigators and our CROs are required to comply with regulations, including GCPs for conducting, monitoring, recording and reporting the results of clinical trials to ensure that the data and results are scientifically credible and accurate, and that the trial patients are adequately informed of the potential risks of participating in clinical trials and their rights are protected. These regulations are enforced by the FDA and similar regulatory authorities in foreign countries. These regulatory authorities enforce GCP regulations through periodic inspections of clinical trial sponsors, principal investigators and trial sites. If we, our principal investigators or our CROs fail to comply with applicable GCPs, the clinical data generated in our clinical trials may be deemed unreliable and the FDA or similar foreign regulatory authorities may require us to perform additional clinical trials before approving our marketing applications. We cannot assure you that, upon inspection, these regulatory authorities will determine that any of our future clinical trials will comply with GCPs. In addition, our clinical trials must be conducted with drug candidates produced under cGMP regulations. Our failure or the failure of our principal investigators or CROs to comply with these regulations may require us to repeat clinical trials, which would delay the regulatory approval process and could also subject us to enforcement action. We also are required to register ongoing clinical trials and post the results of completed clinical trials on a government-sponsored database, ClinicalTrials.gov, within certain timeframes. Failure to do so can result in fines, adverse publicity and civil and criminal sanctions.

Although we designed our first-in-human clinical trials of PIPE-791 and PIPE-307, and intend to design the future clinical trials for the drug candidates that we develop, we expect that CROs will conduct all of our clinical trials. J&J will be responsible for designing any future clinical trials of PIPE-307. As a result, many important aspects of our development programs, including their conduct and timing, are outside of our direct control. Our reliance on third parties to conduct future clinical trials also results in less direct control over the management of data developed through clinical trials than would be the case if we were relying entirely upon our own staff. Communicating with outside parties can also be challenging, potentially leading to mistakes as well as difficulties in coordinating activities. Outside parties may:

- have staffing difficulties;
- fail to comply with contractual obligations;
- experience regulatory compliance issues;
- undergo changes in priorities or become financially distressed; or
- form relationships with other entities, some of which may be our competitors.

These factors may materially adversely affect the willingness or ability of third parties to conduct our clinical trials and may subject us to unexpected cost increases that are beyond our control. If the principal investigators or CROs do not perform clinical trials in a satisfactory manner, breach their obligations to us or fail to comply with regulatory requirements, the development, regulatory approval and commercialization of our drug candidates may be delayed, we may not be able to obtain regulatory approval and commercialize our drug candidates, or our development program may be materially and irreversibly harmed. If we are unable to rely on clinical data collected by our principal investigators or CROs, we could be required to repeat, extend the duration of, or increase the size of any clinical trials we conduct and this could significantly delay commercialization and require significantly greater expenditures.

If any of our relationships with these third-party principal investigators or CROs terminate, we may not be able to enter into arrangements with alternative CROs. If principal 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 clinical data they obtain is compromised due to the failure to adhere to our clinical protocols, regulatory requirements or for other reasons, any clinical trials such principal investigators or CROs are associated with may be extended, delayed or terminated, and we may not be able to obtain regulatory approval for or successfully commercialize our drug candidates. As a result, we believe that our financial results and the commercial prospects for our drug candidates in the subject indication would be harmed, our costs could increase and our ability to generate revenue could be delayed.



***We intend to rely on CROs, and other third parties to conduct our preclinical studies. If those third parties do not successfully carry out their contractual duties, or if they perform in an unsatisfactory manner, it may harm our business.***

We rely, and will continue to rely, on CROs, CRO-contracted vendors, to conduct preclinical studies on the drug candidates we develop. Our reliance on CROs for preclinical development activities limits our control over these activities and we were not involved in developing our CRO's policies and procedures, but we remain responsible for ensuring that each of our preclinical studies is conducted in accordance with the applicable protocol and legal, regulatory, and scientific standards.

We and our CROs will be required to comply with the GLP requirements for our preclinical studies, which are regulations and guidelines enforced by the FDA and are also required by comparable foreign regulatory authorities. Our CROs are not our employees, and we do not control whether they devote sufficient time and resources to our preclinical studies. Our CROs may also have relationships with other commercial entities, including our competitors, for whom they may also be conducting preclinical studies, clinical trials, or other drug development activities, which could harm our competitive position. We face the risk of potential unauthorized disclosure or misappropriation of our intellectual property by CROs, which may reduce our trade secret protection and allow our potential competitors to access and exploit our proprietary technology. If our CROs do not successfully carry out their contractual duties or obligations, or fail to meet expected deadlines, or if the quality or accuracy of the preclinical data they obtain is compromised due to the failure to adhere to our protocols or regulatory requirements or for any other reason, our ability to generate the preclinical data to advance the development of our drug candidates will be harmed.

If our relationship with any CROs terminates, we may not be able to enter into arrangements with alternative CROs or do so on commercially reasonable terms. Switching or adding additional CROs involves substantial cost and requires management's time and focus. In addition, there is a natural transition period when a new CRO commences work. As a result, delays occur, which can materially impact our ability to meet our desired preclinical development timelines. Though we intend to carefully manage our relationships with our CROs, there can be no assurance that we will not encounter challenges or delays in the future or that these delays or challenges will not have an adverse impact on our business, financial condition, and prospects.

***Our third-party manufacturers may be unable to successfully scale-up manufacturing of our drug candidates in sufficient quality and quantity, which could delay or prevent us from developing our drug candidates and commercializing approved products, if any.***

In order to conduct clinical trials for the drug candidates we are developing, we will need to manufacture them in large quantities. Quality issues may arise during scale-up activities. Our reliance on a limited number of manufacturers, the complexity of drug manufacturing and the difficulty of scaling up a manufacturing process could cause the delay of clinical trials, regulatory submissions, required licensure, or commercialization of our drug candidates, cause us to incur higher costs and prevent us from commercializing our drug candidates successfully. Furthermore, if our manufacturing partners fail to deliver the required commercial quality and quantities of materials on a timely basis and at commercially reasonable prices, and we are unable to secure one or more replacement manufacturer capable of production in a timely manner at a substantially equivalent cost, then testing and clinical trials of that drug candidate may be delayed or infeasible, and regulatory licensure or commercial launch of any resulting product may be delayed or not obtained, which could significantly harm our business.

***Manufacturing of the API for PIPE-791 takes place in China, through a sole third-party manufacturer. A significant disruption in the operation of this manufacturer could materially adversely affect our business, financial condition and results of operations.***

We currently contract manufacturing operations to third parties, and the manufacturing of the API for PIPE-791 is completed by a third party located in China. Any disruption in production or inability of this manufacturer to produce adequate quantities to meet our needs could impair our ability to further development of PIPE-791. Furthermore, since this third-party manufacturer is located in China, we are exposed to the possibility of product supply disruption and increased costs in the event of changes in the policies of the U.S. or Chinese governments, political unrest or unstable economic conditions in China. The U.S. government has recently made statements and taken certain actions that may lead to potential changes to U.S. and international trade policies, including imposing several rounds of tariffs and export control and sanctions restrictions affecting certain products manufactured in China. Both China and the United States have each imposed tariffs indicating the potential for further trade barriers, including the U.S. Commerce Department adding numerous Chinese entities to its Unverified List, which requires U.S. exporters to go through more procedures before exporting goods to such entities. It is unknown whether and to what extent new tariffs, export controls, or other new laws or

regulations, including the BIOSECURE Act, will be adopted, or the effect that any such actions would have on us or our industry. See the risk factor titled “We currently rely on third-party CMOs for the production of clinical supplies of PIPE-791 and PIPE-307 and we intend to rely on CMOs for our future drug candidates, as well as to supply the raw materials necessary to produce our drug candidates. We may elect to continue to rely on CMOs for the production of commercial supplies of PIPE-791, if approved. Our dependence on CMOs may impair our development of drug candidates and may impair their commercialization, which would adversely impact our business and financial position.”

***Our employees and independent contractors, including principal investigators, CROs, consultants, vendors, and any third parties we may engage in connection with development and commercialization may engage in misconduct or other improper activities, including noncompliance with regulatory standards and requirements, which could have a material adverse effect on our business.***

Our employees and independent contractors, including principal investigators, CROs, consultants, vendors, and any third parties we may engage in connection with development and commercialization of the drug candidates we develop, could engage in misconduct, including intentional, reckless, or negligent conduct or unauthorized activities that violate applicable laws, rules, and regulations including: the laws and regulations of the FDA or other similar regulatory requirements of other authorities, including those laws that require the reporting of true, complete, and accurate information to such authorities; manufacturing standards; data privacy, security, fraud and abuse, and other healthcare laws and regulations; or laws that require the reporting of true, complete, and accurate financial information and data. Specifically, 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 may restrict or prohibit a wide range of pricing, discounting, marketing and promotion, sales commission, customer incentive programs, and other business arrangements. Activities subject to these or other laws could also involve the improper use or misrepresentation of information obtained in the course of clinical trials, creation of fraudulent data in preclinical studies or clinical trials, or illegal misappropriation of drug product, which could result in regulatory sanctions and cause serious harm to our reputation. It is not always possible to identify and deter misconduct by employees and other third parties, and the precautions we take to detect and prevent this activity may not be effective 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 such laws or regulations. Additionally, we are subject to the risk that a person or government agency could allege such fraud or other misconduct, even if none occurred. If any such actions are instituted against us or them and we are not successful in defending ourselves or asserting our rights, those actions could have a significant impact on our business and results of operations, including the imposition of significant civil, criminal, and administrative penalties, damages, monetary fines, possible exclusion from participation in Medicare, Medicaid, other U.S. federal healthcare programs or healthcare programs in other jurisdictions, individual imprisonment, other sanctions, contractual damages, reputational harm, diminished profits and future earnings, and curtailment of our operations.

#### **Risks Related to Healthcare Laws and Other Legal Compliance Matters**

***Recent and future changes in healthcare legislation and regulations may increase the difficulty and cost to obtain marketing approval for a drug candidate, increase the costs to commercialize an approved product, and adversely affect the price set for such product.***

In the United States and other jurisdictions, there have been, and we expect there will continue to be, a number of legislative and regulatory changes to the healthcare system that could impact the future results of our operations. In particular, there have been and continue to be a number of initiatives at the U.S. federal and state levels with the stated objective to reduce healthcare costs and improve the quality of healthcare. For example, in March 2010, the Patient Protection and Affordable Care Act (“ACA”) was enacted, which substantially changed the way healthcare is financed by both governmental and private insurers. Provisions of the ACA with importance to the biotechnology and pharmaceutical industries include, among others:

- an annual, non-deductible fee payable by any entity that manufactures or imports certain branded prescription drugs or biologic agents;
- an increase in the statutory minimum rebates a manufacturer must pay under the Medicaid Drug Rebate Program;
- the requirement of a distinct calculation for rebates owed by manufacturers under the Medicaid Drug Rebate Program for drugs and biologics that are inhaled, infused, instilled, implanted, or injected; and
- a Medicare Part D coverage gap discount program, under which manufacturers must agree to offer certain discounts on applicable branded drugs to eligible beneficiaries during their coverage gap period.

The ACA and its implementation continue to evolve as a result of legislative, administrative, and judicial developments. Further changes remain possible, which may potentially negatively affect pricing, coverage, or reimbursement for PIPE-791 and/or PIPE-307.

In addition to the ACA, U.S. governments continue to seek to adopt healthcare policies and reforms intended to curb healthcare costs, such as federal or state controls on payment for drugs (including under Medicare, Medicaid, and commercial health plans). For example, the Budget Control Act of 2011 resulted in aggregate reductions, or sequestration, of Medicare payments to providers. Sequestration is currently set at 2% and will increase to 2.25% for the first half of fiscal year 2030, to 3% for the second half of fiscal year 2030, and to 4% for the remainder of the sequestration period that lasts through the first six months of fiscal year 2031. In January 2013, the American Taxpayer Relief Act of 2012 was signed into law, which, among other things, adjusted Medicare payments to several types of 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.

More recently, the Inflation Reduction Act of 2022 (“IRA”) requires, among other things, the U.S. Secretary of the Department of HHS to negotiate, with respect to Medicare units and subject to a specified cap, the price of a set number of certain high spend Medicare Part B and D drugs and biologicals per year (the Maximum Fair Price), with prices taking effect starting in 2026. Though the IRA explicitly excludes from price negotiation orphan drugs designated for only one rare disease or condition and for which the only active approved indications are for such disease or condition, drugs with multiple orphan designations or non-orphan indications are not excluded from drug price negotiation, which may affect the profitability of pursuing multiple orphan designations or non-orphan indications for an orphan drug. Failure to comply with requirements under the drug price negotiation program could subject us to an excise tax and/or a civil monetary penalty. The IRA also makes several changes to the Medicare Part D benefit, including capping patient out-of-pocket spending at \$2,000 beginning in 2025, subject to annual increases tied to aggregate Part D expenditures, while imposing new discount obligations for pharmaceutical manufacturers and payors (and sunseting the coverage gap and coverage gap discount program), which could negatively affect our business and financial condition. If we are not in compliance with obligations under the Medicare Part D benefit redesign, we could be subject to civil monetary penalties. In addition, the IRA establishes Medicare Part B and Part D inflation rebate schemes, under which manufacturers will owe rebates to Medicare if, generally speaking, the average sales price of a Part B drug, or the annualized average manufacturer price of a Part D drug, increases faster than the pace of inflation. The failure to timely pay an inflation rebate may result in a civil monetary penalty. Since the IRA was enacted, the Centers for Medicare & Medicaid Services (“CMS”) has taken various steps to implement the drug pricing provisions of the law. This includes, on a quarterly basis, releasing a list of Medicare Part B products that had an adjusted coinsurance rate based on the inflationary rebate provisions of the IRA, as well as guidance and regulations governing the same issuing guidance detailing the requirements and parameters of the first rounds of price negotiations and effectuation of the Maximum Fair Price and negotiating the Maximum Fair Price for the first 10 drugs subject to negotiation and releasing the list of next 15 drugs. While it remains to be seen how the drug pricing provisions imposed by the IRA will affect the broader pharmaceutical industry (including orphan drug development), several pharmaceutical manufacturers and other industry stakeholders have challenged the law, including through lawsuits brought against federal agencies challenging the constitutionality and administrative implementation of the IRA’s drug price negotiation provisions. The IRA and any other similar laws introduced in the future may result in additional reductions in Medicare and other healthcare funding, which could negatively affect our future revenues and results of operations.

Individual states in the United States have also become increasingly aggressive in seeking to pass legislation and implementing regulations designed to control pharmaceutical and biological product pricing. Such measures could harm our business, results of operations, financial condition, and prospects. For example, an emerging trend at the state level is the establishment of prescription drug affordability boards, some of which will prospectively permit certain states to establish upper payment limits for drugs that the state has determined to be “high-cost”. We expect that additional state reform measures will be adopted in the future, any of which could limit the amounts that state governments will pay for healthcare products and services, which could result in reduced demand or lower pricing for our drug candidates, or additional pricing pressures.

In markets outside of the United States, reimbursement and healthcare payment systems vary significantly by country, and many countries have instituted price ceilings on specific products and therapies. We cannot predict the likelihood, nature, or extent of government regulation that may arise from future legislation or administrative action in the United States or any other jurisdiction. If we or any third parties we may engage are slow or unable to adapt to changes in existing requirements or the adoption of new requirements or policies, or if we or such third parties are not able to maintain regulatory compliance, our drug candidates may lose any regulatory approval that may have been obtained and we may not achieve or sustain profitability.

***Our business operations and current and future relationships with contractors, investigators, healthcare professionals, consultants, third-party payors, patient organizations, customers, and others will be subject to applicable healthcare regulatory laws, which could expose us to penalties.***

Our business operations and current and future arrangements with contractors, investigators, healthcare professionals, consultants, third-party payors, patient organizations, and customers may expose us to broadly applicable fraud and abuse and other healthcare laws and regulations. These laws may constrain the business or financial arrangements and relationships through which we conduct our operations, including how we research, market, sell, and distribute our drug candidates, as well as our customer support and physician consulting arrangements. Such laws include:

- the U.S. federal AKS, a criminal law which prohibits, among other things, persons or entities from knowingly and willfully soliciting, offering, receiving, or providing any remuneration (including any kickback, bribe, or anything of value), directly or indirectly, overtly or covertly, in cash or in kind, to induce or reward, or in return for, either the referral of an individual for, or the purchase, lease, order, arrangement, or recommendation of, any good, facility, item or service for which payment may be made, in whole or in part, under U.S. federal and state healthcare programs (such as Medicare and Medicaid). A person or entity does not need to have actual knowledge of the statute or specific intent to violate it in order to have committed a violation. The AKS has been interpreted to apply to arrangements between pharmaceutical manufacturers or their agents and prescribers, purchasers and formulary or benefit managers, among other parties;
- the U.S. federal false claims and civil monetary penalties laws, including the FCA, which prohibits any person from, among other things, knowingly presenting, or causing to be presented false or fraudulent claims for payment of government funds; knowingly making, using or causing to be made or used, a false record or statement material to an obligation to pay money to the government or knowingly and improperly avoiding, decreasing or concealing an obligation to pay money to the U.S. federal government. In addition, any claims submitted as a result of a violation of the AKS constitute false claims and are subject to enforcement under the FCA. Pharmaceutical manufacturers can be held liable under the FCA even when they do not submit claims directly to government payors if they are deemed to “cause” the submission of false or fraudulent claims. The FCA can be enforced by the U.S. Department of Justice or through whistleblower or qui tam actions filed by private citizens on behalf of the federal government;
- certain criminal provisions enacted as part of the U.S. federal Health Insurance Portability and Accountability Act of 1996, as amended (“HIPAA”), prohibit, among other things, knowingly and willfully executing or attempting to execute a scheme to defraud any healthcare benefit program, knowingly and willfully embezzling or stealing from a health care benefit program, willfully obstructing a criminal investigation of a health care offense, or knowingly and willfully making false statements relating to healthcare matters, regardless of the payor (e.g., public or private). Similar to the AKS, a person or entity does not need to have actual knowledge of the statute or specific intent to violate it in order to have committed a violation;
- HIPAA and the respective implementing regulations, which impose, among other things, specified requirements relating to privacy, security and breaches of individually identifiable health information by covered entities subject to the rule, such as health plans, healthcare clearinghouses and healthcare providers as well as their business associates that perform certain services involving the creation, receipt, maintenance, or transmission of protected health information. HIPAA provides for criminal penalties, as well as civil monetary penalties, and is enforced by the Office of Civil Rights within the HHS as well as state attorneys general, which can file civil actions for damages or injunctions in federal courts and seek attorneys’ fees and costs associated with pursuing federal civil actions;
- Under, section 5 of the FTC Act, the FTC expects a company's data privacy and security measures to be reasonable and appropriate in light of the sensitivity and volume of consumer information it holds, the size and complexity of its business, and the cost of available tools to improve security and reduce vulnerabilities. Failure to meet these standards may constitute unfair or deceptive acts or practices in violation of the FTC Act. The FTC also has the power to enforce the Health Breach Notification Rule, which imposes notification obligations on companies for breaches of certain health information contained in personal health records;
- the FDCA, which prohibits, among other things, the adulteration or misbranding of drugs, biologics, and medical devices;



- federal consumer protection and unfair competition laws, which broadly regulate marketplace activities and activities that potentially harm consumers;
- the U.S. federal Physician Payments Sunshine Act, enacted as part of the ACA, and its implementing regulations, which requires certain manufacturers of drugs, devices, biologics, and medical supplies that are reimbursable under Medicare, Medicaid, or the Children’s Health Insurance Program, along with others, to track and report annually to the government information related to certain payments and other transfers of value to U.S.-licensed physicians, physician assistants, nurse practitioners, clinical nurse specialists, certified nurse anesthetists, anesthesiology assistants, certified nurse-midwives, and teaching hospitals, as well as ownership and investment interests held by certain physicians and their immediate family members in the manufacturer;
- the federal Civil Monetary Penalties Law, which authorizes the imposition of substantial monetary penalties against an entity, such as a pharmaceutical manufacturer, that engage in activities including, among others (1) knowingly presenting, or causing to be presented, a claim for services not provided as claimed or that is otherwise false or fraudulent in any way; (2) arranging for or contracting with an individual or entity that is excluded from participation in federal health care programs to provide items or services reimbursable by a federal health care program; (3) violations of the AKS; or (4) failing to report and return a known overpayment;
- analogous U.S. state laws and regulations, including: state anti-kickback and false claims laws, which may apply to items or services reimbursed by any third-party payor, including private insurers; state laws that require pharmaceutical companies to comply with the pharmaceutical industry’s voluntary compliance guidelines and the relevant compliance guidance promulgated by the U.S. federal government, or otherwise restrict payments that may be made to healthcare providers and other potential referral sources; state laws and regulations that require drug manufacturers to file reports relating to pricing and marketing information that require the tracking of gifts and other remuneration and items of value provided to healthcare professionals and entities; and state laws governing privacy, security, and breaches of health information in certain circumstances, many of which differ from each other in significant ways and often are not preempted by HIPAA, thus complicating compliance efforts. For example, the California Consumer Privacy Act (“CCPA”), as amended by the CPRA, establishes certain requirements for data use and sharing transparency and provides California consumers (as defined in the law) certain rights concerning the use, disclosure, and retention of their personal data. Such rights include rights to access and delete personal information, opt out of certain personal information sharing, and receive detailed information about how personal information is used. The CCPA provides for civil penalties for violations, as well as a private right of action for data breaches—involving certain types of personal information—that is expected to increase data breach litigation. The CCPA may increase our compliance costs and potential liability. Numerous other states, such as Virginia, Colorado, Utah, and Connecticut, have enacted privacy laws similar to the CCPA, and some states, like Washington and Nevada, have enacted health privacy specific laws that grant heightened rights with respect to health information;
- similar healthcare laws and regulations in the EU, and other jurisdictions, including reporting requirements detailing interactions with and payments to healthcare providers and laws governing the privacy and security of personal information, such as, where applicable, the General Data Protection Regulation, including as implemented in the UK, or GDPR, which imposes obligations and restrictions on the processing of personal data relating to individuals located in the EU and the European Economic Area (“EEA”) (including health data); and
- laws and regulations prohibiting bribery and corruption such as the U.S. Foreign Corrupt Practices Act of 1977, as amended (“FCPA”), which, among other things, prohibits U.S. companies and their employees and agents from authorizing, promising, offering, or providing, directly or indirectly, corrupt or improper payments or anything else of value to foreign government officials, employees of public international organizations or foreign government-owned or affiliated entities, candidates for foreign public office, and foreign political parties or officials thereof.

Because of the breadth of these laws and the narrowness of the statutory exceptions and regulatory safe harbors available under such laws, it is possible that some of our business activities, including our consulting agreements and other relationships with healthcare providers, could be subject to challenge under one or more of such laws. Ensuring that our current and future internal operations and business arrangements with third parties comply with applicable healthcare laws and regulations will involve substantial costs. It is possible that governmental authorities will conclude that our business practices do not comply with current or future statutes, regulations, agency guidance, or case law involving applicable fraud and abuse or other healthcare laws and regulations.



If our operations are found to be in violation of any of the laws described above or any other governmental laws and regulations that may apply to us, we may be subject to actions including the imposition of civil, criminal, and administrative penalties, damages (potentially up to treble damages), disgorgement, monetary fines, exclusion from participation in Medicare, Medicaid, and other federal healthcare programs, individual imprisonment, contractual damages, reputational harm, diminished profits and future earnings, additional reporting requirements, or oversight if we become subject to a corporate integrity agreement or similar agreement to resolve allegations of noncompliance with these laws, and curtailment or restructuring of our operations, any of which could adversely affect our ability to operate our business and our results of operations. Further, defending against any such actions can be costly, time consuming, and may require significant personnel resources. Therefore, even if we are successful in defending against any such actions that may be brought against us, our business may be adversely affected.

***Any clinical trial programs, marketing, or research collaborations in the European Economic Area will subject us to the GDPR.***

The GDPR applies to companies established in the EEA, as well as to companies that are not established in the EEA and which, *inter alia*, collect and use personal data in relation to (i) offering goods or services to, or (ii) monitoring the behavior of, individuals located in the EEA. If we conduct clinical trial programs in the EEA (whether the trials are conducted directly by us or through a clinical vendor or collaborator), or enter into research collaborations involving the monitoring of individuals in the EEA, or market our products to individuals in the EEA, we will be subject to the GDPR. The GDPR puts in place stringent operational requirements for processors and controllers of personal data, including, for example, high standards for obtaining consent from individuals to process their personal data (or reliance on another appropriate legal basis), the provision of robust and detailed disclosures to individuals about how personal data is collected and processed (in a concise, intelligible and easily accessible form), a comprehensive individual data rights regime (including access, erasure, objection, restriction, rectification and portability), maintaining a record of data processing, data export restrictions governing transfers of data from the EEA, short timelines for certain data breach notifications to be given to data protection regulators or supervisory authorities (and in certain cases, affected individuals), and limitations on retention of personal data. The GDPR also puts in place increased requirements pertaining to health data and other special categories of personal data, and includes within scope, pseudonymized (i.e., key-coded) data. Further, the GDPR provides that EEA member states may establish their own laws and regulations limiting the processing of genetic, biometric, or health data, which could limit our ability to collect, use, and share such data and/or could cause our costs to increase. In addition, there are certain obligations if we contract third-party processors in connection with the processing of personal data. If our or our collaborators' or service providers' privacy or data security measures fail to comply with the GDPR requirements, we may be subject to litigation, regulatory investigations, enforcement notices requiring us to change the way we use personal data, or fines of up to 20 million Euros or up to 4% of our total worldwide annual revenue of the preceding financial year, whichever is higher, as well as compensation claims by affected individuals, including class-action type litigation, negative publicity, reputational harm and a potential loss of business and goodwill. Additionally, following the United Kingdom's withdrawal from the EU, we will have to comply with the GDPR and the GDPR as implemented in the United Kingdom, each regime having the ability to fine up to the greater of €20 million/ £17.5 million, respectively, or 4% of global turnover. The relationship between the United Kingdom and the EU in relation to certain aspects of data protection law remains subject to change, for example around how data can lawfully be transferred between each jurisdiction, which exposes us to further compliance risk.

Compliance with the GDPR and local implementation laws has been and is expected to continue to be difficult, constantly evolving, costly and time consuming. Compliance requires a flexible privacy framework and substantial resources. Compliance efforts will likely be an increasing and a substantial cost in the future.

***We are subject to environmental, health and safety laws and regulations, and we may become exposed to liability and substantial expenses in connection with environmental compliance or remediation activities.***

Our operations, including our development, testing and manufacturing activities, are subject to numerous environmental, health and safety laws and regulations. These laws and regulations govern, among other things, the controlled use, handling, release, and disposal of and the maintenance of a registry for, hazardous materials and biological materials, such as chemical solvents, human cells, carcinogenic compounds, mutagenic compounds, and compounds that have a toxic effect on reproduction, laboratory procedures and exposure to blood-borne pathogens. If we fail to comply with such laws and regulations, we could be subject to fines or other sanctions.

As with other companies engaged in activities similar to ours, we face a risk of environmental liability inherent in our current and historical activities, including liability relating to releases of or exposure to hazardous or biological materials. Environmental, health and safety laws and regulations are becoming more stringent. We may be required to incur substantial expenses in connection with future environmental compliance or remediation activities, in which case, the production efforts of our third-party manufacturers or our development efforts may be interrupted or delayed.

***We are subject to certain U.S. and foreign anti-corruption, anti-money laundering, export control, sanctions, and other trade laws and regulations. We can face serious consequences for violations.***

U.S. and foreign anti-corruption, anti-money laundering, export control, sanctions, and other trade laws and regulations, which we collectively refer to as Trade Laws, prohibit, among other things, companies and their employees, agents, clinical research organizations, legal counsel, accountants, consultants, contractors, and other partners from authorizing, promising, offering, providing, soliciting, or receiving directly or indirectly, corrupt or improper payments or anything else of value to or from recipients in the public or private sector. Exports of our products are further subject to export controls and sanctions laws and regulations imposed by the U.S. government and administered by the U.S. Departments of State, Commerce, and Treasury. U.S. export control laws may require a license or other authorization to export products to certain destinations and end users. In addition, U.S. economic sanctions laws include restrictions or prohibitions on engaging in any transactions or dealings, including receiving investment or financing from, or engaging in the sale or supply of products and services to, U.S. sanctioned countries, governments, persons and entities.

Violations of Trade Laws can result in substantial criminal fines and civil penalties, imprisonment, the loss of trade privileges, debarment, tax reassessments, breach of contract and fraud litigation, reputational harm, and other consequences. We have direct or indirect interactions with officials and employees of government agencies or government-affiliated hospitals, universities, and other organizations. We also expect our non-U.S. activities to increase over time. We expect to rely on third parties for research, preclinical studies, and clinical trials and/or to obtain necessary permits, licenses, patent registrations, and other marketing approvals. We can be held liable for the corrupt or other illegal activities of our personnel, agents, or partners, even if we do not explicitly authorize or have prior knowledge of such activities. Any changes in Trade Laws could result in a decreased ability to export or sell our solutions to, existing or potential customers with international operations. Future changes in Trade Laws and enforcement could also result in increased compliance requirements and related costs which could materially adversely affect our business, results of operations, financial condition and/or cash flows.

### **Risks Related to our Employees, Managing our Growth and our Operations**

***Our future success depends on our ability to retain our key personnel and to attract, retain and motivate qualified personnel.***

We are highly dependent on Carmine Stengone, our President and Chief Executive Officer, Daniel Lorrain, Ph.D., our Chief Scientific Officer, Stephen Huhn, M.D., our Chief Medical Officer and Senior Vice President of Clinical Development, Peter Slover, our Chief Financial Officer, John Healy, our General Counsel and Corporate Secretary, as well as the other principal members of our management, scientific, and clinical teams. Although we have employment agreements, offer letters or consulting agreements with our executive officers, these agreements do not prevent them from terminating their services at any time. Further, we do not maintain “key man” life insurance on our executive officers.

If we lose one or more of our executive officers or key employees, our ability to implement our business strategy successfully could be seriously harmed. Furthermore, replacing executive officers and key employees may be difficult and may take an extended period because of the limited number of individuals in our industry with the breadth of skills and experience required to develop, gain regulatory approval of and commercialize drug candidates successfully. Competition to hire from this limited pool is intense, and we may be unable to hire, train, retain or motivate these additional key personnel on acceptable terms given the competition among numerous biotechnology and pharmaceutical companies for similar personnel. We also experience competition for the hiring of scientific and clinical personnel from universities and research institutions.

In addition, we rely on consultants and advisors, including scientific and clinical advisors, to assist us in formulating our research and development and commercialization strategy. Our consultants and advisors may be engaged by other companies or organizations and may have commitments that limit their availability. If we are unable to continue to attract and retain highly qualified personnel, our ability to develop and commercialize our drug candidates will be limited.

***We expect to expand our development, regulatory, and sales and marketing capabilities, and as a result, we may encounter difficulties in managing our growth, which could disrupt our operations.***

We expect to experience significant growth in the number of our employees and the scope of our operations, particularly in the areas of clinical development, regulatory affairs and sales and marketing. To manage our anticipated future growth, we must continue to implement and improve our managerial, operational and financial systems, expand our facilities or acquire new 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. The expansion of our operations may lead to significant costs and may divert our management and business development resources. Any inability to manage growth could delay the execution of our business plans or disrupt our operations.

***Our business and operations could be materially and adversely affected in the event of system failures.***

Despite the implementation of security measures, our computer systems, as well as those of our CROs and other contractors and consultants, are vulnerable to damage from computer viruses, unauthorized access, natural and manmade disasters (including earthquakes or fires), terrorism, war, PHEs, and telecommunication and electrical failures. While we do not believe that we have experienced any such system failure, accident, or security breach to date, if such an event were to occur and cause interruptions in our or their operations, it could result in delays and/or material disruptions of our research and development programs. For example, the loss of preclinical or clinical trial data from ongoing, or planned trials could result in delays in our regulatory approval efforts and significantly increase our costs to recover or reproduce the data. Likewise, we currently rely on third parties for the manufacture of our drug candidates and to conduct clinical trials, and similar events relating to their computer systems could also have a material adverse effect on our business. To the extent that any disruption or security breach were to result in a loss of or damage to our data or applications, or inappropriate disclosure of personal, confidential or proprietary information, we could incur liability, and the development of our drug candidates could be delayed.

***Our proprietary or confidential information may be lost, or we may suffer security breaches.***

The U.S. federal and various state and foreign governments have enacted or proposed requirements regarding the collection, distribution, use, security and storage of personally identifiable information and other data. In the ordinary course of our business, we and third parties with which we have relationships will continue to collect and store sensitive data, including clinical trial data, proprietary business information, personal data and personally identifiable information of our clinical trial subjects and employees, in data centers and on networks. The secure processing, maintenance and transmission of this information is critical to our operations. Despite our and our collaborators' security measures, our information technology and infrastructure may be vulnerable to attacks by hackers or internal bad actors, breaches due to employee error, technical vulnerabilities, malfeasance, or other disruptions. A number of proposed and enacted federal, state and international laws and regulations obligate companies to notify regulators and/or individuals of security breaches, which could result from breaches experienced by us or by third parties, including collaborators, vendors, contractors, or other organizations with which we have formed strategic relationships. Although, to our knowledge, neither we nor any such third parties have experienced any material security breach, and even though we may have contractual protections with such third parties, any such breach could compromise our or their networks and the information stored therein could be accessed, publicly disclosed, lost or stolen. Any such access, disclosure, notifications, follow-up actions related to such a security breach or other loss of information could result in legal claims or proceedings, liability under laws including those that protect the privacy of personal information, and significant costs, including regulatory penalties, fines, and legal expenses, and such an event could disrupt our operations, cause us to incur remediation costs, damage our reputation, and cause a loss of confidence in us and our or such third parties' ability to conduct clinical trials, which could adversely affect our reputation, delay the clinical development of our drug candidates and materially and adversely affect our business. Although we maintain cybersecurity insurance coverage, such insurance may not be adequate to cover all liabilities that we may incur.

## Risks Related to Commercialization

*We face significant competition from biotechnology, pharmaceutical, and medical device companies, and our operating results will suffer if we fail to compete effectively and in a timely manner.*

The biotechnology, pharmaceutical, and medical device industries are highly competitive and subject to significant and rapid technological change. Our success is highly dependent on our ability to acquire, develop, and obtain marketing approval for new products on a cost-effective basis and to market them successfully. If a drug candidate we develop is approved, we will face intense competition from a variety of businesses, including large, fully integrated pharmaceutical companies, specialty pharmaceutical companies, biotechnology companies and early-stage companies, particularly if the early-stage company has a collaborative arrangement with a large and established company.

In addition, we face competition with respect to our current drug candidates and will face competition with respect to any other drug candidates that we may seek to develop or commercialize in the future, from major pharmaceutical companies, specialty pharmaceutical companies and biotechnology companies worldwide. There are a number of large pharmaceutical and biotechnology companies that currently market and sell products or are pursuing the development of drug candidates for the treatment of the indications that we are pursuing. Potential competitors also include academic institutions, government agencies and other public and private research organizations that conduct research, seek patent protection and establish collaborative arrangements for research, development, manufacturing and commercialization.

### PIPE-791 for IPF

While there is no pharmacological cure for IPF, there are two FDA-approved therapies to treat the disease: pirfenidone (Esbriet, marketed by Genentech/Roche) and nintedanib (Ofev, marketed by Boehringer Ingelheim). We are also aware of LPA1R targeted drug candidates in development for IPF by Bristol-Meyers Squibb, AbbVie Inc., Horizon Therapeutics plc, and Structure Therapeutics Inc. In addition, there are a number of companies developing drug candidates for IPF utilizing approaches with different mechanisms of action, including but not limited to Roche Holding AG, Boehringer Ingelheim, United Therapeutics Corporation, Pliant Therapeutics, RedX Pharma, and Endeavor Biomedicines.

### PIPE-791 for Progressive MS

While there are a number of MS medications approved by the FDA for the “active” form of SPMS, no FDA-approved drugs carry a specific indication for PrMS. Mitoxantrone (Novantrone®, marketed by Serono) is approved for secondary (chronic) PrMS and ocrelizumab (Ocrevus®, marketed by Genentech/Roche) is approved for PPMS.

### PIPE-791 for Chronic Pain

Standard-of-care medications for pain include NSAIDS such as ibuprofen, naproxen, COX-2 inhibitors, topical agents, anticonvulsants, antidepressants, muscle relaxants and opioids. Many of these approved therapies are offered as over the counter or prescriptions generics. Our competition may also include other programs in clinical development for the treatment of OA and/or LBP being developed by Vertex Pharmaceuticals Inc., Eli Lilly and Company, GSK plc, Novartis AG and AstraZeneca PLC.

### PIPE-307 for Depression

There are numerous approved therapies for depression, including antidepressant drugs such as selective serotonin reuptake inhibitors, serotonin and norepinephrine reuptake inhibitors, antipsychotics and mood stabilizers. A number of these approved therapies are offered as generics.

### PIPE-307 for RRMS

We are aware of over 20 disease-modifying treatments that suppress inflammatory injury and decrease the rate of annual relapses. However, to our knowledge, none of these approved therapies, including any generics, effectively promote remyelination to mitigate the progressive disability associated with chronic demyelination.

Many of the companies that we compete against or against which we may compete in the future have significantly greater financial resources and expertise in research and development, manufacturing, preclinical testing, conducting clinical trials, obtaining regulatory approvals and marketing approved products than we do. 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 earlier stage companies may also prove to be significant competitors,

particularly through collaborative arrangements with large and established companies. These competitors also compete with us in recruiting and retaining qualified scientific and management personnel and establishing clinical trial sites and patient registration for clinical trials, as well as in acquiring technologies complementary to, or necessary for, our programs. In addition, we cannot predict whether our current competitive advantages, such as our ability to develop selective compounds targeting challenging molecular pathways, will remain in place in the future. If these or other barriers to entry do not remain in place, other companies may be able to more directly or effectively compete with us.

Further, competition could render any drug candidate we develop obsolete, less competitive, or uneconomical. Our competitors may, among other things:

- develop and commercialize products that are safer, more effective, less expensive, more convenient, or easier to administer, or have fewer or less severe side effects;
- obtain quicker regulatory approval;
- have significantly greater name recognition and financial, manufacturing, marketing, product development, technical, and human resources than we do, with mergers and acquisitions in the biotechnology, pharmaceutical, and medical device industries resulting in even more resources being concentrated in our competitors;
- more effectively recruit and retain qualified scientific and management personnel;
- more effectively establish clinical trial sites and patient registration;
- better protect their patents and intellectual property or acquire technologies that are complementary to, or necessary for, our programs;
- implement more effective approaches to sales, marketing, pricing, coverage, and reimbursement; or
- form more advantageous strategic alliances or collaborations.

If we are not able to effectively compete for any of the foregoing reasons, our business, financial condition and results of operations will be materially harmed.

***Even if PIPE-791 or PIPE-307 receives marketing approval in an indication, it may fail to achieve market acceptance by physicians, patients, third-party payors, or others in the medical community necessary for commercial success.***

Even if PIPE-791 or PIPE-307 receives marketing approval for an indication, it may nonetheless fail to gain sufficient market acceptance by physicians, patients, third-party payors, and others in the medical community. If it does not achieve an adequate level of acceptance, we may not generate significant product revenues or royalties to become profitable. The degree of market acceptance of PIPE-791 or PIPE-307, if approved, will depend on several factors, including, but not limited to:

- the efficacy and potential advantages compared to alternative treatments;
- effectiveness of sales and marketing efforts;
- the cost of treatment in relation to alternative treatments, including any similar generic treatments;
- the ability to offer a product for sale at competitive prices;
- the convenience and ease of administration compared to alternative treatments;
- the willingness of the target patient population to try new therapies and of physicians to prescribe these therapies;
- the strength of marketing and distribution support;



- the availability of third-party coverage and adequate reimbursement;
- the prevalence and severity of any side effects; and
- any restrictions on the use of the product together with other medications.

Because we expect sales of PIPE-791 or PIPE-307, if approved, to generate substantially all our revenues for the foreseeable future, the failure of these drug candidates to find market acceptance would harm our business and could require us to seek additional financing.

***We have no sales, marketing or distribution capabilities or experience. If we are unable to establish sales and marketing capabilities either on our own or in collaboration with third parties, we may not be successful in commercializing PIPE-791, even if approved.***

We have no sales, marketing or distribution capabilities or experience. In order to market and successfully commercialize PIPE-791, even if approved, we must build our sales and marketing capabilities or enter into collaborations with third parties for these services. We currently have no sales, marketing or distribution capabilities and as a company have no experience in marketing products. We currently intend to directly market and commercialize PIPE-791, if it is approved, in the United States by developing our own sales and marketing force. There are significant expenses and risks involved with establishing our own sales and marketing capabilities, including our ability to hire, train, retain, and appropriately incentivize a sufficient number of qualified individuals, generate sufficient sales leads and provide our sales and marketing team with adequate access to physicians who may prescribe our product, effectively manage a geographically dispersed sales and marketing team, and other unforeseen costs and expenses. Any failure or delay in developing PIPE-791 that affects the expected timing for its commercialization or results in its failure to be commercialized could result in us having prematurely or unnecessarily incurred costly commercialization expenses.

We may also enter into collaborations for the sales and marketing of PIPE-791, if approved, especially in jurisdictions outside the United States. To the extent that we depend on collaborators for sales and marketing activities, any revenues we receive will depend upon the success of those collaborators' sales and marketing teams and the collaborators' prioritization of our product and compliance with applicable regulatory requirements, and there can be no assurance that the collaborators' efforts will be successful.

If we are unable to build our own sales and marketing team or enter into collaborations for the commercialization of PIPE-791, if approved, we may be forced to delay the commercialization of PIPE-791 or reduce the scope of our sales or marketing activities, which would have an adverse effect on our business, results of operation and prospects.

***The successful commercialization of PIPE-791 or PIPE-307 will depend in part on the extent to which governmental authorities and health insurers establish adequate coverage, reimbursement levels, and pricing policies for such drug candidates. Failure to obtain or maintain coverage and adequate reimbursement for PIPE-791 or PIPE-307, even if approved, could limit our or J&J's ability to market these products and decrease the revenue we generate or the royalties we receive.***

The availability and adequacy of coverage and reimbursement by governmental healthcare programs such as Medicare and Medicaid, private health insurers, and other third-party payors are essential for most patients to be able to afford prescription medications. The ability to achieve acceptable levels of coverage and reimbursement for PIPE-791 and PIPE-307, if approved, by governmental authorities, private health insurers and other organizations will influence our ability and J&J's ability, respectively to successfully commercialize these drug candidates. Obtaining adequate coverage and reimbursement for a drug candidate that is administered under the supervision of a physician, which is what we anticipate for both PIPE-791 and PIPE-307, may be particularly difficult because of the higher prices associated with such products. As a result, availability of coverage and reimbursement by payors is highly uncertain. A decision by a third-party payor not to cover or separately reimburse a product could reduce physician utilization of the product once approved. Assuming PIPE-791 and PIPE-307 obtain coverage by third-party payors, the resulting reimbursement payment rates may not be adequate or may require co-payments that patients find unacceptably high. We cannot be sure that coverage and reimbursement in the United States or elsewhere will be available for PIPE-791 or PIPE-307, and any reimbursement that may become available may be decreased or eliminated in the future.

Third-party payors increasingly are challenging prices charged for pharmaceutical products and services, and Congress has introduced several proposals related to drug pricing, as discussed above. Many third-party payors may refuse to provide coverage and reimbursement for particular drugs or biologics when an equivalent generic drug, biosimilar, or a

less expensive therapy is available. Even if PIPE-791 or PIPE-307 offer improved efficacy, pricing of existing drugs may limit the amount we and J&J, respectively, can charge for these products. Payors may deny or revoke the reimbursement status of a given product or establish prices for new or existing marketed products at levels that are too low to enable a satisfactory return on investment. If reimbursement is not available for PIPE-791 or PIPE-307, or is available only at limited levels, neither we nor J&J may be able to successfully commercialize these drug candidates. Additionally, revenues we ultimately receive from PIPE-791 or PIPE-307 will also depend on what, if any, proposals related to drug pricing may be implemented and, if implemented, when they might take effect.

There is significant uncertainty related to the insurance coverage and reimbursement of newly approved products. In the United States, third-party payors, including private and governmental payors, such as the Medicare and Medicaid programs, play an important role in determining the extent to which new drugs and biologics will be covered. The Medicare and Medicaid programs increasingly are used as models in the United States for how private payors and other governmental payors develop their coverage and reimbursement policies for drugs and biologics. Some third-party payors may require pre-approval of coverage for new or innovative devices or drug therapies before they will reimburse healthcare providers who use such therapies. It is difficult to predict at this time what third-party payors will decide with respect to the coverage and reimbursement for PIPE-791 and PIPE-307.

No uniform policy for coverage and reimbursement for products exists among third-party payors in the United States. Therefore, coverage and reimbursement for products can differ significantly from payor to payor, and one third-party payor's decision to cover a product does not ensure that other payors will also provide similar coverage. Additionally, the process for determining whether a third-party payor will provide coverage for a product is typically separate from the process for setting the price of such product or establishing the reimbursement rate that the payor will pay for the product once coverage is approved. As a result, the determination of coverage and reimbursement is often a time-consuming and costly process that will require the seller to provide scientific and clinical support for the use of the drug candidates to each payor separately, with no assurance that coverage and adequate reimbursement will be applied consistently or obtained in the first instance. Furthermore, rules and regulations regarding reimbursement change frequently, in some cases at short notice, and we believe that changes in these rules and regulations are likely.

Moreover, increasing efforts by governmental and third-party payors in the United States to cap or reduce healthcare costs may cause such organizations to limit both coverage and the level of reimbursement for newly approved products and, as a result, they may not cover or provide adequate payment to support the commercialization of PIPE-791 or PIPE-307. We expect that any commercialization of PIPE-791 and PIPE-307 will be subject to pricing pressures due to the trend toward managed healthcare, the increasing influence of health maintenance organizations, and additional legislative, administrative, or regulatory changes. The downward pressure on healthcare costs in general, particularly prescription drugs and biologics and surgical procedures and other treatments, has become intense. As a result, increasingly high barriers are being erected to the entry of new products.

Any commercialization of PIPE-791 and PIPE-307 may also be subject to extensive governmental price controls and other market regulations outside of the United States. The increasing emphasis on cost-containment initiatives in other countries have and, we believe, will continue to put pressure on the pricing and usage of medical products. In many countries, the prices of medical products are subject to varying price control mechanisms as part of national health systems. Other countries allow companies to fix their own prices for medical products but monitor and control company profits. Additional foreign price controls or other changes in pricing regulation could restrict the amount that we or J&J are able to charge for PIPE-791 and PIPE-307, respectively. Accordingly, in markets outside the United States, the reimbursement for PIPE-791 and PIPE-307 may be reduced compared with the United States and may be insufficient to generate commercially reasonable revenue and profits.

***The insurance coverage and reimbursement status of newly-approved products is uncertain. Failure to obtain or maintain adequate coverage and reimbursement for an approved products could limit the ability to market the product and decrease the revenues we ultimately receive.***

The pricing, coverage and reimbursement for PIPE-791, if approved, must be adequate to support the commercial infrastructure required to market and sell PIPE-791. Our per-patient prices must be sufficient to recover our development and manufacturing costs and potentially achieve profitability. However, sales of any pharmaceutical product depend, in part, on the extent to which such product will be covered by third-party payors, such as federal, state, and foreign government healthcare programs, commercial insurance and managed healthcare organizations, and the level of reimbursement for such product by third-party payors. Significant uncertainty exists as to the coverage and reimbursement status of any newly approved product. Decisions regarding the extent of coverage and amount of reimbursement to be provided are made on a plan-by-plan basis. One third-party payor's decision to cover a product does not ensure that other payors will also provide coverage for the product. As a result, we have no assurance that coverage and adequate

reimbursement will be applied consistently or obtained in the first instance. For products administered under the supervision of a physician in a physician office setting, obtaining coverage and adequate reimbursement may be particularly difficult because of the higher prices often associated with such drugs. Additionally, we may not be guaranteed separate reimbursement for the product itself or the treatment or procedure in which the product is used, which may impact physician utilization.

In addition, third-party payors are increasingly reducing reimbursements for pharmaceutical products such as ours. The U.S. government and state legislatures have continued implementing cost-containment programs, including price controls, restrictions on coverage and reimbursement, and requirements for substitution of generic products. Third-party payors are increasingly challenging the prices charged, examining the medical necessity, and reviewing the cost effectiveness of pharmaceutical products, in addition to questioning their safety and efficacy. Increasingly, third-party payors are requiring that drug companies provide them with predetermined discounts from list prices and are challenging the prices charged for medical 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 or delay sales of any of our future products. Decreases in third-party reimbursement or a decision by a third-party payor not to cover a product could reduce physician usage and patient demand for any of our future products.

In international markets, reimbursement and healthcare payment are generally subject to extensive governmental price controls and other market regulations, and we believe the increasing emphasis on cost-containment initiatives in the EU, Canada and other countries has and will continue to put pressure on the pricing and usage of our drug candidates. In many countries, the prices of medicinal products are subject to varying price control mechanisms as part of national health systems. In general, the prices of medical devices under such systems are substantially lower than in the U.S. For example, the EU 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. Furthermore, there is no assurance that a product will be considered medically reasonable and necessary for a specific indication, will be considered cost-effective by third-party payors, that an adequate level of reimbursement will be established even if coverage is available, or that the third-party payors' reimbursement policies will not adversely affect the ability of manufacturers to sell products profitably. Accordingly, in markets outside the U.S., the reimbursement for our products may be reduced compared with the U.S. and may be insufficient to generate commercially reasonable revenue and profits.

***If we fail to comply with our reporting and payment obligations under the Medicaid Drug Rebate program or other governmental pricing programs, if we participate in these programs, we could be subject to additional rebate requirements, penalties, or other sanctions, which could have a material adverse effect on our business, financial condition, results of operations, and growth prospects.***

Under the Medicaid Drug Rebate program, a participating manufacturer is required to pay a rebate to each state Medicaid program for its covered outpatient drugs that are dispensed to Medicaid beneficiaries and paid for by the state Medicaid program as a condition of having federal funds being made available for our drugs under Medicaid and Medicare Part B. Those rebates are based on pricing data reported by the manufacturer on a monthly and quarterly basis to CMS, the federal agency that administers the Medicaid Drug Rebate program. If we fail to pay the required rebate amount or report pricing data on a timely basis, if we are found to have knowingly submitted any false pricing or product information to the government, if we fail to submit the required pricing data on a timely basis, or if we misclassify or misreport product information, we may be subject to civil monetary penalties. CMS could also decide to terminate our Medicaid drug rebate agreement, in which case federal payments may not be available under Medicaid or Medicare Part B for our covered outpatient drugs.

Federal law requires that a manufacturer also participate in the 340B Drug Pricing program in order for federal funds to be available for the manufacturer's drugs under Medicaid and Medicare Part B. The 340B program requires participating manufacturers to agree to charge no more than the 340B "ceiling price" for the manufacturer's covered outpatient drugs to specified "covered entities," including community health centers and other entities that receive certain federal grants, as well as certain hospitals that serve a disproportionate share of low-income patients. The 340B ceiling price is calculated based on the information reported under the Medicaid Drug Rebate program. If we are found to have knowingly and intentionally charged 340B covered entities more than the statutorily mandated ceiling price, we could be subject to significant civil monetary penalties and/or such failure also could be grounds for the Health Resources and Services Administration to terminate our agreement to participate in the 340B program, in which case our covered outpatient drugs would no longer be eligible for federal payment under the Medicaid or Medicare Part B program.

Federal law also requires that manufacturers report to CMS, on a quarterly basis, average sales price information for certain categories of drugs that are paid under the Medicare Part B program. Manufacturers calculate average sales price based on a statutorily defined formula as well as regulations and guidance. CMS may use the reported information to

determine payment rates for drugs under Medicare Part B. If we are found to have made a misrepresentation in the reporting of our average sales price, we may be subject to civil monetary penalties. In addition, if we fail to provide timely information or knowingly provide false information, then we may also be subject to significant civil monetary penalties.

In addition, starting in 2023, manufacturers must pay refunds to Medicare for single source drugs or biologicals, or biosimilar biological products, reimbursed under Medicare Part B and packaged in single-dose containers or single-use packages for units of discarded drug reimbursed by Medicare Part B in excess of 10 percent of total allowed charges under Medicare Part B for that drug. A failure to pay refunds for discarded drugs under the discarded drug refund program could subject us to civil monetary penalties of 125 percent of the refund amount.

Pricing and rebate calculations are complex, vary across products and programs, and are often subject to interpretation by the manufacturer, governmental agencies, and courts. A manufacturer that becomes aware that its Medicaid reporting for a prior quarter was incorrect, or has changed as a result of recalculation of the pricing data, is obligated to resubmit corrected data up to three years after those data originally were due. Restatements and recalculations increase the costs for complying with the laws and policies governing the Medicaid Drug Rebate program and could result in an overage or underage in our rebate liability for past quarters. They also may affect the 340B ceiling price and therefore liability under the 340B program.

In order to be eligible to have its products paid for with federal funds under the Medicaid and Medicare Part B programs and purchased by the Department of Veterans Affairs (“VA”), Department of Defense (“DoD”), Public Health Service, and Coast Guard (the Big Four agencies), and certain federal grantees, a manufacturer is required to participate in the VA Federal Supply Schedule pricing program, established under Section 603 of the Veterans Health Care Act of 1992. Under this program, the manufacturer is obligated to make its covered drugs available for procurement on an FSS contract and charge a price to the Big Four agencies that is no higher than the Federal Ceiling Price (“FCP”), which is a price calculated pursuant to a statutory formula. The FCP is derived from a calculated price point called the “non-federal average manufacturer price” (the “Non FAMP”), which the manufacturer calculates and reports to the VA on a quarterly and annual basis. Pursuant to applicable law, knowing provision of false information in connection with a Non FAMP filing can subject a manufacturer to significant penalties for each item of false information. The FSS contract also contains extensive disclosure and certification requirements.

Under Section 703 of the National Defense Authorization Act for FY 2008, the manufacturer is required to pay quarterly rebates to DoD on utilization of its innovator products that are dispensed through DoD’s Tricare network pharmacies to Tricare beneficiaries. The rebates are calculated as the difference between the annual Non FAMP and FCP for the calendar year that the product was dispensed. A manufacturer that overcharges the government in connection with the FSS contract or Tricare Retail Pharmacy Rebate Program, whether due to a misstated FCP or otherwise, is required to refund the difference to the government. Failure to make necessary disclosures and/or to identify contract overcharges can result in allegations against us under the FCA and other laws and regulations.

Additional U.S. federal healthcare reform measures may be implemented in the future, any of which could limit the amounts that the U.S. federal government will pay for healthcare products and services, which could result in reduced demand for our drug candidates or additional pricing pressures.

***A variety of risks associated with operating internationally could materially adversely affect our business.***

Our business strategy includes potentially expanding internationally if PIPE-791 receives regulatory approval. Doing business internationally involves several risks, including, but not limited to:

- multiple, conflicting, and changing laws and regulations, such as privacy regulations, tax laws, export and import restrictions, economic sanctions laws and regulations, employment laws, regulatory requirements, and other governmental approvals, permits, and licenses;
- failure by us to obtain and maintain regulatory approvals for the use of PIPE-791 in various countries;
- additional potentially relevant third-party patent rights;
- complexities and difficulties in obtaining protection and enforcing our intellectual property;
- difficulties in staffing and managing foreign operations;

- complexities associated with managing multiple payor reimbursement regimes, government payors, or patient self-pay systems;
- limits in our ability to penetrate international markets;
- financial risks, such as longer payment cycles, difficulty collecting accounts receivable, the impact of local and regional financial crises on demand and payment for our products, and exposure to foreign currency exchange rate fluctuations;
- natural disasters, political and economic instability, including wars, terrorism and political unrest, outbreak of disease, PHEs, boycotts, curtailment of trade, and other business restrictions;
- certain expenses, including, among others, expenses for travel, translation, and insurance; and
- regulatory and compliance risks that relate to maintaining accurate information and control over sales and activities that may fall within the purview of the FCPA, its books and records provisions, or its anti-bribery provisions, as well as other applicable laws and regulations prohibiting bribery and corruption.

Any of these factors could significantly harm any future international expansion and operations and, consequently, our business, financial condition, results of operations and prospects.

### **Risks Related to Ownership and our Common Stock**

***The market price of our common stock may be volatile and fluctuate substantially, which could result in substantial losses for our stockholders.***

The market price of our common stock is likely to be highly volatile and may be subject to wide fluctuations in response to various factors, some of which are beyond our control. In addition to the factors discussed in this section titled “Risk factors”, these factors include:

- any delay in the enrollment or ultimate completion of our existing and planned clinical trials for PIPE-791 and our existing clinical trial for PIPE-307;
- the results of our existing and planned clinical trials for PIPE-791 and our existing clinical trial for PIPE-307;
- any delay by J&J in initiating or completing clinical trials for PIPE-307, the results from any clinical trial completed by J&J for PIPE-307 or any decision by J&J not to pursue further clinical development of PIPE-307;
- the results of the clinical trials conducted by competitors developing drug candidates competitive with PIPE-791 or PIPE-307;
- our ability to develop additional drug candidates based on our clinical translational approach;
- any delay in submitting a regulatory filing for PIPE-791 or PIPE-307, and any adverse development or perceived adverse development with respect to the regulatory review of such filing;
- our failure to successfully develop and commercialize PIPE-791 and/or any future drug candidate we develop, and J&J’s failure to successfully develop and commercialize PIPE-307;
- inability to obtain additional funding to support our product development plans and operations;
- regulatory or legal developments in the United States and other countries applicable to any drug candidate;
- adverse regulatory decisions;
- changes in the structure of healthcare payment systems;



- adverse developments concerning our CMOs or CROs;
- inability to obtain adequate product supply to support our clinical trials, or the inability to do so at acceptable prices;
- introduction of new products, services or technologies by our competitors;
- our ability to effectively manage our growth;
- failure to meet or exceed financial projections we provide to the public;
- failure to meet or exceed the estimates and projections of the investment community;
- changes in the market valuations of companies similar to us;
- market conditions in the biotechnology and pharmaceutical sectors, and the issuance of new or changed securities analysts' reports or recommendations;
- announcements of significant in-licensing transactions, acquisitions, strategic collaborations, joint ventures or capital commitments by us or our competitors;
- our inability to establish additional collaboration or licensing arrangements that we need on favorable terms, or at all;
- significant lawsuits, including patent or stockholder litigation, and disputes or other developments relating to our proprietary rights, including patents, litigation matters, and our ability to obtain patent protection for our drug candidates;
- additions or departures of key scientific or management personnel;
- sales of our common stock by us or our stockholders in the future;
- trading volume of our common stock; and
- general economic, industry and market conditions.

In addition, the stock markets have experienced extreme price and volume fluctuations that have affected and continue to affect the market prices of equity securities of many companies. These fluctuations have often been unrelated or disproportionate to the operating performance of those companies. Broad market and industry factors, as well as general economic, political, regulatory, and market conditions, may negatively affect the market price of our common stock, regardless of our actual operating performance.

***We have a limited trading history and there is no assurance that a robust market in our common stock will develop or be sustained.***

Since our common stock began trading on The Nasdaq Stock Market in April 2024, we have experienced a limited daily trading volume. We cannot assure you that a more active or liquid trading market for our common stock will develop, or will be sustained if it does develop, either of which could materially and adversely affect the market price of our common stock, our ability to raise capital in the future and the ability of stockholders to sell their shares at the volume, prices and times desired.

***Sales of a substantial number of shares of our common stock in the public market could cause the price of our common stock to fall.***

Sales of a substantial number of shares of our common stock in the public market could cause our stock price to decline. Sales of a substantial number of shares of our common stock in the public market could occur at any time. These sales, or the perception in the market that the holders of a large number of shares intend to sell shares, could reduce the market price of our common stock. Shares held by directors, executive officers and other affiliates will be subject to volume

limitations under Rule 144 under the Securities Act of 1933 and various vesting agreements. We have registered and intend to continue to register all shares of common stock that we may issue under our equity compensation plans. Once we register these shares, they can be freely sold in the public market upon issuance, subject to volume limitations applicable to affiliates. We cannot predict what effect, if any, sales of our shares in the public market or the availability of shares for sale will have on the market price of our common stock. However, future sales of substantial amounts of our common stock in the public market, including shares issued upon exercise of our outstanding warrant or options, or the perception that such sales may occur, could adversely affect the market price of our common stock. We also expect that significant additional capital may be needed in the future to continue our planned operations. To raise capital, we may sell common stock, convertible securities or other equity securities in one or more transactions at prices and in a manner we determine from time to time. To the extent that additional capital is raised through the sale and issuance of shares or other securities convertible into shares, our stockholders will be diluted. These sales, or the perception in the market that the holders of a large number of shares intend to sell shares, could reduce the market price of our common stock.

***Our directors, executive officers and holders of greater than 5% of our common stock own a significant percentage of our common stock and, if they choose to act together, will be able to exert significant influence over matters subject to stockholder approval.***

Our directors, executive officers, and holders of more than 5% of our outstanding common stock will continue to exert significant influence on us. As a result, these holders, acting together, will have significant control over all matters that require approval of our stockholders, including the election of directors, amendments of our organizational documents, or approval of any merger, sale of assets, or other major corporate transactions. The interests of these holders may not always coincide with our corporate interests or the interests of other stockholders, and they may act in a manner with which you may not agree or that may not be in the best interests of our other stockholders.

***The dual series structure of our Class A and Class B common stock may limit your ability to influence corporate matters and may limit your visibility with respect to certain transactions.***

The dual class structure of our Class A and Class B common stock may limit your ability to influence corporate matters. Holders of our Class A common stock are entitled to one vote per share, while holders of our Class B common stock are not entitled to any votes. Nonetheless, each share of our Class B common stock may be converted at any time into one share of our Class A common stock at the option of its holder by providing written notice to us, subject to the limitations provided for in our amended and restated certificate of incorporation. Consequently, if holders of our Class B common stock exercise their option to make this conversion, this will have the effect of increasing the relative voting power of those prior holders of our Class B common stock, and correspondingly decreasing the voting power of the holders of our Class A common stock, which may limit your ability to influence corporate matters. Additionally, stockholders who hold, in the aggregate, more than 10% of our Class A common stock and Class B common stock, but 10% or less of our Class A common stock, and are not otherwise an insider, may not be required to report changes in their ownership due to transactions in our Class B common stock pursuant to Section 16(a) of the Exchange Act of 1934, as amended (the “Exchange Act”), and may not be subject to the short-swing profit provisions of Section 16(b) of the Exchange Act.

***If our estimates or judgments relating to our critical accounting policies are based on assumptions that change or prove to be incorrect, our results of operation could fall below our publicly announced guidance or the expectations of securities analysts and investors, resulting in a decline in the market price of our common stock.***

The preparation of financial statements in conformity with U.S. generally accepted accounting principles (“U.S. GAAP”) requires management to make estimates and assumptions that affect the amounts reported in our financial statements and accompanying notes. We base our estimates on historical experience and estimates and on various other assumptions that we believe to be reasonable under the circumstances, the results of which form the basis for making judgments about the carrying values of assets, liabilities, equity, revenue and expenses that are not readily apparent from other sources. For example, in connection with the implementation of the new revenue accounting standard if and when we have product sales, management makes judgments and assumptions based on our interpretation of the new standard. The new revenue standard is principle-based and interpretation of those principles may vary from company to company based on their unique circumstances. It is possible that interpretation, industry practice and guidance may evolve as we apply the new standard. If our assumptions underlying our estimates and judgements relating to our critical accounting policies change or if actual circumstances differ from our assumptions, estimates or judgements, our operating results may be adversely affected and could fall below our publicly announced guidance or the expectations of securities analysts and investors, resulting in a decline in the market price of our common stock.

***We are an “emerging growth company,” and a “smaller reporting company” and we cannot be certain if the reduced reporting requirements applicable to emerging growth companies or smaller reporting companies will make our common stock less attractive to investors.***

We are an “emerging growth company” as defined in the JOBS Act and we intend to take advantage of some of the exemptions from reporting requirements that are applicable to other public companies that are not emerging growth companies, including:

- the option to present only two years of audited financial statements, in addition to any required unaudited interim financial statements, with correspondingly reduced “Management’s Discussion and Analysis of Financial Condition and Results of Operations” disclosure;
- not being required to comply with the auditor attestation requirements of Section 404(b) of the Sarbanes Oxley Act;
- not being required to comply with any requirement that may be adopted by the Public Company Accounting Oversight Board regarding mandatory audit firm rotation or a supplement to the auditor’s report providing additional information about the audit and the financial statements; and
- not being required to disclose certain executive compensation-related items such as the correlation between executive compensation and performance and comparisons of the chief executive officer’s compensation to median employee compensation.

In addition, Section 107 of the JOBS Act provides that an emerging growth company can take advantage of an extended transition period for complying with new or revised accounting standards, delaying the adoption of these accounting standards until they would apply to private companies. We have elected to avail ourselves of this exemption and, as a result, we will adopt new or revised accounting standards on the relevant dates on which adoption of such standards is required for private companies.

We may take advantage of these reporting exemptions until we are no longer an emerging growth company. We will remain an emerging growth company until the earlier of (1) the last day of the fiscal year (a) following the fifth anniversary of the completion of our IPO, (b) in which we have total annual gross revenue of at least \$1.235 billion or (c) in which we are deemed to be a large accelerated filer, which means the market value of our common stock that is held by non-affiliates exceeds \$700 million as of the prior June 30th and (2) the date on which we have issued more than \$1.0 billion in non-convertible debt during the prior three-year period.

Even after we no longer qualify as an emerging growth company, we may continue to qualify as a “smaller reporting company,” which would allow us to take advantage of many of the same exemptions from disclosure requirements including reduced disclosure obligations regarding executive compensation in our periodic reports and proxy statements, if either (i) the market value of our stock held by non-affiliates is less than \$250 million or (ii) our annual revenue is less than \$100 million during the most recently completed fiscal year and the market value of our stock held by non-affiliates is less than \$700 million.

We cannot predict if investors will find our common stock less attractive because we will rely on these exemptions. If some investors find our common stock less attractive as a result, there may be a less active trading market for our common stock and our stock price may be more volatile.

***We do not intend to pay cash dividends for the foreseeable future. Consequently, you must rely on sales of our common stock after price appreciation, which may never occur, as the only way to realize any future gains on your investment.***

We have never declared nor paid cash dividends on our capital stock. We currently intend to retain any future earnings to finance the operation and expansion of our business, and we do not expect to declare or pay any dividends in the foreseeable future. Consequently, stockholders must rely on sales of their common stock after price appreciation, which may never occur, as the only way to realize any future gains on their investment.

***Delaware law and provisions in our amended and restated certificate of incorporation and amended and restated bylaws could make a merger, tender offer or proxy contest difficult, thereby depressing the trading price of our common stock.***

Our status as a Delaware corporation and the anti-takeover provisions of the Delaware General Corporation Law may discourage, delay or prevent a change in control by prohibiting us from engaging in a business combination with an interested stockholder for a period of three years after the person becomes an interested stockholder, even if a change of control would be beneficial to our existing stockholders. In addition, our amended and restated certificate of incorporation and amended and restated bylaws contain provisions that may make the acquisition of our company more difficult, including the following:

- a classified board of directors with three-year staggered terms, which could delay the ability of stockholders to change the membership of a majority of our board of directors;
- the ability of our board of directors to issue shares of preferred stock and to determine the price and other terms of those shares, including preferences and voting rights, without stockholder approval, which could be used to significantly dilute the ownership of a hostile acquirer;
- the exclusive right of our board of directors to elect a director to fill a vacancy created by the expansion of our board of directors or the resignation, death or removal of a director, which prevents stockholders from being able to fill vacancies on our board of directors;
- a prohibition on stockholder action by written consent, which forces stockholder action to be taken at an annual or special meeting of our stockholders;
- the requirement that a special meeting of stockholders may be called only by a majority vote of our entire board of directors, the chair of our board of directors or our chief executive officer, which could delay the ability of our stockholders to force consideration of a proposal or to take action, including the removal of directors;
- the requirement for the affirmative vote of holders of at least 66 2/3% of the voting power of all of the then-outstanding shares of the voting stock, voting together as a single class, to amend the provisions of our amended and restated certificate of incorporation or our amended and restated bylaws, which may inhibit the ability of an acquirer to effect such amendments to facilitate an unsolicited takeover attempt; and
- advance notice procedures with which stockholders must comply to nominate candidates to our board of directors or to propose matters to be acted upon at a stockholders' meeting, which may discourage or deter a potential acquirer from conducting a solicitation of proxies to elect the acquirer's own slate of directors or otherwise attempting to obtain control of us.

In addition, as a Delaware corporation, we are subject to Section 203 of the Delaware General Corporation Law. These provisions may prohibit large stockholders, in particular those owning 15% or more of our outstanding voting stock, from merging or combining with us for a certain period of time. While a Delaware corporation may opt out of this provision by express provision in its original certificate of incorporation or by amendment to its certificate of incorporation or bylaws approved by its stockholders, we have not opted out of this provision.

These and other provisions in our amended and restated certificate of incorporation, amended and restated bylaws and Delaware law could make it more difficult for stockholders or potential acquirers to obtain control of our board of directors or initiate actions that are opposed by our then-current board of directors, including delay or impede a merger, tender offer or proxy contest involving our company. The existence of these provisions could negatively affect the price of our common stock and limit opportunities for you to realize value in a corporate transaction.

***Our amended and restated certificate of incorporation provides that the Court of Chancery of the State of Delaware and the U.S. federal district courts are the exclusive forums for substantially all disputes between us and our stockholders, which could limit our stockholders' ability to obtain a favorable judicial forum for disputes with us or our directors, officers or employees.***

Our amended and restated certificate of incorporation provides that the Court of Chancery of the State of Delaware is the exclusive forum for any derivative action or proceeding brought on our behalf, any action asserting a breach of fiduciary duty, any action asserting a claim against us arising pursuant to the Delaware General Corporation Law, our certificate of incorporation or our bylaws or any action asserting a claim against us that is governed by the internal affairs doctrine, unless we consent in writing to the selection of an alternative forum to the extent permitted by law.

This provision would not apply to suits brought to enforce a duty or liability created by the Exchange Act. Furthermore, Section 22 of the Securities Act creates concurrent jurisdiction for federal and state courts over all such Securities Act actions. Accordingly, both state and federal courts have jurisdiction to entertain such claims. Our certificate of incorporation will further provide that the U.S. federal district courts will be the exclusive forum for resolving any complaint asserting a cause of action arising under the Securities Act, including all causes of action asserted against any defendant named in such complaint. While the Delaware courts have determined that such choice of forum provisions are facially valid, a stockholder may nevertheless seek to bring a claim in a venue other than those designated in the exclusive forum provisions. In such instance, we would expect to vigorously assert the validity and enforceability of the exclusive forum provisions of our certificate of incorporation. This may require significant additional costs associated with resolving such action in other jurisdictions and there can be no assurance that the provisions will be enforced by a court in those other jurisdictions.

This choice of forum provision may limit a stockholder's ability to bring a claim in a judicial forum that it finds favorable for disputes with us or our directors, officers or other employees and may result in stockholders incurring additional expenses in bringing a claim in the forum designated by us, which may discourage these types of lawsuits. Alternatively, if a court were to find the choice of forum provision contained in our amended and restated certificate of incorporation to be inapplicable or unenforceable in an action, we may incur additional costs associated with resolving such action in other jurisdictions.

### **General Risk Factors**

***If securities or industry analysts do not publish research or publish inaccurate or unfavorable research about our business, our stock price and trading volume could decline.***

The trading market for our common stock will depend in part on the research and reports published by securities or industry analysts about our business and the drug candidates we have developed. Securities and industry analysts do not currently, and may never, publish research on our company. If no or only very few securities analysts commence coverage of us, or if industry analysts cease coverage of us, the trading price for our common stock would be negatively affected. If one or more of the analysts who cover us downgrade our common stock or publish inaccurate or unfavorable research about our business or the drug candidates we have developed, our common stock price would likely decline. If one or more of these analysts cease coverage of us or fail to publish reports on us regularly, demand for our common stock could decrease, which might cause our common stock price and trading volume to decline.

***We could be subject to securities class action litigation.***

In the past, securities class action litigation has often been brought against a company following a decline in the market price of its securities. This risk is especially relevant for us because development stage pharmaceutical companies have experienced significant stock price volatility in recent years. If we face such litigation, it could result in substantial costs and a diversion of management's attention and resources, which could harm our business.

***Requirements associated with being a public company will increase our costs significantly, as well as divert significant company resources and management attention.***

We are subject to the reporting requirements of the Exchange Act and the other rules and regulations of the SEC and Nasdaq related to public companies. Compliance with the various reporting and other requirements applicable to public companies requires considerable time and attention of management and we will incur significant legal, accounting and other expenses that we did not incur as a private company. We cannot assure you that we will satisfy our obligations as a public company on a timely basis.

In addition, as a public company, it may be more difficult or more costly for us to obtain certain types of insurance, including directors' and officers' liability insurance, and we may be forced to accept reduced policy limits and coverage or incur substantially higher costs to obtain the same or similar coverage. The impact of these events could also make it more difficult for us to attract and retain qualified personnel to serve on our board of directors, our board committees or as executive officers.



***If we fail to maintain proper and effective internal controls, our ability to produce accurate and timely financial statements could be impaired, which could result in sanctions or other penalties that could harm our business. As a public company, we are obligated to develop and maintain proper and effective internal controls over financial reporting and any failure to maintain the adequacy of these internal controls may adversely affect investor confidence in us, and, as a result, the value of our common stock.***

To comply with the requirements of being a public company, we will need to undertake various actions, including implementing new internal controls and procedures and hiring additional accounting or internal audit staff. The Sarbanes-Oxley Act requires that we maintain effective disclosure controls and procedures and internal control over financial reporting. However, while we remain a smaller reporting company, we will not be required to include an attestation report on internal control over financial reporting issued by our independently registered public accounting firm. We are continuing to develop and refine our disclosure controls and other procedures that are designed to ensure that information required to be disclosed by us in the reports that we file with the SEC is recorded, processed, summarized and reported within the time periods specified in SEC rules and forms, and that information required to be disclosed in reports under the Exchange Act, is accumulated and communicated to our principal executive and financial officers. Our current controls and any new controls that we develop may become inadequate and weaknesses in our internal control over financial reporting may be discovered in the future. Any failure to develop or maintain effective controls when we become subject to this requirement could negatively affect the results of periodic management evaluations and annual independent registered public accounting firm attestation reports regarding the effectiveness of our internal control over financial reporting that we may be required to include in our periodic reports we will file with the SEC under Section 404 of the Sarbanes-Oxley Act, harm our operating results, cause us to fail to meet our reporting obligations or result in a restatement of our prior period financial statements. In the event that we are not able to demonstrate compliance with the Sarbanes-Oxley Act, that our internal control over financial reporting is perceived as inadequate or that we are unable to produce timely or accurate financial statements, investors may lose confidence in our operating results and the price of our common stock could decline. In addition, if we are unable to continue to meet these requirements, we may be unable to remain listed on Nasdaq.

Our independent registered public accounting firm will not be required to formally attest to the effectiveness of our internal control over financial reporting until the later of (i) our second annual report or (ii) the first annual report required to be filed with the SEC following the date we are no longer an “emerging growth company,” as defined in the JOBS Act, or a “smaller reporting company” as defined by the SEC.

We may discover weaknesses in our system of internal financial and accounting controls and procedures that could result in a material misstatement of our financial statements. In addition, our internal control over financial reporting will not prevent or detect all errors and all fraud. A control system, no matter how well designed and operated, can provide only reasonable, not absolute, assurance that the control system’s objectives will be met. Because of the inherent limitations in all control systems, no evaluation of controls can provide absolute assurance that misstatements due to error or fraud will not occur or that all control issues and instances of fraud will be detected.

If we are not able to comply with the requirements of Section 404 of the Sarbanes-Oxley Act in a timely manner, or if we are unable to maintain proper and effective internal controls over financial reporting, we may not be able to produce timely and accurate financial statements. If that were to happen, our investors could lose confidence in our reported financial information, the market price of our stock could decline and we could be subject to sanctions or investigations by the SEC or other regulatory authorities including equivalent foreign authorities.

***Our ability to use our net operating loss carryforwards and certain other tax attributes may be limited.***

We have incurred substantial losses during our history, and we expect to continue to incur substantial losses in future years as we conduct clinical trials for PIPE-791 and complete the clinical trial for PIPE-307, and we may never achieve profitability. Changes in tax laws or regulations may adversely impact our ability to utilize all, or any, of our net operating loss carryforwards (“NOLs”). For example, legislation enacted in 2017, informally titled the Tax Cuts and Jobs Act (“TCJA”) significantly revised the Internal Revenue Code of 1986, as amended (the “IRC”). Future guidance from the IRS and other tax authorities with respect to the TCJA may affect us, and certain aspects of the TCJA could be repealed or modified in future legislation. For example, the Coronavirus Aid, Relief, and Economic Security Act (“CARES Act”) modified certain provisions of the TCJA. Under the TCJA, as modified by the CARES Act, unused losses generated in taxable years ending after December 31, 2017 will not expire and may be carried forward indefinitely, but the deductibility of such NOLs in tax years beginning after December 31, 2020, is limited to 80% of taxable income. It is uncertain if and to what extent various states will conform to the TCJA or the CARES Act.

Under Sections 382 and 383 of the IRC if a corporation undergoes an “ownership change,” generally defined as a greater than 50 percentage point change (by value) in its equity ownership by certain stockholders over a three-year period, the corporation’s ability to use its pre-change NOLs and other pre-change tax attributes (such as research tax credits) to offset its post-change income or taxes may be limited. Similar provisions of state tax law may also apply to limit our use of accumulated state tax attributes. In addition, at the state level, there may be periods during which the use of NOLs is suspended or otherwise limited, which could accelerate or permanently increase state taxes owed. We have completed an ownership analysis and identified that ownership changes occurred in July 2012, April 2018, March 2019 and February 2021. As a result of limitations arising from the prior ownership changes, federal and California net operating loss carry-forwards and federal R&D tax credits were removed from our inventory of deferred tax assets. As of December 31, 2024, we had federal and California tax loss carry forwards of approximately \$46.7 million and \$81.4 million, respectively. Out of the total federal net operating losses, approximately \$46.7 million were generated after December 31, 2017, and therefore do not expire. The remaining federal and state net operating loss carry forwards begin to expire in 2037 and 2036, respectively, if unused. We may experience an ownership change in connection with our IPO or in the future because of subsequent shifts in our stock ownership (some of which are outside of our control). If further requisite ownership changes occur, the amount of remaining tax attribute carryforwards available to offset taxable income and reduce income tax expense in future years may be further restricted or eliminated. As a result, even if we attain profitability, we may be unable to use a material portion of our NOLs and other tax attributes based on restrictions in the IRC, which could adversely affect our future cash flows and results of operations.

***Changes in tax laws and the implementation of tax laws could adversely affect us.***

The tax regimes we are subject to or operate under, including with respect to income and non-income taxes, are unsettled and may be subject to significant change. Changes in tax laws, regulations, or rulings, or changes in interpretations of existing laws and regulations, could materially adversely affect our company. For example, the TCJA, the CARES Act, and the IRA enacted many significant changes to the U.S. tax laws. Future guidance from the IRS and other tax authorities with respect to such legislation may affect us, and certain aspects thereof could be repealed or modified in future legislation.

We use our best judgment in attempting to quantify and reserve for these tax obligations. However, a challenge by the IRS or another taxing authority, our ability to utilize tax benefits such as carryforwards or tax credits, or a deviation from other tax-related assumptions could have a material adverse effect on our business, results of operations or financial condition. In addition, new legislation or regulations which could affect our tax burden could be enacted by Congress or another governmental authority. We cannot predict the timing or extent of such tax-related developments which could have a negative impact on our financial position and results of operation.

**Item 1B. Unresolved Staff Comments.**

None.

**Item 1C. Cybersecurity.**

***Risk Management and Strategy***

We have certain processes in place to assess, identify and manage material cybersecurity risks. We also periodically monitor and test our information systems for potential vulnerabilities. We use various tools designed to help identify, investigate and resolve cybersecurity incidents, and to help recover from them in a timely manner. These processes, policies and tools comprise our cybersecurity risk program and are integrated into our overall risk management program.

We have implemented cybersecurity processes in accordance with our risk profile and business size and we are continually seeking to improve processes to enhance our risk management processes. Currently, we engage external resources that contribute to our existing cybersecurity practices and organizational risk assessment systems. For example, we have an employee training program that includes annual cybersecurity awareness training that is reinforced by approximately quarterly phishing campaigns.

In order to help protect us from any related cybersecurity vulnerabilities, we take a risk-based approach to the evaluation of third-party providers with whom we engage and apply mitigations and processes based on our evaluation of the sensitivity of the data accessed by the vendor and the maturity of the third-party service provider’s programs.

In fiscal 2024, and through the filing of this Annual Report on Form 10-K, we have not identified any cybersecurity incidents or threats that have materially affected us or are reasonably likely to materially affect us, including our business strategy, results of operations, or financial condition.

#### *Cybersecurity Governance*

Our management team, including our Chief Financial Officer, and our external information technology service provider are responsible for assessing and managing our material risks from cybersecurity threats. We have outsourced implementation and day-to-day function of our overall cybersecurity risk management program to our third-party information technology service provider. Our management team supervises both our internal personnel and our third-party information technology service provider.

Our management team supervises efforts to prevent, detect, mitigate, and remediate cybersecurity risks and incidents through various means, which may include briefings from the finance department or external information technology personnel; threat intelligence and other information obtained from governmental, public or private sources, including external consultants engaged by us; and alerts and reports produced by security tools deployed in the information technology environment.

Our Board of Directors has delegated oversight of cybersecurity risk management to the Audit Committee. The Audit Committee reviews our major cybersecurity risk exposures and the steps that our management has taken to monitor and control such exposures. The Audit Committee receives periodic reports from management on our cybersecurity risks. In addition, management updates the Audit Committee, as necessary or appropriate, regarding any material cybersecurity incidents.

#### **Item 2. Properties.**

Our corporate headquarters is located at 3565 General Atomics Court, Suite 200, San Diego, California 92121, where we lease office and laboratory space pursuant to a lease agreement which commenced in October 2024 and expires in October 2029. We believe that the lease agreement for our corporate headquarters is adequate to meet our needs for the foreseeable future. As we expand, we believe that suitable additional alternative spaces will be available in the future on commercially reasonable terms, if required. See Note 11 to our financial statements included elsewhere in this Annual Report on Form 10-K for additional information.

#### **Item 3. Legal Proceedings.**

From time to time, we may become involved in various legal proceedings and claims that arise in the ordinary course of our business activities. We are not currently a party to any material legal proceedings. Regardless of the outcome, litigation could have an adverse impact on us because of defense and settlement costs, diversion of management resources, negative publicity, reputational harm and other factors.

#### **Item 4. Mine Safety Disclosures.**

None.

## **PART II**

### **Item 5. Market for Registrant's Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities.**

#### **Market Information**

Our voting Class A common stock is traded on The Nasdaq Global Select Market under the symbol "CTNM." Our non-voting Class B common stock is not listed for trading on any securities exchange.

#### **Holders of Common Stock**

As of February 28, 2025, there were 31 holders of record of our Class A common stock, one of which was Cede & Co., a nominee for Depository Trust Company, and 8 holders of record of our Class B common stock. The actual number of stockholders is greater than this number of record holders and includes stockholders who are beneficial owners but whose shares are held in street name by brokers and other nominees. The number of holders of record also does not include stockholders whose shares may be held in trust by other entities.

#### **Dividend Policy**

We have never declared or paid any cash dividends on our capital stock and we do not currently intend to pay any cash dividends on our capital stock for the foreseeable future. We currently intend to retain all available funds and any future earnings to support operations and to finance the growth and development of our business. Any future determination to declare and pay dividends will be made at the discretion of our board of directors subject to applicable laws and will depend upon, among other factors, our results of operations, financial condition, business prospects, contractual restrictions, capital requirements and other factors our board of directors may deem relevant. Our future ability to pay cash dividends on our capital stock may also be limited by the terms of any future debt or preferred securities or any future credit facility.

#### **Securities Authorized for Issuance Under Equity Compensation Plans**

Information about securities authorized for issuance under our equity compensation plans is incorporated herein by reference to Item 12 of Part III of this Annual Report on Form 10-K.

#### **Performance Graph**

Under SEC rules and regulations, as a smaller reporting company we are not required to provide the information required by this item.

#### **Recent Sales of Unregistered Equity Securities**

The following sets forth information regarding all unregistered securities sold by us within the past three years. Certificates representing the securities sold and issued contained legends restricting transfer of the securities without registration under the Securities Act or an applicable exemption from registration.

##### *Issuance of Convertible Preferred Stock*

During the year ended December 31, 2023, we issued 4,016,562 shares of our Series C convertible preferred stock, at a price of \$15.00 per share, resulting in total net proceeds of approximately \$60.1 million, including issuance costs of \$0.1 million.

No underwriters were involved in the foregoing sale of securities. The sale of securities described above were deemed to be exempt from registration pursuant to Section 4(a)(2) of the Securities Act, including Regulation D and Rule 506 promulgated thereunder, as transactions by an issuer not involving a public offering. All of the purchasers in these transactions represented to us, in connection with their purchase, that they were acquiring the securities for investment and not distribution, that they could bear the risks of the investment and could hold the securities for an indefinite period of time. Such purchasers received written disclosures that the securities had not been registered under the Securities Act and that any resale must be made pursuant to a registration or an available exemption from such registration. All of the foregoing securities are deemed restricted securities for the purposes of the Securities Act.

### *Issuance of Common Stock upon Conversion of Outstanding Preferred Stock*

On April 9, 2024, upon closing of the IPO, the Company's outstanding convertible preferred stock automatically converted into 9,177,064 shares of Class A common stock and 6,729,172 shares of Class B common stock. The issuance of such shares Class A and Class B common stock was exempt from the registration requirements of the Securities Act, pursuant to Section 3(a)(9) of the Securities Act, involving an exchange of securities exchanged by the issuer with its existing security holders exclusively where no commission or other remuneration is paid or given directly or indirectly for soliciting such exchange. No underwriters were involved in this issuance of shares. Following the closing of the IPO, no shares of redeemable convertible preferred stock were authorized or outstanding.

### *Warrant to Purchase Common Stock*

As of December 31, 2023, we had outstanding an immediately exercisable warrant to purchase 15,764 shares of our Series B convertible preferred stock at an exercise price of \$9.52 per share. The warrant is subject to a cashless exercise mechanism. In connection with the IPO, on April 9, 2024, the warrant became exercisable for an aggregate of 15,764 shares of our Class A common stock at an exercise price of \$9.52 per share. The issuance of such warrant was exempt from the registration requirements of the Securities Act, pursuant to Section 3(a)(9) of the Securities Act, involving an exchange of securities exchanged by the issuer with its existing security holders exclusively where no commission or other remuneration is paid or given directly or indirectly for soliciting such exchange. No underwriters were involved in this issuance of this warrant.

### *Grants of Stock Options*

On March 27, 2024, we granted to certain of our directors, employees and consultants (in connection with continuous services provided to us by such persons) options to purchase 242,278 shares of our common stock with a weighted average exercise price of \$16.18 per share under our 2012 Equity Incentive Plan. The number of shares of our common stock and the weighted-average exercise price have been adjusted to reflect the reverse stock split related to our IPO in April 2024.

During 2023, we granted to certain of our directors, employees and consultants (in connection with continuous services provided to us by such persons) options to purchase 591,367 shares of our common stock with a weighted average exercise price of \$10.80 per share under our 2012 Equity Incentive Plan. The number of shares of our common stock and the weighted-average exercise price have been adjusted to reflect the reverse stock split related to our IPO in April 2024.

During 2022, we granted to certain of our directors, employees and consultants (in connection with continuous services provided to us by such persons) options to purchase 59,189 shares of our common stock with a weighted average exercise price of \$8.51 per share under our 2012 Equity Incentive Plan. The number of shares of our common stock and the weighted-average exercise price have been adjusted to reflect the reverse stock split related to our IPO in April 2024.

The offer, sale and issuance of these options were deemed to be exempt from registration under the Securities Act in reliance on either Rule 701 in that the transactions were under compensatory benefit plans and contracts relating to compensation as provided under Rule 701 or Section 4(a)(2) in that the issuance of securities was to accredited investors in a private placement transaction that did not involve a public offering. No underwriters were involved in this issuance of these options.

### **Use of Proceeds**

On April 4, 2024, our Registration Statement on Form S-1 (333-278003) relating to the initial public offering of our common stock was declared effective by the SEC (the "Registration Statement"). Pursuant to such Registration Statement, we issued and sold an aggregate of 7,423,682 shares of our common stock, which includes 548,682 shares sold pursuant to the underwriters' partial exercise of their option to purchase additional shares, at the public offering price of \$16.00 per share. On April 9, 2024, we closed the sale of 6,875,000 shares and on April 19, 2024, we closed the sale of the 548,682 shares sold pursuant to the underwriters' partial exercise of their option to purchase additional shares. The aggregate offering price for shares sold in the IPO was approximately \$118.8 million, resulting in aggregate net proceeds of approximately \$107.9 million, after deducting the underwriting discounts, commissions and offering expenses paid or payable by us. No offering expenses were paid or payable, directly or indirectly, to our directors or officers, to persons owning 10% or more of any class of our equity securities, or to any of our affiliates. Goldman Sachs & Co. LLC, Morgan Stanley & Co. LLC, Stifel Nicolaus & Company, Incorporated and RBC Capital Markets, LLC acted as joint book-running managers for the IPO.



There has been no material change in the planned use of proceeds from our IPO from those described in the final Prospectus, dated April 4, 2024, filed with the SEC on April 8, 2024, pursuant to Rule 424(b) of the Securities Act.

#### **Purchases of Equity Securities by the Issuer and Affiliated Parties**

None.

#### **Item 6. [Reserved]**

#### **Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations.**

*The following discussion and analysis of our financial condition and results of operations should be read together with our audited financial statements and related notes included elsewhere in this Annual Report on Form 10-K. The following discussion and analysis contains forward-looking statements that involve risks, uncertainties and assumptions. Our actual results and timing of selected events could differ materially from those anticipated in these forward-looking statements as a result of many factors, including, but not limited to, those discussed under the section titled "Risk Factors" and elsewhere in this report. See also the section titled "Special Note Regarding Forward-Looking Statements" elsewhere in this report.*

##### **Overview**

We are a clinical-stage biopharmaceutical company pioneering differentiated therapies for the treatment of NI&I indications with significant unmet need. We target biological pathways associated with specific clinical impairments that we believe, once modulated, will demonstrably alter the course of disease.













We have focused our efforts on developing selective compounds targeting challenging molecular pathways and have built a portfolio of small molecule drug candidates. We believe our two clinical stage, internally-discovered drug candidates, PIPE-791 and PIPE-307, will have broad applicability across multiple NI&I indications. We are developing PIPE-307 in collaboration with J&J.

Our wholly-owned lead asset, PIPE-791, is a novel, brain penetrant, small molecule inhibitor of the LPA1R in development for IPF, PrMS, and chronic pain. LPA1R antagonism is a clinically validated mechanism in IPF, and we believe that our preclinical studies and Phase 1 healthy volunteer data support the development of PIPE-791 for IPF, as well as PrMS and chronic pain. Specifically, based on its high bioavailability, low plasma protein binding, and long receptor residence time in our preclinical studies compared to the preclinical data of other LPA1R antagonists, we believe PIPE-791 has the potential to be a differentiated LPA1R therapy. We have completed a Phase 1 clinical trial of PIPE-791 in healthy volunteers in support of clinical development in IPF, PrMS and chronic pain. In December 2024, we commenced a Phase 1b open-label trial to measure the relationship of PK to lung and brain receptor occupancy by PET imaging. We expect the top-line data from this trial will be available in the second quarter of 2025. This Phase 1b PET trial will inform dose selection for our planned Phase 2 trials of PIPE-791 in IPF and PrMS. In November 2024, the FDA authorized our IND for the treatment of chronic pain associated with two separate indications, OA and LBP. On March 4, 2025, we announced the initiation of patient dosing in an exploratory PIPE-791 Phase 1b, randomized, double-blind, placebo-controlled, crossover, chronic pain trial. We expect to enroll approximately 40 patients at up to five sites in the U.S., and a treatment duration of 28 days. We anticipate top-line data from this trial in early 2026.

Our second drug candidate, PIPE-307, is a novel, small molecule selective inhibitor of the M1R, in development for depression and RRMS. We have completed two Phase 1 trials of PIPE-307 in healthy volunteers. In 2023, we initiated a Phase 2 VISTA trial of PIPE-307 for the potential treatment of RRMS. In January 2025, we announced that we have fully enrolled our Phase 2 VISTA trial. We expect the top-line data from this trial will be available in the second half of 2025. In December 2024, J&J began recruiting an estimated 124 adult participants for a Phase 2 trial of PIPE-307/JNJ-89495120 for the potential treatment of MDD. This trial is a randomized, double-blind, multicenter, placebo-controlled, proof-of-concept study to evaluate the efficacy, safety and tolerability of PIPE-307/JNJ-89495120 as monotherapy in adult participants with MDD. We believe PIPE-307 is the most advanced selective M1R antagonist in clinical development.

In addition, we are leveraging our drug discovery capabilities to expand our clinical portfolio. In January 2024, we nominated and commenced preclinical studies for CTX-343, a peripherally-restricted (unable to access the CNS) LPA1R antagonist. In parallel, we are actively conducting preclinical and discovery-phase experiments targeting other NI&I indications where our internally-discovered molecules may have therapeutic potential.

We are currently focused on developing the following product candidates in our pipeline:

Drug Candidate	Mechanism	Program	Preclinical	Phase 1	Phase 2	Phase 3	Worldwide Rights
PIPE-791	LPA1R Antagonist	IPF					
PIPE-791	LPA1R Antagonist	PrMS					
PIPE-791	LPA1R Antagonist	Chronic Pain					
CTX-343	LPA1R Antagonist	Peripheral					
PIPE-307	M1R Antagonist	RRMS					Johnson&Johnson
PIPE-307 (JNJ-5120)	M1R Antagonist	Major Depressive Disorder					Johnson&Johnson
Calpain	Calpain Inhibitor	Undisclosed					

We expect our operating expenses to significantly increase as we continue to develop, conduct clinical trials, and seek regulatory approvals for our drug candidates, engage in other research and development activities to expand the indications for our existing drug candidates and develop a pipeline of additional drug candidates, expand our operations and headcount, maintain and expand our intellectual property portfolio, and, if we obtain approval for one or more of our drug candidates, launch commercial activities. We also expect to incur additional operating expenses as we continue operating as a public company. Our net losses may fluctuate significantly from quarter-to-quarter and year-to-year, depending on the timing and scope of our clinical trials and our expenditures on other research and development activities.

As we continue to pursue our business plan, we expect to finance our operations through both public and private sales of equity, debt financings or other commercial arrangements, which could include income from collaborations, strategic partnerships or marketing, distribution, licensing or other strategic arrangements with third parties. However, there can be no assurance that any additional financing or strategic transactions will be available to us on acceptable terms, if at all. If events or circumstances occur such that we do not obtain additional funding, we may need to delay, reduce or eliminate our product development or future commercialization efforts, which could have a material adverse effect on our business, results of operations or financial condition. Further, if we raise funds through licensing or other commercial arrangements with third parties, we may be required to relinquish valuable rights to our technology, future revenue streams, research programs or drug candidates or may be required to grant licenses on terms that may not be favorable to us and/or may reduce the value of our common stock.

### Collaboration

In February 2023, we entered into a license agreement with J&J (the “J&J License Agreement”), pursuant to which we granted J&J an exclusive, worldwide license to develop, manufacture and commercialize PIPE-307 in all indications.

J&J is generally responsible for all development, manufacturing and commercialization activities for PIPE-307. Upon J&J conducting a first Phase 3 clinical trial for a product using PIPE-307, we have an opt-in right to fund a portion of all Phase 3 and subsequent development costs for PIPE-307. If we opt to fund such development costs, then the royalties we are eligible to receive will increase by one to two percentage points.

We are conducting, at our own expense, a Phase 2 clinical trial of PIPE-307 in patients with RRMS. We completed enrollment of our Phase 2 clinical trial in December 2024, and expect the top-line data from this trial will be available in the second half of 2025. J&J has the right to discontinue our clinical trial if it has good faith concerns that this trial presents safety risks or could have a material adverse effect on its development or commercialization of PIPE-307. In addition, J&J has the right, in its sole discretion, to further develop or to elect not to develop PIPE-307 for this indication. In December

2024, J&J began recruiting an estimated 124 adult participants for a Phase 2 trial of PIPE-307/JNJ-89495120 for the potential treatment of MDD. This trial is a randomized, double-blind, multicenter, placebo-controlled, proof-of-concept study to evaluate the efficacy, safety and tolerability of PIPE-307/JNJ-89495120 as monotherapy in adult participants with MDD.

The J&J License Agreement expires on a licensed product-by-product and country-by-country basis upon the last to occur of: (i) the expiration of the last-to-expire licensed patent claim covering the composition of matter of the licensed compound in such licensed product in such country; (ii) the expiration of exclusive marketing rights conferred by a regulatory authority or applicable law (other than patent exclusivity) for such licensed product in such country; or (iii) ten years after the first commercial sale of such licensed product in such country. Either party may terminate the J&J License Agreement in the event of an uncured material breach by the other party or a bankruptcy or insolvency of the other party. J&J may terminate the J&J License Agreement without cause upon prior written notice to us. Upon any termination, all license rights granted to J&J terminate.

## **Financial Operations Overview**

### ***Revenue***

We recognize license revenues as identified performance obligations are satisfied or other events occur, specifically related to our J&J License Agreement. Pursuant to the terms of the J&J License Agreement, we received an upfront payment of \$50.0 million in May 2023. We are also eligible to receive approximately \$1.0 billion in non-refundable, non-creditable milestone payments, pursuant to the terms of the J&J License Agreement. Additionally, we are eligible to receive tiered royalties in the low-double digit to high-teen percent range on net sales of products containing PIPE-307. We determined that the initial transaction price under the J&J License Agreement equals \$50.0 million, consisting solely of the upfront, non-refundable payment of \$50.0 million received during the year ended December 31, 2023. There was no revenue recognized during the year ended December 31, 2024. We do not have any products approved for sale and we have not yet generated any revenue from product sales.

### ***Operating Expenses***

#### ***Research and Development***

Research and development expenses consist primarily of costs incurred for our internal research and development activities.

Direct costs include:

- employee-related expenses, including salaries, related benefits, and travel that can be directly attributable to each research project;
- expenses incurred in connection with research, laboratory consumables and preclinical studies;
- expenses incurred in connection with conducting clinical trials, including investigator grants and site payments for time and pass-through expenses and expenses incurred under agreements with CROs, other vendors or central laboratories and service providers engaged to conduct our trials;
- the cost of consultants engaged in research and development related services;
- the cost to manufacture drug products for use in our preclinical studies and clinical trials; and
- costs related to regulatory compliance.

Unallocated internal research and development costs include:

- employee-related expenses, including salaries, related benefits, and travel that cannot be directly attributable to a specific research project;
- stock-based compensation for employees engaged in research and development functions; and
- facilities, depreciation and other related expenses.

We expense our research and development costs as they are incurred. We record advance payments for goods or services to be received in the future for use in research and development as prepaid expenses. We then expense the prepaid amounts as the related goods are delivered or the services are performed.

We track outsourced development costs, consultant costs and other external research and development costs such as third-party contract costs relating to manufacturing, clinical trial activities, translational medicine and toxicology activities to specific programs. We allocate employee related costs including salaries and related benefits based upon the level of effort for each specific project.

Certain employee activities that cannot be allocated to any one specific project or management related activities are considered indirect costs. The following tables summarize our research and development expenses for the years ended December 31, 2024 and 2023. The direct external development program expenses reflect external costs attributable to our clinical development and preclinical programs and personnel costs that can be directly attributed to a development program. The unallocated internal research and development costs include unallocated personnel costs, facility costs, stock-based compensation, laboratory consumables and discovery and research related activities.

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
	<b>(in thousands)</b>	
Direct external development program expense		
PIPE-791	\$ 11,257	\$ 11,181
PIPE-307	11,249	4,565
CTX-343	2,460	742
Discovery programs	4,789	3,457
Unallocated internal research and development costs		
Personnel related	2,721	1,583
Stock-based compensation	2,846	1,061
Facilities costs	1,183	936
Others	1,917	4,078
Total research and development costs	<u>\$ 38,422</u>	<u>\$ 27,603</u>

Research and development activities are central to our business model. There are numerous factors associated with the successful commercialization of any of our drug candidates, including future clinical trial design and various regulatory requirements, many of which we cannot determine with accuracy at this time based on our stage of development. In addition, future regulatory factors beyond our control may impact our clinical development programs. Drug 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. At this time, we cannot reasonably estimate or know the nature, timing and costs of the efforts that will be necessary to complete the preclinical and clinical development of any of our drug candidates and our costs may increase if we exercise our opt-in right to fund a portion of all Phase 3 and subsequent development costs for PIPE-307 pursuant to the J&J License Agreement. However, we expect that our research and development expenses will increase substantially in connection with our planned preclinical and clinical development activities in the near term and for the foreseeable future.

The successful development of our drug candidates is highly uncertain. This is due to numerous risks and uncertainties, including the following:

- successful completion of preclinical studies and clinical trials;
- delays in regulators or IRBs authorizing us or our investigators to commence or continue our clinical trials;
- our ability to negotiate agreements with clinical trial sites or CROs;
- the number of clinical sites included in our clinical trials;
- raising additional funds necessary to complete clinical development of our drug candidates;

- obtaining and maintaining patent, trade secret and other intellectual property protection and regulatory exclusivity for our drug candidates;
- establishing and qualifying manufacturing capabilities for clinical supplies of our drug candidates, whether directly or through qualified third party manufacturers;
- our ability to receive necessary regulatory approvals from the FDA and comparable governmental bodies outside the United States;
- our decision to elect to fund a portion of Phase 3 and subsequent development costs for PIPE-307;
- coverage for our products by governmental and third party payors;
- protecting and enforcing our rights in our intellectual property portfolio;
- our ability to successfully compete with our competitors and their product offerings; and
- maintaining a continued acceptable safety profile of the products following approval.

A change in the outcome of any of these variables with respect to the development of our drug candidates may significantly impact the costs and timing associated with the development of our drug candidates. We may never succeed in obtaining regulatory approval for any of our drug candidates or successfully commercialize our products, even if approved.

#### *General and Administrative*

General and administrative expenses consist primarily of salaries and employee-related costs, including stock-based compensation, for personnel in executive, finance and other administrative functions. Other significant costs include legal fees relating to intellectual property, patent applications, and corporate matters, professional fees for accounting and consulting services and facility-related costs.

We expect our general and administrative expenses will increase for the foreseeable future to support our increased research and development activities, the growth of our business operations and headcount and to reflect increased operating expenses as we continue operating as a public company. These increased costs will likely include increased expenses related to audit, legal, regulatory services associated with maintaining compliance with exchange listing and SEC requirements, director and officer insurance premiums and investor relations costs.

#### ***Other Income (Expense)***

##### *Interest Income*

Interest income consists of interest earned on our cash, cash equivalents and marketable securities.

##### *Interest Expense*

Interest expense consists of (i) interest on our outstanding loan and security agreement (the “Loan Agreement”) with First Citizens Bank (“First Citizens”), and (ii) amortization of our debt discount associated with the Loan Agreement recorded in connection with the fair value of the warrant issued to First Citizens, the debt issuance costs incurred and the obligation to make a final payment fee. We repaid all of the outstanding principal on the Loan Agreement as of June 2023.

#### ***Income Taxes***

We are subject to corporate U.S. federal and state income taxation. As of December 31, 2024 and 2023, we had federal net operating loss carryforwards of \$46.7 million and \$37.3 million, respectively, and state net operating loss carryforwards of \$81.4 million and \$81.4 million, respectively. As a result of the TCJA, for U.S. federal income tax purposes, net operating losses generated prior to January 1, 2018 can be carried forward for up to 20 years, while net operating losses generated on or after January 1, 2018 can be carried forward indefinitely, but are limited to 80% utilization against future taxable income each year. Utilization of our net operating loss carryforwards may be subject to a substantial annual limitation due to the ownership change limitations provided by the IRC and similar state provisions. This annual limitation may result in the expiration of our net operating losses and credits before utilization.



We estimate our income tax provision, including deferred tax assets and liabilities, based on management's judgment. We record a valuation allowance to reduce our deferred tax assets to the amounts that are more likely than not to be realized. We consider future taxable income, ongoing tax planning strategies and our historical financial performance in assessing the need for a valuation allowance. If we expect to realize deferred tax assets for which we have previously recorded a valuation allowance, we will reduce the valuation allowance in the period in which such determination is first made.

We record liabilities related to uncertain tax positions in accordance with the guidance that clarifies the accounting for uncertainty in income taxes recognized in an enterprise's financial statements by prescribing a minimum recognition threshold and measurement attribute for purposes of financial statement recognition and measurement of a tax position taken or expected to be taken in a tax return.

As of December 31, 2024 and 2023, we had gross unrecognized tax benefits of \$3.1 million and \$2.6 million, respectively, all of which would affect our income tax expense if recognized, before consideration of our valuation allowance.

## Results of Operations

### Comparison of the Years Ended December 31, 2024 and 2023

The following table summarizes our results of operations (in thousands) for the years ended December 31, 2024 and 2023:

	Years Ended December 31,		
	2024	2023	Change
License revenue	\$ —	\$ 50,000	\$ (50,000)
Operating expenses:			
Research and development	38,422	27,603	10,819
General and administrative	12,472	6,320	6,152
Total operating expenses	50,894	33,923	16,971
Income (loss) from operations	(50,894)	16,077	(66,971)
Other income (expense)			
Interest income	8,905	4,606	4,299
Interest expense	—	(208)	208
Change in fair value of warrant liability	(106)	5	(111)
Change in fair value of investor rights and obligations liability	—	2,867	(2,867)
Other expense	(163)	(177)	14
Total other income, net	8,636	7,093	1,543
Income (loss) before income	(42,258)	23,170	(65,428)
Provision for income taxes	—	450	(450)
Net income (loss)	<u>\$ (42,258)</u>	<u>\$ 22,720</u>	<u>\$ (64,978)</u>

**License revenue.** License revenues were \$50.0 million for the year ended December 31, 2023. The revenue for the year ended December 31, 2023 is solely attributable to an upfront payment from the J&J License Agreement.

**Research and development expenses.** Research and development expenses were \$38.4 million and \$27.6 million for the years ended December 31, 2024 and 2023, respectively. The increase of \$10.8 million was primarily due to the following:

- \$5.6 million increase in contract research organization costs primarily related to our ongoing VISTA Phase 2 clinical trial for PIPE-307 for the potential treatment of RRMS, Phase 1b trial for PIPE-791 for the treatment of chronic pain, and Phase 1b PET trial for PIPE-791,
- \$4.1 million increase in expenses for toxicology studies primarily for PIPE-791,
- \$3.1 million increase in personnel-related expense associated with an increase in personnel from period to period,

- \$1.8 million increase in non-cash stock-based compensation,
- \$0.5 million increase in biology and chemistry supplies, and
- \$0.2 million increase in facilities costs.

Partially offsetting these increases was a \$3.0 million decrease in consulting expense associated with contractual milestone payments paid in 2023 related to the receipt of the upfront payment from the J&J License Agreement and a \$2.0 million decrease in manufacturing expenses for PIPE-791.

**General and administrative expenses.** General and administrative expenses were \$12.5 million and \$6.3 million for the years ended December 31, 2024 and 2023, respectively. The increase of \$6.2 million was primarily due to a \$2.8 million increase in non-cash stock-based compensation, a \$1.6 million increase in consulting and legal expenses, a \$1.3 million increase in personnel-related expenses related to an overall increase in personnel from period to period, and a \$0.5 million increase in director and officer insurance associated with our recently completed IPO.

**Interest income.** Interest income was \$8.9 million and \$4.6 million for the years ended December 31, 2024 and 2023, respectively. The increase of \$4.3 million was due to an increase in funds invested in marketable securities and an increase in the yields earned on our marketable securities.

**Change in fair value of investor rights and obligations liability.** In 2023, we recognized a \$2.9 million non-cash gain related to the decrease in fair value of our investor rights and obligations liability as the result of a change in a specified limited partner's status which resulted in the termination of certain rights.

**Provision for income taxes.** For the year ended December 31, 2024, we did not record an income tax expense benefit due to the full valuation allowance and no benefit from a forecasted the pretax loss operating loss for the year ended December 31, 2024. For the year ended December 31, 2023, we recorded tax expense of \$0.5 million, on pretax income of \$23.2 million.

## **Liquidity and Capital Resources**

### ***Sources of Liquidity***

We have incurred net losses and negative cash flows from operations in nearly every reporting period since our inception and anticipate that we will continue to incur net losses for the foreseeable future. We expect to incur substantial expenditures as we advance our drug candidates through clinical development, undergo the regulatory approval process, engage in other research and development activities to expand our pipeline of drug candidates, expand our operations and headcount, maintain and expand our intellectual property portfolio and, if we obtain approval for one or more of our drug candidates, launch commercial activities. We also expect to incur additional costs associated with our operating as a public company, including significant legal, accounting, investor relations, director and officer insurance, and other expenses that we did not incur as a private company.

Through December 31, 2024, we have funded our operations primarily through the issuance of convertible promissory notes, the private placements of our convertible preferred stock, the J&J License Agreement, our Loan Agreement with First Citizens, and net proceeds from our initial public offering ("IPO"). Through December 31, 2024, we have raised gross proceeds of approximately \$312.8 million from the issuance of our convertible preferred stock, promissory notes, our Class A common stock in the IPO, and have received an upfront payment from the J&J License Agreement of \$50.0 million. Upon the closing of our IPO, our outstanding convertible preferred stock automatically converted into Class A common stock or Class B common stock, as applicable. In April 2024, we raised approximately \$107.9 million in net proceeds from the IPO of our shares of Class A common stock. As of December 31, 2024, we had an accumulated deficit of \$117.4 million.

As of December 31, 2024, we had cash, cash equivalents and marketable securities of \$204.8 million. Based on our current operating plan, we believe that our existing cash and cash equivalents and short-term investments, will be sufficient to meet our anticipated operating expenses and capital expenditure requirements through at least the next 12 months, following the date of this Annual Report.

As we continue to pursue our business plan, we expect to finance our operations through both public and private sales of equity, debt financings or other commercial arrangements, which could include milestone payments from collaborations, strategic partnerships or marketing, distribution, licensing or other strategic arrangements with third parties. However, there can be no assurance that any additional financing or strategic transactions will be available to us on acceptable terms, if at all. If events or circumstances occur such that we do not obtain additional funding, we may need to delay, reduce or eliminate our product development or future commercialization efforts, which could have a material adverse effect on our business, results of operations or financial condition. Further, if we raise funds through licensing or other commercial arrangements with third parties, we may be required to relinquish valuable rights to our technology, future revenue streams, research programs or drug candidates or may be required to grant licenses on terms that may not be favorable to us and/or may reduce the value of our common stock.

## ***Cash Flows***

The following table sets forth a summary of our cash flows for the period indicated (in thousands):

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
Net cash provided by (used in) operating activities	\$ (32,845)	\$ 19,349
Net cash used in investing activities	(69,739)	(65,568)
Net cash provided by financing activities	109,001	56,176
Net increase in cash and cash equivalents	<u>\$ 6,417</u>	<u>\$ 9,957</u>

### *Operating Activities*

Net cash used in operating activities for the year ended December 31, 2024 was primarily due to our net loss of \$42.3 million, partially offset by \$4.1 million of non-cash charges such as stock-based compensation, depreciation and amortization, operating lease expense, accretion of premiums/discounts on marketable securities, and change in fair value of an outstanding warrant to purchase shares of our common stock. Also impacting our net cash used in operating activities for the year ended December 31, 2024 was a \$5.3 million increase in our in operating assets and liabilities. Net cash provided by operating activities for the year ended December 31, 2023 was primarily due to our net income of \$22.7 million, offset by \$2.3 million of non-cash charges such as stock-based compensation, depreciation and amortization, non-cash operating lease expense, accretion of premiums/discounts on marketable securities, the change in fair value of our investor rights and obligations liability, and accretion of debt discount, and a \$1.0 million change in operating assets and liabilities.

### *Investing Activities*

Net cash used in investing activities was \$69.7 million for the year ended December 31, 2024, which primarily consisted of \$226.4 million of purchases of marketable securities and \$0.5 million of purchases of property and equipment, partially offset by \$157.2 million of proceeds from sales and maturities of marketable securities. Net cash used in investing activities was \$65.6 million for the year ended December 31, 2023, which primarily consisted of \$141.9 million of purchases of marketable securities and \$0.4 million of purchases of property and equipment, partially offset by \$76.7 million of proceeds from sales and maturities of marketable securities.

### *Financing Activities*

Net cash provided by financing activities was \$109.0 million for the year ended December 31, 2024, which primarily related to \$107.9 million of net proceeds from the issuance of common stock in our IPO, \$0.4 million of proceeds from the exercise of stock options, and \$0.4 million of proceeds from purchases made under our employee stock purchase plan. Net cash provided by financing activities was \$56.2 million for the year ended December 31, 2023, which primarily related to \$60.1 million of net proceeds from the issuance of Series C convertible preferred stock and \$0.2 million of proceeds from the exercise of stock options, partially offset by \$3.8 million principal payments on our outstanding Loan Agreement and \$0.3 million payments of deferred offering costs.

## ***Funding Requirements***

We expect our operating expenses to significantly increase as we continue to develop and seek regulatory approvals for our drug candidates, engage in other research and development activities to expand our pipeline of drug candidates, expand our operations and headcount, maintain and expand our intellectual property portfolio, and, if we obtain approval for one or more of our drug candidates, launch commercial activities. However, our forecast of the period of time through which our financial resources will be adequate to support our operations is a forward-looking statement that involves risks and uncertainties, and our actual results could vary materially. We have based this estimate on assumptions that may prove to be wrong, and we could deplete our capital resources sooner than we expect. Additionally, the process of testing our drug candidates in clinical trials is costly, and the timing of progress and expenses in these trials is uncertain.

Our future capital requirements will depend on many factors, including:

- the type, number, scope, progress, expansions, results, costs and timing of, our clinical trials and preclinical studies for our drug candidates or other potential drug candidates or indications which we are pursuing or may choose to pursue in the future;
- the outcome, timing and costs of regulatory review of our drug candidates;
- the costs and timing of manufacturing for our drug candidates;
- our efforts to enhance our operational systems and hire additional personnel to satisfy our obligations as a public company, including enhanced internal controls over financial reporting;
- the costs associated with hiring additional personnel and consultants as our preclinical and clinical activities expand;
- the costs and timing of establishing or securing manufacturing facilities for our drug candidates;
- the costs and timing of establishing sales and marketing capabilities if any of our drug candidates are approved;
- our ability to establish and maintain strategic collaborations, licensing or other arrangements;
- the financial terms of any such agreements that we may enter into;
- our decision to elect to fund a portion of Phase 3 and subsequent development costs for PIPE-307;
- the costs of obtaining, maintaining and enforcing our patent and other intellectual property rights; and
- costs associated with any drug candidates, products or technologies that we may in-license or acquire.

Until such time as we can generate significant revenue from sales of our drug candidates, if ever, we expect to finance our cash needs through public or private equity or debt financings or other commercial arrangements, including collaborations, strategic partnerships or marketing, distribution, licensing or other strategic arrangements with third parties. We may be unable to raise additional funds or enter into such commercial arrangements when needed, on favorable terms, or at all. To the extent that we raise additional capital through the sale of equity or convertible debt securities, the ownership interest of our stockholders will be or could be diluted, and the terms of these securities may include liquidation or other preferences that adversely affect the rights of our common stockholders. Debt financing and equity financing, if available, may involve agreements that include covenants limiting or restricting our ability to take specific actions, such as incurring additional debt, making capital expenditures or declaring dividends. If we raise funds through collaborations, or other similar arrangements with third parties, we may be required to relinquish valuable rights to our drug candidates, future revenue streams or research programs or may be required to grant licenses on terms that may not be favorable to us and may reduce the value of our common stock. If we are unable to raise additional funds through equity or debt financings or through commercial arrangements when needed, we may be required to delay, limit, reduce or terminate our product development or future commercialization efforts or grant rights to develop and market our drug candidates even if we would otherwise prefer to develop and market such drug candidates ourselves.

## **Contractual Obligations and Commitments**

Our contractual obligations and commitments relate to our operating leases that relate primarily to our leases of office and laboratory space in San Diego, California. Our total contractual commitments for our lease agreements amount to approximately \$7.6 million as of December 31, 2024.

We enter into contracts in the normal course of business for contract research services, contract manufacturing services, professional services and other services and products for operating purposes. These contracts generally provide for termination after a notice period, and, therefore, are cancelable contracts and not included in the table above.

## **Off-Balance Sheet Arrangements**

During the periods presented, we did not have, nor do we currently have, any off-balance sheet arrangements as defined under the rules and regulations of the SEC.

## **Critical Accounting Policies and Significant Judgments and Estimates**

Our management's discussion and analysis of our financial condition and results of operations are based on our financial statements, which have been prepared in accordance with U.S. GAAP. The preparation of these financial statements requires us to make estimates and judgments that affect the reported amounts of our assets, liabilities, revenue, and expenses and the disclosure of contingent assets and liabilities in our financial statements and accompanying notes. On an ongoing basis, we evaluate our estimates and judgments, including those related to accrued expenses, investor rights and obligations liability, stock-based compensation, and common stock valuation. We base our estimates and assumptions on historical experience, known trends and events, and various other factors that we believe are reasonable and appropriate under the circumstances, the results of which form the basis for making judgments about the carrying values of our assets and liabilities that are not readily apparent from other sources. Our actual results may differ from these estimates under different assumptions or conditions.

While our significant accounting policies are described in more detail in Note 2 to our audited financial statements included elsewhere in this report, we believe the following accounting policies and estimates to be the most critical to the preparation of our financial statements.

### ***Revenue***

Under ASC 606, we recognize revenue when our customer obtains control of promised goods or services, in an amount that reflects the consideration which we expect to receive in exchange for those goods or services. To determine the appropriate amount of revenue to be recognized for arrangements determined to be within the scope of Topic 606, we perform the following five steps: (i) identification of the contract(s) with the customer, (ii) identification of the promised goods or services in the contract and determination of whether the promised goods or services are performance obligations, (iii) measurement of the transaction price, (iv) allocation of the transaction price to the performance obligations, and (v) recognition of revenue when (or as) we satisfy each performance obligation. We only apply the five-step model to contracts when it is probable that we will collect the consideration we are entitled to in exchange for the goods or services we transfer to our customer.

A contract modification is a change in the scope or price (or both) of a contract that is approved by the parties to the contract. A contract modification exists when the rights and obligations that are created or changed by a modification are enforceable. We account for a contract modification as a separate contract when the scope of the contract increases, and the price of the contract increases by an amount that reflects the standalone selling prices of the additional promised goods or services that are distinct. If a contract modification is not accounted for as a separate contract, our accounting of the contract modification depends on whether the remaining goods or services are distinct from those already provided on or before the date of the contract modification. If the remaining goods or services are distinct from those already provided, we account for the contract modification as a termination of the existing contract and creation of a new contract. The amount of the consideration to be allocated to the remaining performance obligations consists of the consideration promised by the customer that was included in the estimate of the transaction price for the existing contract and that had not been recognized as revenues and the consideration promised as part of the contract modification. If the remaining goods or services are not distinct from those already provided, we account for the contract modification as if it were part of the existing contract and accounts for the effect that the contract modification has on the transaction price, and on the measure of progress toward complete satisfaction of the performance obligation, as a cumulative catch-up adjustment at the date of the contract modification.



### *Identification of the Contracts with the Customers*

We evaluate every contract to determine whether it in its entirety or in part represent a contract with a customer, or a collaboration agreement and, based on this determination, apply appropriate accounting guidance.

We account for a contract with a customer that is within the scope of Topic 606 when all of the following criteria are met: (i) the arrangement has been approved by the parties and the parties are committed to perform their respective obligations, (ii) each party's rights regarding the goods or services to be transferred can be identified, (iii) the payment terms for the goods or services to be transferred can be identified, (iv) the arrangement has commercial substance and (v) collection of substantially all of the consideration to which we will be entitled in exchange for the goods or services that will be transferred to the customer is probable.

### *Identification of the Performance Obligations*

The promised goods or services in our collaboration and option arrangements consist of research and development services. The arrangements also have options for additional items (i.e., license rights). Options are considered to be marketing offers and are to be accounted for as separate contracts when the customer elects such options, unless we determine the option provides a material right which would not be provided without entering into the contract. The determination as to whether such options are material rights requires significant management judgment, and management considers factors such as other similar arrangements, market data and the terms of the contractual arrangement to make such conclusion. Performance obligations are promised goods or services in a contract to transfer a distinct good or service to the customer. Promised goods or services are considered distinct when: (i) the customer can benefit from the good or service on its own or together with other readily available resources and (ii) the promised good or service is separately identifiable from other promises in the contract. In assessing whether promised goods or services are distinct, we consider factors such as the stage of development of the underlying intellectual property, the capabilities of our customer to develop the intellectual property on their own and whether the required expertise is readily available.

### *Determination of the Transaction Price*

We estimate the transaction price based on the amount of consideration we expect to receive for transferring the promised goods or services in the contract. The consideration may include both fixed consideration and variable consideration. At the inception of each arrangement that includes variable consideration, we evaluate the amount of the potential payments and the likelihood that the payments will be received. We utilize either the most likely amount method or expected value method to estimate the transaction price based on which method better predicts the amount of consideration expected to be received. If it is probable that a significant revenue reversal would not occur, the variable consideration is included in the transaction price.

All contingent future payments, which include research, development, regulatory, and sales-based royalty payments, have not been considered in the initial analysis, as they are contingent upon option(s) being exercised or are subject to significant risk of achievement.

### *Allocation of Transaction Price*

We allocate the transaction price based on the estimated standalone selling price. We must develop assumptions that require judgment to determine the standalone selling price for each performance obligation identified in the contract. We utilize key assumptions to determine the standalone selling price, which may include other comparable transactions, pricing considered in negotiating the transaction, and the estimated costs. Certain variable consideration is allocated specifically to one or more performance obligations in a contract when the terms of the variable consideration relate to the satisfaction of the performance obligation and the resulting amounts allocated to each performance obligation are consistent with the amounts we would expect to receive for satisfying each performance obligation.

### *Recognition of Revenue*

We evaluated the J&J License Agreement and concluded that it was a license of functional intellectual property, and that the identified performance obligations were satisfied upon the transfer of the license, know-how, existing inventory and manufacturing technology. Accordingly, the \$50.0 million upfront payment was recognized in May 2023 upon satisfaction of the performance obligations. The remaining consideration, consisting of future contingent milestone-based payments and royalties on net sales, is included in the transaction price when there is a basis to reasonably estimate the amount of the payment and the amount is not probable of a significant reversal of the revenue in future periods. Because of the risk that products in development with the license will not reach development-based milestones or receive regulatory

approval, contingent milestone-based payments are generally included in the transaction price upon the achievement of such milestone, and royalties are included in the transaction price upon the underlying sale occurring.

### ***Research and Development Expenses and Accruals***

We are required to estimate our expenses resulting from obligations under contracts with vendors, consultants and contract research organizations, in connection with conducting research and development activities. The financial terms of these contracts are subject to negotiations, which vary from contract to contract and may result in payment flows that do not match the periods over which materials or services are provided under such contracts. We reflect research and development expenses in our financial statements by matching those expenses with the period in which services and efforts are expended. We account for these expenses according to the progress of the associated preclinical study or clinical trial as measured by the timing of various aspects of the trial or related activities. We determine accrual estimates through review of the underlying contracts along with preparation of financial models taking into account discussions with research and other key personnel as to the progress of studies, or other services being conducted. During the course of a trial, we adjust our rate of expense recognition if actual results differ from our estimates.

There may be instances in which payments made to our vendors will exceed the level of services provided and result in a prepayment of the research and development expense. 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 the actual timing of the performance of services or the level of effort varies from our estimate, we adjust the accrual or prepaid expense accordingly. Advance payments for goods and services that will be used in future research and development activities are expensed when the activity has been performed or when the goods have been received rather than when the payment is made. Although we do not expect our estimates to be materially different from amounts actually incurred, if our estimates of the status and timing of services performed differ from the actual status and timing of services performed, it could result in us reporting amounts that are too high or too low in any particular period. To date, there have been no material differences between our estimates of such expenses and the amounts actually incurred.

### ***Stock-Based Compensation***

Stock-based compensation represents the cost of the grant date fair value of employee, officer, director and non-employee stock options. We estimate the fair value of stock options on the date of grant using the Black-Scholes option pricing model and recognize the expense over the requisite service period of the awards, which is generally the vesting period, on a straight-line basis. We account for forfeitures when they occur and reverse any compensation cost previously recognized for awards for which the requisite service has not been completed, in the period that the award is forfeited.

The Black-Scholes option pricing model uses inputs which are highly subjective assumptions and generally require significant management judgment. These assumptions include:

- *Fair Value of Common Stock*—We utilize the closing stock price of the common stock on the Nasdaq Global Market on the grant date as both the exercise price and an input to the Black Scholes option pricing model to determine stock-based compensation expense.
- *Expected Term*—The expected term represents the period that the options granted are expected to be outstanding. The expected term of stock options issued is determined using the simplified method (based on the average of the vesting term and the original contractual term) as we have concluded that our stock option exercise history does not provide a reasonable basis upon which to estimate the expected term.
- *Expected Volatility*—We derive the expected volatility of our common stock from the average historical volatilities of comparable publicly traded companies within our peer group that were deemed to be representative of future stock price trends as our common stock has not been publicly traded until our IPO. We will continue to apply this process until a sufficient amount of historical information regarding the volatility of our own stock price becomes available.
- *Risk-Free Interest Rate*—The risk-free interest rate is based on the U.S. Treasury zero-coupon issues in effect at the time of grant for periods corresponding with the expected term of the options.
- *Expected Dividend Yield*—We have never paid dividends on our common stock and do not anticipate paying any dividends in the foreseeable future. Therefore, we used an expected dividend yield of zero.

See Note 8 to our audited financial statements included elsewhere in this report for more information concerning certain of the specific assumptions we used in applying the Black-Scholes option pricing model to determine the estimated fair value of our stock options. Certain of such assumptions involve inherent uncertainties and the application of significant judgment. As a result, if factors or expected outcomes change and we use significantly different assumptions or estimates, our stock-based compensation could be materially different.

We recorded stock-based compensation of \$6.8 million for the year ended December 31, 2024, compared to \$2.2 million for the year ended December 31, 2023. As of December 31, 2024 and December 31, 2023, there was approximately \$20.7 million and \$6.6 million, respectively, of total unrecognized stock-based compensation related to nonvested stock-based compensation arrangements, which is expected to be recognized over a weighted-average period of approximately 2.9 and 1.3 years, respectively.

The intrinsic value of all outstanding options as of December 31, 2024 was approximately \$21.5 million, compared to \$14.9 million as of December 31, 2023.

### **Emerging Growth Company and Smaller Reporting Company Status**

We are an “emerging growth company” as defined in the Jumpstart Our Business Startups Act of 2012, as amended (the “JOBS Act”). Under the JOBS Act, emerging growth companies can delay adopting new or revised accounting standards issued subsequent to the enactment of the JOBS Act until such time as those standards apply to private companies. We have elected to use this extended transition period under the JOBS Act until the earlier of the date we (1) are no longer an emerging growth company or (2) affirmatively and irrevocably opt out of the extended transition period provided in the JOBS Act. As a result, our financial statements may not be comparable to companies that comply with new or revised accounting pronouncements as of public company effective dates. We will remain an emerging growth company until the earliest to occur of: (i) the last day of the fiscal year in which we have more than \$1.235 billion in annual gross revenue; (ii) the date we qualify as a “large accelerated filer” as defined in Rule 12b-2 under the Exchange Act, with at least \$700 million of equity securities held by non-affiliates; (iii) the issuance, in any three-year period, by us of more than \$1.0 billion in non-convertible debt securities; or (iv) December 31, 2029, the last day of the fiscal year ending after the fifth anniversary of our IPO.

We are also a “smaller reporting company” as defined in the Exchange Act. Even after we no longer qualify as an emerging growth company, we may continue to qualify as a “smaller reporting company,” which would allow us to take advantage of many of the same exemptions from disclosure requirements, if either (i) the market value of our stock held by non-affiliates is less than \$250 million or (ii) our annual revenue is less than \$100 million during the most recently completed fiscal year and the market value of our stock held by non-affiliates is less than \$700 million.

### ***Recently Issued Accounting Pronouncements***

See Note 2 to our financial statements included elsewhere in this report for recently issued accounting pronouncements.

### **Item 7A. Qualitative and Quantitative Disclosures about Market Risk**

Under SEC rules and regulations, as a smaller reporting company we are not required to provide the information required by this item.

**Item 8. Financial Statements and Supplementary Data.**

**CONTINEUM THERAPEUTICS, INC.**  
**INDEX TO THE FINANCIAL STATEMENTS**

	<u>Pages</u>
Report of Independent Registered Public Accounting Firm (PCAOB ID: 42).....	F-2
<b>Audited Financial Statements</b>	
Balance Sheets.....	F-3
Statements of Operations and Comprehensive Income (Loss).....	F-4
Statements of Convertible Preferred Stock and Stockholders’ Equity (Deficit).....	F-5
Statements of Cash Flows .....	F-6
Notes to Audited Financial Statements .....	F-7

## **REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM**

To the Shareholders and the Board of Directors of Contineum Therapeutics, Inc.

### **Opinion on the Financial Statements**

We have audited the accompanying balance sheets of Contineum Therapeutics, Inc. (the Company) as of December 31, 2024 and 2023, the related statements of operations and comprehensive income (loss), convertible preferred stock and stockholders' equity (deficit), and cash flows for each of the two years in the period ended December 31, 2024, 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 at December 31, 2024 and 2023, and the results of its operations and its cash flows for each of the two years in the period ended December 31, 2024, in conformity with U.S. generally accepted accounting principles.

### **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/ Ernst & Young LLP

We have served as the Company's auditor since 2020.

San Diego, California  
March 6, 2025



**CONTINEUM THERAPEUTICS, INC.**  
**BALANCE SHEETS**  
(in thousands, except share and par value data)

	<b>December 31,</b>	
	<b>2024</b>	<b>2023</b>
<b>Assets</b>		
Current assets:		
Cash and cash equivalents	\$ 21,943	\$ 15,526
Marketable securities	182,817	109,664
Prepaid expenses and other current assets	1,628	2,516
Total current assets	206,388	127,706
Property and equipment, net	989	678
Other long-term assets	3	1,283
Operating lease right-of-use assets	5,467	719
Total assets	<u>\$ 212,847</u>	<u>\$ 130,386</u>
<b>Liabilities, convertible preferred stock and stockholders' equity (deficit)</b>		
Current liabilities:		
Accounts payable	\$ 1,811	\$ 635
Accrued expenses	6,711	4,385
Current portion of operating lease liabilities	1,452	464
Total current liabilities	9,974	5,484
Other long-term liabilities	—	110
Operating lease liabilities, net of current portion	4,807	108
Total liabilities	14,781	5,702
Commitments and contingencies (Note 11)		
Convertible preferred stock, \$0.001 par value; no shares authorized, issued, or outstanding at December 31, 2024; authorized shares—16,940,594 at December 31, 2023; issued and outstanding shares—15,906,236 shares at December 31, 2023.	—	192,620
Stockholders' equity (deficit):		
Class A common stock, \$0.001 par value; authorized shares—200,000,000 and 39,630,511 at December 31, 2024 and December 31, 2023, respectively; issued and outstanding shares—19,125,377 and 2,349,554 at December 31, 2024 and December 31, 2023, respectively.	19	2
Class B common stock, \$0.001 par value; authorized shares—20,000,000 at December 31, 2024; issued and outstanding shares—6,729,172 at December 31, 2024; no shares authorized, issued, or outstanding at December 31, 2023.	7	—
Preferred stock, \$0.001 par value; authorized shares—10,000,000 at December 31, 2024; no shares issued or outstanding at December 31, 2024; no shares authorized, issued, or outstanding at December 31, 2023.	—	—
Additional paid-in-capital	315,371	7,098
Accumulated deficit	(117,402)	(75,144)
Accumulated other comprehensive income	71	108
Total stockholders' equity (deficit)	198,066	(67,936)
Total liabilities, convertible preferred stock and stockholders' equity (deficit)	<u>\$ 212,847</u>	<u>\$ 130,386</u>

*The accompanying notes are an integral part of these financial statements.*

**CONTINEUM THERAPEUTICS, INC.**  
**STATEMENTS OF OPERATIONS AND COMPREHENSIVE INCOME (LOSS)**  
(in thousands, except share and per share data)

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
Revenue		
License revenue	\$ —	\$ 50,000
Operating expenses:		
Research and development	38,422	27,603
General and administrative	12,472	6,320
Total operating expenses	50,894	33,923
Income (loss) from operations	(50,894)	16,077
Other income (expense):		
Interest income	8,905	4,606
Interest expense	—	(208)
Change in fair value of warrant liability	(106)	5
Change in fair value of investor rights and obligations liability	—	2,867
Other expense, net	(163)	(177)
Total other income, net	8,636	7,093
Income (loss) before income taxes	(42,258)	23,170
Provision for income taxes	—	450
Net income (loss)	\$ (42,258)	\$ 22,720
Other comprehensive income (loss):		
Unrealized gain (loss) on marketable securities	(37)	184
Comprehensive income (loss)	\$ (42,295)	\$ 22,904
Net income (loss) attributable to common stockholders, basic	\$ (42,258)	\$ 3,146
Net income (loss) attributable to common stockholders, diluted	\$ (42,258)	\$ 274
Net income (loss) per share, basic (a)	\$ (2.18)	\$ 1.36
Net income (loss) per share, diluted (a)	\$ (2.18)	\$ 0.08
Weighted-average common shares outstanding, basic	19,352,859	2,308,972
Weighted-average common shares outstanding, diluted	19,352,859	3,395,514

(a) Basic and diluted per share amounts are the same for Class A and Class B shares.

*The accompanying notes are an integral part of these financial statements.*

**CONTINEUM THERAPEUTICS, INC.**  
**STATEMENTS OF CONVERTIBLE PREFERRED STOCK AND STOCKHOLDERS' EQUITY (DEFICIT)**  
(in thousands, except share data)

	Convertible Preferred Stock		Class A and Class B Common Stock		Additional Paid-in Capital	Accumulated Other Comprehensive Income (Loss)	Accumulated Deficit	Total Stockholders' Equity (Deficit)
	Shares	Amount	Shares	Amount				
<b>Balance at December 31, 2022</b>	11,889,674	\$ 132,482	2,259,734	\$ 2	\$ 4,726	\$ (76)	\$ (97,864)	\$ (93,212)
Vesting of shares of common stock subject to repurchase	—	—	22,364	—	22	—	—	22
Issuance of Series C convertible preferred stock, net of offering costs of \$110	4,016,562	60,138	—	—	—	—	—	—
Exercise of stock options	—	—	70,136	—	159	—	—	159
Stock-based compensation	—	—	—	—	2,219	—	—	2,219
Repurchase of stock options	—	—	(2,680)	—	(28)	—	—	(28)
Net income	—	—	—	—	—	—	22,720	22,720
Unrealized gain on marketable securities	—	—	—	—	—	184	—	184
<b>Balance at December 31, 2023</b>	15,906,236	\$ 192,620	2,349,554	\$ 2	\$ 7,098	\$ 108	\$ (75,144)	\$ (67,936)
Issuance of common stock in connection with initial public offering, net of issuance costs of \$10,912	—	—	7,423,682	7	107,860	—	—	107,867
Conversion of convertible preferred stock to common stock upon initial public offering	(15,906,236)	(192,620)	15,906,236	17	192,603	—	—	192,620
Reclassification of warrant from liability to equity	—	—	—	—	216	—	—	216
Shares purchased through employee stock purchase plan	—	—	17,996	—	385	—	—	385
Exercise of stock options	—	—	157,081	—	405	—	—	405
Stock-based compensation	—	—	—	—	6,804	—	—	6,804
Net loss	—	—	—	—	—	—	(42,258)	(42,258)
Unrealized loss on marketable securities	—	—	—	—	—	(37)	—	(37)
<b>Balance at December 31, 2024</b>	—	\$ —	25,854,549	\$ 26	\$ 315,371	\$ 71	\$ (117,402)	\$ 198,066

*The accompanying notes are an integral part of these financial statements.*

**CONTINEUM THERAPEUTICS, INC.**  
**STATEMENTS OF CASH FLOWS**  
(in thousands)

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
<b>Operating activities</b>		
Net income (loss)	\$ (42,258)	\$ 22,720
Adjustments to reconcile net income (loss) to cash provided by (used in) operating activities:		
Depreciation and amortization	258	195
Non-cash operating lease expense	872	965
Stock-based compensation	6,804	2,219
Accretion of debt discount and debt issuance costs	—	(198)
Accretion of premiums/discounts on marketable securities, net	(3,940)	(2,675)
Change in fair value of warrant liability	106	(5)
Gain on sale of equipment	(16)	—
Change in fair value of investor rights and obligations liability	—	(2,867)
(Gain) loss on marketable securities	(5)	19
Changes in operating assets and liabilities		
Prepaid expenses and other current assets	887	(1,277)
Other long-term assets	937	7
Accounts payable	1,141	—
Accrued expenses	2,303	1,594
Other long-term liabilities	—	(20)
Operating lease liabilities	66	(1,328)
Net cash provided by (used in) operating activities	(32,845)	19,349
<b>Investing activities</b>		
Purchase of property and equipment	(514)	(414)
Proceeds from sale of equipment	20	—
Purchases of marketable securities	(226,407)	(141,866)
Sales and maturities of marketable securities	157,162	76,712
Net cash used in investing activities	(69,739)	(65,568)
<b>Financing activities</b>		
Proceeds from issuance of common stock upon initial public offering, net of underwriting discounts and commissions and other offering costs	108,211	—
Proceeds from issuance of Series C convertible preferred stock, net of offering costs	—	60,138
Payments of deferred offering costs	—	(343)
Principal payments on debt	—	(3,750)
Proceeds from exercise of stock options	405	159
Proceeds from employee stock purchase plan	385	—
Repurchase of restricted stock	—	(28)
Net cash provided by financing activities	109,001	56,176
Net increase in cash and cash equivalents	6,417	9,957
Cash and cash equivalents at beginning of year	15,526	5,569
Cash and cash equivalents at end of year	\$ 21,943	\$ 15,526
<b>Supplemental disclosure of cash flow information</b>		
Income taxes paid	\$ —	\$ 450
Interest paid	\$ —	\$ 150
<b>Supplemental disclosure of non-cash investing and financing activities</b>		
Deferred offering costs included in accounts payable and accrued liabilities	\$ —	\$ 905
Property and equipment purchases included in accounts payable	\$ 58	\$ 30
Conversion of convertible preferred stock to common stock upon initial public offering	\$ 192,620	\$ —
Reclassification of warrants from liability to equity	\$ 216	\$ —
Reclassification of deferred offering costs paid in prior year to equity	\$ 343	\$ —
Right-of-use assets obtained in exchange for lease liabilities	\$ 5,620	\$ —

*The accompanying notes are an integral part of these financial statements.*

## NOTES TO AUDITED FINANCIAL STATEMENTS

### 1. Organization and Basis of Presentation

#### *Organization and Nature of Operations*

Contineum Therapeutics, Inc. (the “Company”), is a clinical-stage biopharmaceutical company pioneering differentiated therapies for the treatment of NI&I indications with significant unmet need. The Company was incorporated in the state of Delaware in 2009, and in November 2023 changed its name from Pipeline Therapeutics, Inc. to Contineum Therapeutics, Inc.

#### *Reverse Stock Split*

On April 1, 2024, the Company filed an amendment to its fourth amended and restated certificate of incorporation as amended and effected a 1-for-5.5972 reverse stock split of its capital stock. All share and per-share amounts presented in the financial statements and related notes have been retroactively adjusted to reflect the reverse stock split as of the beginning of the first period presented.

#### *Initial Public Offering*

On April 9, 2024, the Company closed its IPO, pursuant to which it issued and sold an aggregate of 6,875,000 shares of its common stock at a public offering price of \$16.00 per share and on April 19, 2024, the Company issued and sold 548,682 additional shares of its common stock to the underwriters of the IPO pursuant to the partial exercise of their option to purchase additional shares, resulting in net proceeds of approximately \$107.9 million, after deducting underwriting discounts, commissions and other offering expenses. Upon the closing of the IPO, the Company’s outstanding convertible preferred stock automatically converted into Class A common stock or Class B common stock, as applicable. Converted redeemable convertible preferred stock outstanding as of the date of the IPO consisted of 15,906,236 shares that were outstanding immediately prior to the closing of the IPO. Following the closing of the IPO, no shares of redeemable convertible preferred stock were authorized or outstanding.

In connection with the closing of its IPO, on April 9, 2024, the Company’s certificate of incorporation was amended and restated to (i) authorize 220,000,000 shares of common stock of which 200,000,000 are designated as Class A common stock and 20,000,000 of which are designated as Class B common stock; (ii) eliminate all references to the previously existing series of preferred stock; and (iii) authorize 10,000,000 shares of undesignated preferred stock that may be issued from time to time by the Company’s board of directors in one or more series.

#### *Liquidity and Capital Resources*

Since its inception, the Company has devoted substantially all its resources to research and development activities, business planning, establishing and maintaining its intellectual property portfolio, hiring personnel, raising capital to support and expand such activities and providing general and administrative support for these operations. The Company incurred a net loss of \$42.3 million for the year ended December 31, 2024. The Company had an accumulated deficit of \$117.4 million as of December 31, 2024. From its inception through December 31, 2024, the Company has financed its operations primarily through issuance of convertible promissory notes, convertible preferred stock financings, a term loan, a global license and development agreement (the “J&J License Agreement”) the Company entered in February 2023 with Janssen Pharmaceutica NV, a Johnson & Johnson company, and net proceeds of approximately \$107.9 million received in April 2024 from the Company’s IPO.

As of December 31, 2024, the Company had cash, cash equivalents and marketable securities of \$204.8 million. Management believes the Company’s existing cash, cash equivalents, and marketable securities will be sufficient to support its operations for at least 12 months from the date of this Annual Report on Form 10-K.

As the Company continues to pursue its business plan, it expects to finance its operations through both public and private sales of equity, debt financings or other commercial arrangements, which could include income from collaborations, strategic partnerships or marketing, distribution, licensing or other strategic arrangements with third parties. However, there can be no assurance that any additional financing or strategic transactions will be available to the Company on acceptable terms, if at all. If events or circumstances occur such that the Company does not obtain additional funding, it may need to delay, reduce or eliminate its product development or future commercialization efforts, which could have a material adverse effect on the Company’s business, results of operations, financial condition and cash flows. Further, if the Company raises funds through licensing or other similar arrangements with third parties, it may be required to relinquish valuable rights to its technology, future revenue streams, research programs or drug candidates or may be required to grant licenses on terms that may not be favorable to it and/or may reduce the value of its common stock.



**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

## **2. Summary of Significant Accounting Policies**

### ***Basis of Presentation***

The Company's financial statements are prepared in accordance with U.S. GAAP.

### ***Use of Estimates***

The preparation of financial statements in conformity with U.S. GAAP requires management to make estimates and assumptions that affect the amounts reported in the Company's financial statements and accompanying notes. Accounting estimates and management judgments reflected in the financial statements include: the accrual of research and development expenses; the incremental borrowing rate used to recognize the right-of-use assets and lease liabilities, the fair value of common stock and convertible preferred stock; stock-based compensation; and the fair value of the investor preferred stock purchase rights and obligations liability. Although these estimates are based on the Company's knowledge of current events and actions it may undertake in the future, actual results may materially differ from these estimates and assumptions.

### ***Concentration of Credit Risk***

Financial instruments which potentially subject the Company to significant concentration of credit risk consist of cash, cash equivalents and marketable securities. The Company maintains deposits in federally insured financial institutions in excess of federally insured limits. The Company has not experienced any losses in such accounts, and management believes that the Company is not exposed to significant credit risk due to the financial position of the depository institutions in which those deposits are held. However, to the extent the Company holds cash deposits in amounts that exceed the FDIC insurance limitation, it may incur a loss in the event of a failure of any of the financial institutions where it maintains deposits.

### ***Comprehensive Income (Loss)***

Comprehensive income (loss) is defined as a change in equity during a period from transactions and other events and circumstances from non-owner sources.

### ***Fair Value of Financial Instruments***

The accounting guidance defines fair value, establishes a consistent framework for measuring fair value, and expands disclosure for each major asset and liability category measured at fair value on either a recurring or nonrecurring basis. Fair value is defined as an exit price representing the amount that would be received to sell an asset or paid to transfer a liability in an orderly transaction between market participants. As such, fair value is a market-based measurement that should be determined based on assumptions that market participants would use in pricing an asset or liability.

### ***Cash and Cash Equivalents***

The Company considers all highly liquid investments with an original maturity of three months or less at the date of purchase to be cash equivalents. Cash equivalents primarily represent funds invested in readily available money market accounts and short-term securities. As of December 31, 2024 and 2023, the Company had cash and cash equivalents balances deposited at major financial institutions.

### ***Marketable Securities***

The Company classifies all marketable debt securities as available for sale, as the sale of such securities may be required prior to maturity. These marketable securities are carried at fair value, with unrealized gains and losses reported in accumulated other comprehensive income (loss) until realized. The cost of debt securities is adjusted for amortization of premiums and accretion of discounts to maturity. Such amortization and accretion, as well as interest and dividends, are included in interest income. Realized gains and losses from the sale of available for sale securities, if any, are determined on a specific identification basis and are also included in interest income. The Company's marketable securities are classified as current assets, even though the stated maturity date may be one year or more beyond the current balance sheet date, which reflects management's ability and intent to use the proceeds from sales of these securities to fund its operations, as necessary.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

***Property and Equipment, Net***

Property and equipment, which consist of leasehold improvements, furniture and fixtures, lab equipment, and computer equipment and software are stated at cost less accumulated depreciation and amortization. Depreciation and amortization are calculated using the straight-line method over the estimated useful lives of the assets, which ranges from two to five years. Leasehold improvements are amortized over the shorter of the estimated useful life of the asset and the remaining life of the lease for leasehold improvements at the time the asset is placed into service.

***Leases***

The Company applies Accounting Standards Codification (“ASC”) 842, *Leases* which requires the Company to determine if a contract contains a lease at the inception of the contract and evaluate each lease agreement to determine whether the lease is an operating or finance lease. For leases where the Company is the lessee, right-of-use (“ROU”) assets represent the Company’s right to use an underlying asset for the lease term and lease liabilities represent an obligation to make lease payments arising from the lease. Liabilities from operating leases are included in current portion of operating lease liabilities, and operating lease liabilities, net of current portion on the accompanying balance sheets (see Note 11 for a summary of the Company’s right-of-use-assets and lease liabilities as of December 31, 2024). The Company does not have any financing leases. Short-term leases with an initial term of 12 months or less are not recorded on the balance sheet. The Company does not have material short-term lease costs.

Lease liabilities are measured at the present value of the remaining lease payments discounted using the discount rate for the lease established at the lease commencement date. To determine the present value, the implicit rate is used when readily determinable. For those leases where the implicit rate is not provided, the Company determines an incremental borrowing rate based on the information available at the lease commencement date in determining the present value of lease payments. ROU assets are measured at the present value of the lease payments and also include any prepaid lease payments made and any other indirect costs incurred, and reduced by any lease incentives received. Lease terms may include the impact of options to extend or terminate the lease when it is reasonably certain that the Company will exercise that option. Lease expense for operating leases is recognized on a straight-line basis over the lease term. The Company’s operating leases are subject to additional variable charges, including common area maintenance, property taxes, property insurance and other variable costs. Variable lease costs are experienced in the period incurred. The Company has elected the practical expedient to account for the lease and non-lease components, such as common area maintenance charges, as a single lease component for the Company’s facilities leases.

***Revenue Recognition***

The Company currently has no product revenue. The Company generates revenues from the J&J License Agreement, in which the Company transferred to J&J the worldwide rights to develop, manufacture, and commercialize products containing PIPE-307. Revenue for the J&J License Agreement is recognized in accordance with ASC 606, *Revenue from Contracts with Customers* (“ASC 606”). Revenue is recognized when control of the promised goods or services are transferred to the customer, in an amount that reflects the consideration the Company expects to be entitled to in exchange for transferring those goods or services. The steps for recognizing revenue consist of: (1) identifying the contract; (2) identifying the distinct performance obligations; (3) determining the transaction price for which the Company expects to be entitled in exchange for the goods and services; (4) allocating the transaction price to the performance obligations in the contract; and (5) recognizing revenue when or as the performance obligations are satisfied.

The Company allocates fixed and variable consideration based on relative standalone selling prices, unless an allocation exception for variable consideration is met. The allocated transaction price is recognized when (or as) each respective performance obligation is satisfied. For performance obligations that are satisfied at a point in time, the Company evaluates the indicators of control in ASC 606 to determine the point in time upon which control is transferred and therefore the performance obligation is satisfied. For performance obligations that are satisfied over time, the Company uses a measure of progress that best reflects the Company’s effort in satisfying the respective performance obligation to recognize revenue. The measure of progress is subject to estimates by management and may change over the course of the agreement.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

A contract modification is a change in the scope or price (or both) of a contract that is approved by the parties to the contract. A contract modification exists when the rights and obligations that are created or changed by a modification are enforceable. The Company accounts for a contract modification as a separate contract when the scope of the contract increases, and the price of the contract increases by an amount that reflects the standalone selling prices of the additional promised goods or services that are distinct. If a contract modification is not accounted for as a separate contract, the Company's accounting of the contract modification depends on whether the remaining goods or services are distinct from those already provided on or before the date of the contract modification. If the remaining goods or services are distinct from those already provided, the Company accounts for the contract modification as a termination of the existing contract and creation of a new contract. The amount of the consideration to be allocated to the remaining performance obligations consists of the consideration promised by the customer that was included in the estimate of the transaction price for the existing contract and that had not been recognized as revenues and the consideration promised as part of the contract modification. If the remaining goods or services are not distinct from those already provided, the Company accounts for the contract modification as if it were part of the existing contract and accounts for the effect that the contract modification has on the transaction price, and on the measure of progress toward complete satisfaction of the performance obligation, as a cumulative catch-up adjustment at the date of the contract modification.

***Contractual Terms for Receipt of Payments***

The contractual terms that establish the Company's right to collect specified amounts from its customers and that require contemporaneous evaluation and documentation under U.S. GAAP for the corresponding timing and amount of revenue recognition, are as follows:

(1) ***Upfront License Fees:*** The Company allocates non-refundable license fee consideration to the distinct performance obligations identified in the contract on a relative standalone selling price basis and recognizes those amounts when or as each performance obligation is satisfied. Non-refundable license fee consideration that is allocated to a distinct license of functional intellectual property is recognized at the point in time upon which control of the license transfers to the customer and not before the customer has both access and the is able to use and benefit from the license.

(2) ***Development Milestones:*** The Company utilizes the most likely amount method to estimate the amount of consideration to which it will be entitled for achievement of the development milestones as these represent variable consideration. Variable consideration is included in the transaction price to the extent that it is probable that a significant reversal in the amount of cumulative revenue recognized will not occur when the uncertainty associated with the variable consideration is subsequently resolved. For those payments based on development milestones (e.g., patient dosing in a clinical trial or the achievement of statistically significant clinical results), the Company assesses the probability that the milestone will be achieved, including its ability to control the timing or likelihood of achievement, and any associated revenue constraint. Given the high degree of uncertainty around the occurrence of these events, the Company determines the milestone and other contingent amounts to be constrained until it becomes probable that a significant reversal in the amount of cumulative revenue will not occur. At each reporting period, the Company re-evaluates this associated revenue recognition constraint. Any resulting adjustments are recorded to revenue on a cumulative catch-up basis and reflected in the financial statements in the period of adjustment.

(3) ***Regulatory Milestones:*** The Company utilizes the most likely amount method to estimate the consideration to which it will be entitled for achievement of the regulatory milestones as these represent variable consideration. Variable consideration is included in the transaction price to the extent that it is probable that a significant reversal in the amount of cumulative revenue recognized will not occur when the uncertainty associated with the variable consideration is subsequently resolved. The Company recognizes regulatory milestones in the period in which it becomes probable that a significant reversal in the amount of cumulative revenue will not occur (the regulatory milestone is no longer constrained). Due to the inherent uncertainty of achieving regulatory approval, associated milestones are deemed constrained for revenue recognition until achievement. At each reporting period, the Company re-evaluates this associated revenue recognition constraint. Any resulting adjustments are recorded to revenue on a cumulative catch-up basis and reflected in the financial statements in the period of adjustment.

(4) ***Royalties:*** Under the sales-or-usage-based royalty exception the Company recognizes revenue based on the contractual percentage of the licensee's sale of products to its customers at the later of (i) the occurrence of the related product sales or (ii) the date upon which the performance obligation to which some or all of the royalty has been allocated has been satisfied or partially satisfied.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

(5) **Sales Threshold Milestones:** Similar to royalties, applying the sales-or-usage-based royalty exception, the Company recognizes revenue from sales threshold milestones at the later of (i) the period the licensee achieves the one-time annual product sales levels in their territories for which the Company is contractually entitled to a specified lump-sum receipt, or (ii) the date upon which the performance obligation to which some or all of the milestone has been allocated has been satisfied or partially satisfied.

***Impairment of Property and Equipment***

The Company reviews long-lived assets for impairment whenever events or changes in circumstances indicate that the carrying amount of an asset may not be recoverable. If circumstances require a long-lived asset or asset group to be tested for possible impairment, the Company first compares undiscounted cash flows expected to be generated by that asset or asset group to its carrying value. If the carrying value of the long-lived asset or asset group is not recoverable on an undiscounted-cash-flow basis, an impairment is recognized to the extent that the carrying value exceeds its fair value. The Company did not recognize impairment losses for the years ended December 31, 2024 and 2023.

***Research and Development***

Research and development expenses consist primarily of direct and indirect costs incurred in connection with the Company's discovery efforts, and the preclinical and formulation development of its drug candidates. In the future, the Company expects a substantial portion of its research and development expenses will relate to the clinical development of its drug candidates. Direct costs include contracted research development and manufacturing, consulting fees, license fees, laboratory supplies and other expenses incurred to sustain research and development programs. Indirect costs include salaries, benefits, travel, stock-based compensation charges for those individuals involved in research and development efforts, and associated overhead expenses. Research and development costs are expensed as incurred.

***Accrued Research and Development Expense***

The Company is required to estimate its expenses resulting from its obligations under contracts with vendors, consultants, and contract research organizations, in connection with conducting research and development activities. The Company reflects research and development expenses in its financial statements by matching those expenses with the period in which services and efforts are expended. The Company accounts for these expenses according to the progress of the activity as measured by the timing of various aspects of the study or related activities. The Company determines accrual estimates through review of the underlying contracts along with preparation of financial models taking into account discussions with research and other key personnel as to the progress of studies, or other services being conducted. During the course of an activity, the Company adjusts its rate of expense recognition if actual results differ from its estimate. Nonrefundable advance payments for goods and services, including fees for process development or manufacturing and distribution of clinical supplies that will be used in future research and development activities, are deferred and recognized as expense in the period that the related services are performed.

***Convertible Preferred Stock***

The Company records convertible preferred stock at fair value on the dates of issuance, net of issuance costs. Upon the occurrence of certain events that are outside the Company's control, including a deemed liquidation event, holders of the convertible preferred stock can cause redemption for cash or other assets. Therefore, convertible preferred stock is classified outside of stockholders' equity (deficit) on the December 31, 2023 balance sheet as events triggering the liquidation preferences are not solely within the Company's control. The carrying values of the convertible preferred stock are adjusted to their liquidation preferences if and when it becomes probable that such a liquidation event will occur.

***Warrant***

The Company has issued a warrant to purchase shares of its convertible preferred stock. Because the underlying convertible preferred stock is classified outside of permanent equity, this warrant is classified as a liability in the accompanying balance sheets as a component of other long-term liabilities. This warrant is recorded at its estimated fair value on the date of issuance and is revalued at each subsequent reporting period, with fair value changes recognized as increases or reductions to other income (expense), net in the accompanying statements of operations and comprehensive income (loss). The Company estimates the fair value of this warrant using the Black-Scholes option pricing model. This method requires certain assumptions be used as inputs, see "Stock-Based Compensation" below.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

Upon the closing of the IPO, the warrant to purchase shares of preferred stock converted to a warrant to purchase shares of common stock, and upon conversion the warrant met the equity classification requirements and was reclassified to equity. See Note 4.

***Investor Rights and Obligations Liability***

In November 2019, in connection with the closing of our Series B convertible preferred stock financing, an investor agreed to pay a premium for the preferred stock in exchange for certain additional rights and obligations which were not provided to the other Series B convertible preferred stock investors. The Company evaluated these additional rights and obligations and concluded they met the definition of a derivative and therefore these rights and obligations were recorded at their calculated fair value at issuance. The Company initially assessed the fair value of these rights and obligations as the additional premium paid by this investor to acquire these rights and obligations. The investor rights and obligations liability is revalued at each reporting period with changes in the fair value of the liability recorded as change in fair value of investor rights and obligations in the statements of operations and comprehensive income (loss). The noted agreement was amended and replaced in its entirety on in November 2022. In April 2023, the Company was notified that an event occurred resulting in the termination of the transfer and put option rights and related obligations.

***Patent Costs***

The Company expenses all costs as incurred in connection with patent applications (including direct application fees, and the legal and consulting expenses related to making such applications) and such costs are included in general and administrative expenses in the statement of operations and comprehensive income (loss).

***Stock-Based Compensation***

Stock-based compensation represents the cost of the grant date fair value of employee, officer, director and non-employee stock option grants, recognized on a straight-line basis over the vesting period. The vesting period generally approximates the expected service period of the awards. The Company recognizes forfeitures as they occur.

The fair value of stock options is estimated using a Black-Scholes valuation model on the date of grant. This method requires certain assumptions be used as inputs, such as the fair value of the underlying common stock, expected term of the option before exercise, expected volatility of the Company's common stock, risk-free interest rate and expected dividend yield. Options granted have a maximum contractual term of ten years. The Company has limited historical stock option activity and therefore estimates the expected term of stock options granted using the simplified method, which represents the arithmetic average of the original contractual term of the stock option and its weighted-average vesting term. The expected volatility of stock options is based upon the historical volatility of a number of publicly traded companies in similar stages of clinical development. The Company will continue to apply this process until a sufficient amount of historical information regarding the volatility of its own stock price becomes available. The risk-free interest rates used are based on the U.S. Treasury yield in effect at the time of grant for zero-coupon U.S. treasury notes with maturities approximately equal to the expected term of the stock options. The Company has historically not declared or paid any dividends and does not currently expect to do so in the foreseeable future, and therefore has estimated the dividend yield to be zero.

***Commitments and Contingencies***

The Company recognizes a liability with regards to loss contingencies when it believes it is probable a liability has been incurred, and the amount can be reasonably estimated. If some amount within a range of loss appears at the time to be a better estimate than any other amount within the range, the Company accrues that amount. When no amount within the range is a better estimate than any other amount, the Company accrues the minimum amount in the range. The Company has not recorded any such liabilities as of December 31, 2024 and 2023.



**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

***Segment Reporting***

Operating segments are identified as components of an enterprise about which separate discrete financial information is available for evaluation by the chief operating decision maker, or decision-making group (“CODM”). The Company has identified its President and Chief Executive Officer, Carmine Stengone, as the CODM who is responsible for making decisions regarding resource allocation and assessing performance. The Company views its operations and manages its business as one operating segment. The Company’s long-lived assets consist primarily of property and equipment, net, which are all held in the United States.

***Income Taxes***

The Company accounts for income taxes under the asset and liability method, which requires the recognition of deferred tax assets and liabilities for the expected future tax consequences of events that have been included in the financial statements. Under this method, deferred tax assets and liabilities are determined on the basis of the differences between the financial statements and tax basis of assets and liabilities using enacted tax rates in effect for the year in which the differences are expected to reverse. The effect of a change in tax rates on deferred tax assets and liabilities is recognized in income in the period that includes the enactment date.

The Company recognizes deferred tax assets to the extent that the Company believes these assets are more likely than not to be realized. In making such a determination, management considers all available positive and negative evidence, including future reversals of existing taxable temporary differences, projected future taxable income, tax-planning strategies, and results of recent operations. If management determines that the Company would be able to realize its deferred tax assets in the future in excess of their recorded amount, management would make an adjustment to the deferred tax asset valuation allowance, which would reduce the provision for income taxes.

As of December 31, 2024 and 2023, the Company maintained valuation allowances against its deferred tax assets as the Company concluded it had not met the “more likely than not” to be realized threshold. Changes in the valuation allowance, when they are recognized in the provision for income taxes, may result in a change in the estimated annual effective tax rate.

The Company records uncertain tax positions on the basis of a two-step process whereby (1) management determines whether it is more likely than not that the tax positions will be sustained on the basis of the technical merits of the position and (2) for those tax positions that meet the more-likely-than-not recognition threshold, management recognizes the largest amount of tax benefit that is more than 50 percent likely to be realized upon ultimate settlement with the related tax authority. The Company recognizes interest and penalties related to unrecognized tax benefits within income tax expense. Any accrued interest and penalties are included within the related tax liability. As of and for the years ended December 31, 2024 and 2023, the Company had no accrued interest or penalties related to unrecognized tax benefits.

***Net Income (Loss) Per Share***

Basic net income (loss) per share allocable to common stockholders is presented in conformity with the two-class method required for participating securities. All classes of outstanding preferred stock are considered participating securities as, in the event a dividend is paid on common stock, the holders of preferred stock would be entitled to receive dividends as the higher of their dividend preference or the amount they would receive if the shares were converted to common stock immediately prior to the dividend. The two-class method determines net income per share for each class of common and participating securities according to dividends declared or accumulated as well as participation rights in undistributed earnings. The two-class method requires income available to stockholders for the period to be allocated between common and participating securities based upon their respective rights to receive dividends as if all income for the period had been distributed. Under the two-class method, any net loss attributable to common stockholders is not allocated to the preferred stock as the holders of the preferred stock do not have a contractual obligation to share in losses.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

Basic net income (loss) is calculated by dividing net income (loss) attributable to common stockholders by the weighted-average number of common shares outstanding during the period. Common shares used in diluted net income (loss) per share include the dilutive effect of potentially dilutive securities, which include common stock options, a common stock warrant, shares available for issuance under the 2024 Plan, and common stock reserved under the 2024 ESPP. However, potentially issuable common shares are not used in computing diluted net loss per ordinary share as their effect would be anti-dilutive due to the loss recorded during the year ended December 31, 2024, and therefore diluted net loss per share is equal to basic net loss per share. During the year ended December 31, 2023, diluted net income per share is computed by giving effect to all dilutive potential common shares.

***Recently Adopted Accounting Pronouncements***

In November 2023, the FASB issued ASU No. 2023-07, *Segment Reporting (Topic 280): Improvements to Reportable Segment Disclosures* (“ASU 2023-07”). This standard requires a public entity to disclose significant segment expenses and other segment items on an interim and annual basis. Additionally, it requires a public entity to disclose the title and position of the Chief Operating Decision Maker. ASU 2023-07 is effective for fiscal years beginning after December 15, 2023, and interim periods within fiscal years beginning after December 15, 2024, with early adoption permitted. A public entity should apply the amendments in this ASU retrospectively to all prior periods presented in the financial statements. The Company adopted ASU 2023-07 for the fiscal year ended December 31, 2024 and interim financial statements thereafter, on a retrospective basis for all prior periods presented in the financial statements. The adoption of ASU 2023-07 did not change the way that the Company identifies its reportable segments and, as a result, did not have a material impact on the Company’s financial position or results of operations. See Note 13 - Segment Reporting for further information.

***Recently Issued Accounting Pronouncements Not Yet Adopted***

In December 2023, the FASB issued ASU No. 2023-09, *Income Taxes (Topic 740): Improvements to Income Tax Disclosures* (“ASU 2023-09”). This standard requires disaggregated information about a reporting entity’s effective tax rate reconciliation as well as information on income taxes paid. ASU 2023-09 is effective for public entities with annual periods beginning after December 15, 2024, with early adoption permitted. The Company is currently evaluating the impact of this guidance on its financial statements.

In November 2024, the FASB issued ASU No. 2024-03, *Income Statement — Reporting Comprehensive Income — Expense Disaggregation Disclosures (Subtopic 220-40): Disaggregation of Income Statement Expenses* (“ASU 2024-03”). This standard requires a public entity to disaggregate certain income statement expenses. ASU 2024-03 is effective for annual reporting periods beginning after December 15, 2026, and interim reporting periods within annual reporting periods beginning after December 15, 2027, with early adoption permitted. The Company is currently evaluating the impact of this guidance on its financial statements.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

**3. Marketable Securities**

The Company invests its excess cash in marketable securities, including debt securities, commercial paper, asset-backed securities, yankee debt, certificate of deposit, and U.S. Government agency securities.

The following table summarizes the amortized cost and fair value of the Company's marketable securities by major investment category (in thousands):

		<b>December 31, 2024</b>			
		<b>Amortized Cost</b>	<b>Unrealized</b>		<b>Fair Value</b>
	<b>Maturity in Years</b>		<b>Gains</b>	<b>Losses</b>	
U.S. Government agency securities	3 years or less	\$ 57,232	\$ 57	\$ (134)	\$ 57,155
Certificate of deposit	Less than 1	8,519	6	(1)	8,524
Corporate debt securities	2 years or less	80,751	110	(39)	80,822
Commercial paper	Less than 1	22,265	11	(1)	22,275
Yankee debt	Less than 1	2,145	1	—	2,146
Asset-backed securities	2 years or less	11,834	61	—	11,895
		<u>\$ 182,746</u>	<u>\$ 246</u>	<u>\$ (175)</u>	<u>\$ 182,817</u>

		<b>December 31, 2023</b>			
		<b>Amortized Cost</b>	<b>Unrealized</b>		<b>Fair Value</b>
	<b>Maturity in Years</b>		<b>Gains</b>	<b>Losses</b>	
U.S. Government agency securities	2 years or less	\$ 18,883	\$ 11	\$ —	\$ 18,894
Certificate of deposit	Less than 1	5,232	13	—	5,245
Corporate debt securities	2 years or less	52,310	65	(6)	52,369
Commercial paper	Less than 1	28,108	19	(1)	28,126
Yankee debt	Less than 1	2,445	3	—	2,448
Asset-backed securities	3 years or less	2,576	7	(1)	2,582
		<u>\$ 109,554</u>	<u>\$ 118</u>	<u>\$ (8)</u>	<u>\$ 109,664</u>

The Company regularly reviews the securities in an unrealized loss position and evaluates the current expected credit loss by considering factors such as historical experience, market data, issuer-specific factors, current and expected future economic conditions. The Company has no requirement or intention to sell these securities before maturity or recovery of their amortized cost basis. As of December 31, 2024 and December 31, 2023, the Company did not record an allowance for credit loss related to its investment portfolio. As of December 31, 2024, 86 out of 252 of our available-for-sale debt securities were in an aggregate gross unrealized loss position. As of December 31, 2023, 37 out of 178 of our available-for-sale debt securities were in an aggregate gross unrealized loss position. All of our available-for-sale debt securities in an unrealized loss position for which an allowance for credit losses has not been recorded had continuous unrealized loss position for less than 12 months.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

The following tables summarize our available-for-sale debt securities in an unrealized loss position for which an allowance for credit losses has not been recorded, aggregated by major security type (in thousands):

	<b>December 31, 2024</b>	
	<b>Fair Value</b>	<b>Unrealized Losses</b>
U.S. Government agency securities	\$ 30,155	\$ (134)
Certificate of deposit	3,722	(1)
Corporate debt securities	22,528	(39)
Commercial paper	4,556	(1)
	<u>\$ 60,961</u>	<u>\$ (175)</u>

	<b>December 31, 2023</b>	
	<b>Fair Value</b>	<b>Unrealized Losses</b>
Corporate debt securities	\$ 12,521	\$ (6)
Commercial paper	5,188	(1)
Asset-backed securities	439	(1)
	<u>\$ 18,148</u>	<u>\$ (8)</u>

#### **4. Fair Value Measurements**

The accounting guidance defines fair value, establishes a consistent framework for measuring fair value and expands disclosure for each major asset and liability category measured at fair value on either a recurring or nonrecurring basis. Fair value is defined as an exit price, representing the amount that would be received to sell an asset or paid to transfer a liability in an orderly transaction between market participants. As such, fair value is a market-based measurement that should be determined based on assumptions that market participants would use in pricing an asset or liability. As a basis for considering such assumptions, the accounting guidance establishes a three-tier fair value hierarchy, which prioritizes the inputs used in measuring fair value as follows:

**Level 1**—Unadjusted quoted prices in active markets that are accessible at the measurement date for identical, unrestricted assets or liabilities.

**Level 2**—Quoted prices for similar assets and liabilities in active markets, quoted prices in markets that are not active, or inputs which are observable, either directly or indirectly, for substantially the full term of the asset or liability.

**Level 3**—Prices or valuation techniques that require inputs that are both significant to the fair value measurement and unobservable (i.e. supported by little or no market activity).

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

Assets and liabilities measured at fair value on a recurring basis are as follows (in thousands):

		Fair Value Measurements Using		
		Quoted Prices in Active Markets for Identical Assets (Level 1)	Significant Other Observable Inputs (Level 2)	Significant Unobservable Inputs (Level 3)
Total				
December 31, 2024:				
Assets:				
Cash equivalents	\$ 21,042	\$ 21,042	\$ —	\$ —
U.S. Government agency securities	57,155	57,155	—	—
Certificates of deposit	8,524	—	8,524	—
Corporate debt securities	80,822	—	80,822	—
Commercial paper	22,275	—	22,275	—
Yankee debt	2,146	—	2,146	—
Asset-backed securities	11,895	—	11,895	—
Total financial assets	\$ 203,859	\$ 78,197	\$ 125,662	\$ —
December 31, 2023:				
Assets:				
Cash equivalents	\$ 14,646	\$ 14,646	\$ —	\$ —
U.S. Government agency securities	18,894	16,360	2,534	—
Certificates of deposits	5,245	—	5,245	—
Corporate debt securities	52,369	—	52,369	—
Commercial paper	28,126	—	28,126	—
Yankee Debt	2,448	—	2,448	—
Asset-backed securities	2,582	—	2,582	—
Total financial assets	\$ 124,310	\$ 31,006	\$ 93,304	\$ —
Liabilities:				
Preferred stock warrant liability	\$ (110)	\$ —	\$ —	\$ (110)
Total financial liabilities	\$ (110)	\$ —	\$ —	\$ (110)

The carrying amounts of the Company's financial instruments, including cash, cash equivalents and marketable securities, prepaid and other current assets, accounts payable, and accrued liabilities, approximate fair value due to their short maturities. Included in cash and cash equivalents at December 31, 2024 and 2023 are money market funds with a carrying value and fair value of \$3.9 million and \$11.8 million, respectively, based upon a Level 1 fair value assessment.

**Warrant**

As of December 31, 2023, the Company had a preferred stock warrant liability (included on the balance sheet under other long-term liabilities), which consisted of the fair value of a warrant to purchase Series B convertible preferred stock and was based on significant unobservable inputs, which represent a Level 3 measurement within the fair value hierarchy. The Company classified this warrant as a liability on its balance sheets and remeasured to fair value at each reporting date, and the Company recognized changes in the fair value of the warrant liability as a component of other income (expense) in its statements of operations and comprehensive income (loss).

Upon the closing of the IPO, the warrant to purchase shares of Series B preferred stock converted to a warrant to purchase shares of Class A common stock, and upon conversion the warrant met the equity classification requirements and was reclassified to equity. The warrant was remeasured to fair value immediately prior to the conversion to a common stock warrant and the Company recognized changes in the fair value of the warrant liability in other income (expense) until April 9, 2024.



**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

The Company's valuation of the preferred stock warrant as of April 9, 2024 and December 31, 2023 utilized the Black-Scholes option-pricing model. The quantitative elements associated with the Company's Level 3 inputs impacting the fair value measurement of the preferred stock warrant liability include the fair value per share of the underlying Series B convertible preferred stock, the remaining contractual term of the warrant, risk-free interest rate, expected dividend yield and expected volatility of the price of the underlying preferred stock. The most significant assumption in the Black-Scholes option-pricing model impacting the fair value of the preferred stock warrant is the fair value of the Company's Series B convertible preferred stock as of each remeasurement date. The Company determines the fair value per share of the underlying preferred stock by taking into consideration its most recent sales of its convertible preferred stock as well as additional factors that the Company deems relevant. The Company historically has been a private company and lacks company-specific historical and implied volatility information of its stock. Therefore, it estimates its expected stock volatility based on the historical volatility of publicly traded peer companies for a term equal to the remaining contractual term of the warrant.

The risk-free interest rate is determined by reference to the U.S. Treasury yield curve for time periods approximately equal to the remaining contractual term of the warrant. The Company has estimated a 0% dividend yield based on the expected dividend yield and the fact that the Company has never paid or declared dividends.

Significant increases or decreases in any of these inputs in isolation would result in a significantly different fair value measurement. An increase in the risk-free interest rate, and/or an increase in the remaining contractual term or expected volatility, and/or an increase in the fair value of the convertible preferred stock would result in an increase in the fair value of the warrant.

The following table summarizes the change in fair value of the warrant liability, a Level 3 recurring fair value measurement, for the year ended December 31, 2024 (in thousands):

	<b>Warrant</b>	<b>Investor Rights and Obligations Liability</b>
Balance at December 31, 2022	\$ 115	\$ 2,867
Change in fair value of warrant liability	(5)	—
Change in fair value of investor rights and obligations liability	—	(2,867)
Balance at December 31, 2023	\$ 110	\$ —
Change in fair value of warrant liability	106	—
Balance at April 9, 2024	\$ 216	\$ —
Reclassification to equity	(216)	—
Balance at December 31, 2024	<u>\$ —</u>	<u>\$ —</u>

## 5. Property and Equipment, Net

Property and equipment, net consisted of the following (in thousands):

	<b>December 31,</b>	
	<b>2024</b>	<b>2023</b>
Lab equipment	\$ 2,244	\$ 2,052
Leasehold improvements	175	48
Computer equipment and software	124	50
Furniture and fixtures	163	5
Property and equipment at cost	2,706	2,155
Less: accumulated depreciation and amortization	(1,717)	(1,477)
Total property and equipment, net	<u>\$ 989</u>	<u>\$ 678</u>

The Company recognized \$0.3 million and \$0.2 million in depreciation and amortization expense for the years ended December 31, 2024 and 2023, respectively.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

**6. Accrued Expenses**

Accrued expenses consisted of the following (in thousands):

	<b>December 31,</b>	
	<b>2024</b>	<b>2023</b>
Accrued compensation expenses	\$ 3,338	\$ 1,904
Accrued research and development expenses	3,151	1,546
Accrued professional and consulting expenses	98	834
Other accrued expenses	124	101
Total accrued expenses	<u>\$ 6,711</u>	<u>\$ 4,385</u>

**7. Debt**

In September 2020, the Company entered into a loan and security agreement (the “Loan Agreement”, and all amounts borrowed thereunder the “Term Loan”) with First Citizens Bank, as administrative and collateral agent, and lender. The Company borrowed \$5.0 million at the inception of the Loan Agreement and had the option to borrow an additional \$5.0 million upon closing a new capital round of no less than \$30.0 million from a syndicate of investors. The option to borrow an additional \$5.0 million expired on June 30, 2021.

In June 2023, the Company fully paid the remaining balance of the Term Loan and final prepayment fee of \$3.0 million.

**8. Convertible Preferred Stock and Stockholders’ Equity (Deficit)**

Upon the closing of the IPO, the Company’s outstanding convertible preferred stock automatically converted into 9,177,064 shares of Class A common stock and 6,729,172 shares of Class B common stock. Converted preferred stock outstanding as of the date of the IPO consisted of 15,906,236 shares. Each share of outstanding Series A, Series A-1, Series B, and Series C convertible preferred stock was convertible into one share of common stock at the option of the holder, subject to certain anti-dilution adjustments.

***Convertible Preferred Stock***

As of December 31, 2023, the Company’s Series A, Series A-1, Series B, and Series C convertible preferred stock were classified as temporary equity in the accompanying balance sheet given that a majority of the Company’s board of director seats were held and/or voted upon by convertible preferred stockholders, and those convertible preferred stockholders could cause certain events to occur requiring redemption of the preferred stock that were outside of the Company’s control. The Company did not adjust the carrying values of the convertible preferred stock to the respective liquidation preferences of such shares as the instruments were not currently redeemable and it was not probable that the instruments would become redeemable.

The authorized, issued, and outstanding shares of convertible preferred stock as of December 31, 2023 consist of the following:

	<b>Shares Authorized</b>	<b>Shares Issued and Outstanding</b>	<b>Liquidation Preference (in thousands)</b>
Series A	1,786,607	1,786,604	\$ 10,000
Series A-1	1,429,286	1,423,119	11,179
Series B	3,362,377	3,346,607	32,034
Series C	10,362,324	9,349,906	140,249
Total convertible preferred stock	<u>16,940,594</u>	<u>15,906,236</u>	<u>\$ 193,462</u>

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

***Common Stock***

The Company has two classes of common stock: Class A common stock and Class B common stock. Class A common stock has one vote per share and Class B common stock has no votes per share. As of December 31, 2024, of the authorized 200,000,000 shares of Class A common stock, 19,125,377 shares of Class A common stock were issued and outstanding, and of the authorized 20,000,000 shares of Class B common stock, 6,729,172 shares of Class B common stock were issued and outstanding.

Class A common stock reserved for future issuance consisted of the following:

	<b>December 31,</b>	
	<b>2024</b>	<b>2023</b>
Convertible preferred stock	—	15,906,236
Common stock options granted and outstanding	4,045,500	2,674,405
Shares available for issuance under the 2024 Plan	1,674,309	—
Shares available for issuance under the 2012 Plan	—	502,491
Preferred stock warrant	—	15,764
Common stock warrant	15,764	—
Common stock reserved under the 2024 Employee Stock Purchase Plan	262,004	—
Total common stock reserved for future issuance	<u>5,997,577</u>	<u>19,098,896</u>

There are no shares of Class B common stock reserved for future issuance as of December 31, 2024 and December 31, 2023.

***Stock Options***

In March 2024, the Company's board of directors and its stockholders adopted and approved the 2024 Equity Incentive Plan (the "2024 Plan"). The 2024 Plan is the successor of the Company's 2012 Equity Incentive Plan (the "2012 Plan"). However, awards outstanding under the 2012 Plan will continue to be governed by their existing terms. The 2024 Plan allows for the issuance of incentive stock options, nonstatutory stock options, stock appreciation rights, restricted shares, restricted stock units, and other stock awards to the Company's employees, members of its board of directors, and consultants.

The number of shares initially reserved for issuance under the 2024 Plan was 2,700,000. As of December 31, 2024, there were 1,674,309 shares of the Company's Class A common stock available for issuance under the 2024 Plan. The aggregate number of shares reserved for issuance under the 2024 Plan will automatically increase on the first day of each fiscal year of the Company, commencing in 2025 and ending in (and including) 2034, by a number equal to the lesser of (a) 5% of the aggregate shares of Class A common stock and Class B common stock issued and outstanding as of the last day of the prior fiscal year, or (b) a number of shares of Class A common stock determined by the Company's board of directors.

Under the 2024 Plan, the exercise price for options granted under the 2024 Plan may not be less than 100% of the fair market value of the Class A common stock on the grant date. Optionees will be permitted to pay the exercise price in cash or, with the consent of the compensation committee (i) with shares of common stock that the optionee already owns, (ii) by an immediate sale of shares through a broker approved by the Company, (iii) by instructing the Company to withhold a number of shares otherwise deliverable upon exercise having an aggregate fair market value that does not exceed the exercise price, or (iv) by other methods permitted by applicable law.

The Company's board of directors (or a committee thereof to which the Company's board of directors has delegated authority) may amend or terminate the 2024 Plan at any time. If the Company's board of directors amends the 2024 Plan, it does not need stockholder approval of the amendment unless required by applicable law, regulation or rules. The 2024 Plan will terminate automatically ten years after the date when the Company's board of directors adopted the 2024 Plan.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

Stock option activity under the 2024 Plan and 2012 Plan is as follows:

	Options Outstanding	Weighted- Average Exercise Price	Weighted- Average Remaining Contractual Term	Aggregate Intrinsic Value (in thousands)
Balance at December 31, 2023	2,674,405	\$ 5.93	7.14	\$ 14,888
Options granted	1,528,182	16.15	—	—
Options exercised	(157,087)	2.58	—	—
Options cancelled and forfeited	—	—	—	—
Options expired	—	—	—	—
Balance at December 31, 2024	4,045,500	\$ 9.91	7.52	\$ 21,470
Options Vested and Expected to Vest as of December 31, 2024	4,045,500	\$ 9.91	7.52	\$ 21,470
Options Exercisable as of December 31, 2024	2,114,772	\$ 5.33	5.87	\$ 19,764

The aggregate intrinsic value of options exercised during the years ended December 31, 2024 and 2023 was \$2.1 million and \$0.6 million, respectively, determined as of the date of exercise. Options exercisable include options which are not vested but are available to be early exercised as of December 31, 2024. As of December 31, 2024, of the 2,114,772 options exercisable, 35,794 options are available to be early exercised.

The Company estimated the fair value of stock options using the Black-Scholes valuation model. The Company accounts for any forfeitures of options when they occur. Previously recognized compensation expense for an award is reversed in the period that the award is forfeited. The fair value of stock options was estimated using the following weighted-average assumptions:

	Years Ended December 31,	
	2024	2023
Assumptions:		
Expected term (in years)	6.03	6.08
Expected volatility	110.40%	94.57%
Risk free interest rate	4.41%	4.74%
Dividend yield	—	—

The weighted-average grant-date fair value per share of stock options granted during the years ended December 31, 2024 and 2023 was \$13.66 and \$8.56 per share, respectively. The Company recorded \$4.0 million and \$2.8 million in stock-based compensation in general and administrative and research and development, respectively, for the year ended December 31, 2024. The Company recorded \$1.2 million and \$1.1 million in stock-based compensation in general and administrative and research and development, respectively, for the year ended December 31, 2023.

As of December 31, 2024, there was approximately \$20.7 million of total unrecognized stock-based compensation related to nonvested stock-based compensation arrangements, which is expected to be recognized over a weighted-average period of approximately 2.9 years. As of December 31, 2023, there was approximately \$6.6 million of total unrecognized stock-based compensation related to nonvested stock-based compensation arrangements, which was expected to be recognized over a weighted-average period of approximately 1.3 years.

***Employee Stock Purchase Plan***

In March 2024, the Company's board of directors and its stockholders adopted and approved the 2024 Employee Stock Purchase Plan (the "2024 ESPP"). The 2024 ESPP became effective as of April 9, 2024. The purpose of the 2024 ESPP is to provide eligible employees with an opportunity to increase their interest in the success of the Company by purchasing shares of Class A common stock from the Company on favorable terms and to pay for such purchases through payroll deductions or other approved contributions. The new payroll deduction rate may be any whole percentage of the participant's compensation, but not less than 1% nor more than 15%.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

As of December 31, 2024, there were 262,004 shares of the Company's common stock reserved and available for issuance under the 2024 ESPP. The number of shares reserved for issuance under the 2024 ESPP will automatically increase on the first day of each fiscal year of the Company, commencing in 2025 and ending in (and including) 2044, by a number equal to the lesser of (i) 280,000 shares, (ii) 1% of the aggregate shares of Class A common stock and Class B common stock issued and outstanding on the last day of the prior fiscal year, or (iii) a number of shares determined by the Company's board of directors. The number of shares reserved under the 2024 ESPP will automatically be adjusted in the event of a stock split, stock dividend or a reverse stock split (including an adjustment to the per-purchase period share limit). During the year ended December 31, 2024, there were 17,996 shares were purchased under the 2024 ESPP and the Company recorded expense of \$0.2 million.

**9. Income Taxes**

The following is a reconciliation between the provision for income taxes and income taxes computed using the U.S. federal statutory corporate tax rate for the years ended December 31, 2024 and 2023 is as follows (in thousands):

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
Expected tax benefit at statutory rate	\$ (8,885)	\$ 4,886
State income tax, net of federal benefit	1	5
Change in fair value of investor rights and obligations liability	—	(602)
Permanent differences	1,018	127
Research credits	(2,149)	(1,140)
IRC Sec. 382 & 383 adjustments	—	—
Change in valuation allowance	10,015	(2,826)
	<u>\$ —</u>	<u>\$ 450</u>

For the year ended December 31, 2023, the Company recorded \$0.4 million of current federal tax expense due to tax law limitations on the ability to fully utilize net operating loss and research and development credit carryforwards against taxable income.

The tax effects of temporary differences that give rise to significant portions of the deferred tax assets and deferred tax liabilities as of December 31, 2024 and 2023 are as follows:

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
<b>Deferred tax assets:</b>		
Net operating loss carryforwards	\$ 14,478	\$ 12,498
Research and development credit carryforwards	6,618	4,476
Capitalized research and development	12,699	7,469
Lease liabilities	1,314	120
Stock-based compensation	1,121	—
Other, net	608	1,017
<b>Total deferred tax assets</b>	36,838	25,580
Valuation allowance	(35,548)	(25,328)
<b>Deferred tax assets, net of valuation allowance</b>	<u>1,290</u>	<u>252</u>
<b>Deferred tax liabilities:</b>		
Property and equipment	(142)	(101)
Right-of-use assets	(1,148)	(151)
<b>Total deferred tax liabilities</b>	(1,290)	(252)
<b>Net deferred tax assets/(liabilities)</b>	<u>\$ —</u>	<u>\$ —</u>



**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

The Company has established a valuation allowance against its net deferred tax assets due to the uncertainty surrounding the realization of such assets. The Company periodically evaluates the recoverability of the deferred tax assets. At such time as it is determined that it is more likely than not that deferred tax assets will be realizable, the valuation allowance will be reduced. The Company has recorded a full valuation allowance of \$35.5 million and \$25.3 million as of December 31, 2024 and 2023, respectively, as it does not believe it is more likely than not that certain deferred tax assets will be realized primarily due to the generation of pre-tax book losses, no ability to carryback losses, the lack of feasible tax-planning strategies, the limited existing taxable temporary differences, and the subjective nature of forecasting future taxable income into the future.

At December 31, 2024, the Company had federal and California tax loss carry forwards of approximately \$46.7 million and \$81.4 million, respectively. Out of the total federal net operating losses, approximately \$46.7 million were generated after January 1, 2018, and therefore do not expire. Net operating losses generated after January 1, 2018, are subject to 80% limitation in accordance with the Tax Cuts and Jobs Act of 2017. The remaining federal and state net operating loss carry forwards begin to expire in 2037 and 2036, respectively, if unused.

At December 31, 2024, the Company had federal and state research and development tax credit carryforwards of approximately \$5.7 and \$3.3 million, respectively. The federal credits will begin to expire in 2032, if unused, and the state credits carry forward indefinitely.

Pursuant to the IRC, as amended, specifically IRC §382 and IRC §383, the Company's ability to use net operating loss and R&D tax credit carry forwards ("tax attribute carry forwards") to offset future taxable income is limited if the Company experiences a cumulative change in ownership of more than 50% within a three-year testing period. The Company has completed an ownership change analysis pursuant to IRC Section 382 and identified that ownership changes occurred in July 2012, April 2018, March 2019 and February 2021. The Company's deferred tax assets related to the tax attributes impacted have been adjusted through December 31, 2021 based on such analysis. As a result of limitations arising from the prior ownership changes, \$0.5 million of federal and \$3.7 million of California net operating loss carry-forwards were removed from the inventory of deferred tax assets. In addition, \$0.2 million of federal R&D tax credits were removed as of December 31, 2022. If further ownership changes within the meaning of IRC Section 382 are identified as having occurred, the amount of remaining tax attribute carry-forwards available to offset future taxable income and income tax expense in future years may be significantly restricted or eliminated. Further, the Company's deferred tax assets associated with such tax attributes could be significantly reduced upon realization of an ownership change within the meaning of IRC §382.

The following table summarizes the reconciliation of the unrecognized tax benefits activity during the years ended December 31, 2024 and 2023 (in thousands):

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
Unrecognized tax benefits—beginning	\$ 2,574	\$ 2,749
Gross increases—tax positions in current period	525	357
Decreases related to prior year positions	(5)	(532)
Unrecognized tax benefits—ending	<u>\$ 3,094</u>	<u>\$ 2,574</u>

The unrecognized tax benefit amounts are reflected in the determination of the Company's deferred tax assets. If recognized, none of these amounts would affect the Company's effective tax rate, since it would be offset by an equal corresponding adjustment in the deferred tax asset valuation allowance. The Company does not foresee material changes to its liability for uncertain tax benefits within the next twelve months.

During the year ended December 31, 2023, the Company reduced its reserve against research and development credits generated prior to 2022 as a result of the completion of a formal study of research and development credits generated through that period. The reduction in the reserve for uncertain tax positions was fully offset by an offsetting increase in the valuation allowance against research and development credit carryforwards resulting in no net tax provision impact from the change in the reserve.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

The Company's policy is to recognize interest and/or penalties related to income tax matters in income tax expense. The Company had no accrual for interest or penalties on the Company's balance sheets as of December 31, 2024 and 2023 and has not recognized interest and/or penalties in the statement of operations and comprehensive income (loss) for the years ended December 31, 2024 and 2023.

All tax years for both federal and state purposes remain open and subject to examination by tax jurisdictions.

## **10. License Agreement**

In February 2023, the Company entered into the J&J License Agreement, pursuant to which the Company granted J&J an exclusive, worldwide license to develop, manufacture and commercialize PIPE-307 in all indications. The J&J License Agreement allows the Company to elect, at its sole discretion and cost, to conduct a Phase 2 trial of PIPE-307 for patients with multiple sclerosis. After such trial, J&J may, at its sole discretion, further develop PIPE-307 for patients with multiple sclerosis. Additionally, upon J&J deciding to conduct a first Phase 3 clinical trial for a product using PIPE-307, the J&J License Agreement allows the Company the option to co-fund a portion of all Phase 3 and subsequent development costs for PIPE-307, with such costs capped annually. If the Company opts to fund such development costs, then the royalties the Company is eligible to receive will increase. Pursuant to the terms of the J&J License Agreement, the Company received an upfront, non-refundable and non-creditable payment of \$50.0 million upon transferring the license and know-how, existing inventory and manufacturing technology. The Company is also eligible to receive approximately \$1.0 billion in non-refundable, non-creditable milestone payments. Additionally, the Company is eligible to receive tiered royalties in the low-double digit to high-teen percent range on net sales of products containing PIPE-307.

The Company sold approximately 1.7 million shares of series C convertible preferred stock to Johnson & Johnson Innovation - JJDC, Inc., an affiliate of J&J, at \$15.00 per share, for an aggregate purchase price of approximately \$25.0 million, in April 2023. The Company determined that this preferred stock purchase was at fair value as other new investors purchased shares of preferred stock at the same price.

The Company concluded that J&J represented a customer and applied relevant guidance from ASC 606 to evaluate the appropriate accounting for the J&J License Agreement. The Company evaluated the J&J License Agreement and concluded that it had promises to transfer a license of functional intellectual property, know-how, existing inventory and manufacturing technology (each of which was determined to be a distinct performance obligation). Control of the promised goods was transferred to J&J in the second quarter of 2023, and the \$50.0 million upfront payment was recognized in May 2023 upon satisfaction of the performance obligations. The remaining consideration consists of future contingent milestone-based payments and sales-based royalties. As of December 31, 2024, all variable consideration under the J&J License Agreement was fully constrained.

In August 2023, the Company elected to conduct a Phase 2 trial using PIPE-307 for patients with multiple sclerosis, which was considered a contract modification under the accounting guidance that added promised goods or services that are distinct at a price that is below the standalone selling price. Therefore, the Company accounted for the modification as a termination of the existing contract and creation of a new contract. Accordingly, the amount of consideration to be allocated to the remaining performance obligations consists of future contingent milestone-based payments and sales-based royalties, all of which were constrained. The only remaining performance obligation is the promise to conduct the Phase 2 trial, as the other performance obligations had been satisfied prior to the modification date. Accordingly, the variable consideration allocated to the Phase 2 trial will be recognized as the study is completed using a cost-based measure of progress and when the amounts are no longer probable of a significant reversal. As of December 31, 2024, no amounts had been recognized related to the Phase 2 trial as no additional variable consideration has been received subsequent to the contract modification.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

**11. Commitments and Contingencies**

***Operating Lease***

The Company leases office and lab space in San Diego, California under a non-cancelable operating lease (“Science Center Drive Lease”). The lease commenced in March 2018 and has a 5-year initial term. The lease includes a renewal option, which includes an option to renew for five additional years. During 2021, the Company amended the lease to include additional space in the building with the right to use the new space beginning in October 2021, for an additional 3 years. Base rent for the new unit was abated for the first three months of the lease term and thereafter is \$0.05 million per month during the first year of the lease term, with specified annual increases thereafter.

In October 2023, the Company executed a noncancelable operating lease for new premises to be used for office, research and development and laboratory purposes (“General Atomics Court Lease”), with the same landlord as the Science Center Drive Lease. The General Atomics Court Lease commenced for accounting purposes in October 2024 when the Company took control of the premises and has a 5-year initial term from the commencement date. The General Atomics Court Lease has a five-year term with an option to extend for another three-year period subject to certain conditions, which the Company is not reasonably certain to exercise and therefore was not considered in determining the ROU assets and lease liabilities balance.

As a result of the new lease, the Company received rent abatement from January to October 2024 on the Science Center Drive Lease. This resulted in a modification of the Science Center Drive Lease and a remeasurement of the existing lease liability and the associated right-of-use asset in October 2023. As a result, \$0.6 million from the payments of the new lease were allocated to the Science Center Drive Lease, based on a relative standalone selling price analysis.

The Company’s operating lease ROU asset and the related lease liabilities are initially measured at the present value of future lease payments over the lease term. Upon commencement of the new lease, in October 2024, the Company recorded an ROU asset and lease liability of approximately \$5.6 million. This includes the \$0.6 million allocation, which led to a corresponding decrease in the ROU asset value for the new lease. The lease agreement includes variable payments which are not included in the measurement of the ROU assets and lease liability.

Below is a summary of the Company’s operating lease right-of-use assets and lease liabilities as of December 31, 2024 and 2023 (in thousands, except for years and %):

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
Operating lease right-of-use assets	\$ 5,467	\$ 719
Operating lease liability obligations, current	\$ 1,452	\$ 464
Operating lease liability obligations, less current portion	4,807	108
Total lease liability obligations	\$ 6,259	\$ 572
Weighted-average remaining lease term	4.4	0.8
Weighted-average discount rate	9.0%	9.0%

During the years ended December 31, 2024 and 2023, the Company recognized \$1.1 million and \$0.9 million, respectively, in operating lease expenses, which are included in operating expenses in the Company's statements of operations and comprehensive income (loss).

Supplemental cash flow information related to operating leases as follows (in thousands):

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
Cash paid for amounts included in the measurement of lease liabilities	\$ 126	\$ 2,020

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

Future minimum lease payments for the Company's operating lease liabilities as of December 31, 2024 were as follows (in thousands):

2025	\$ 1,519
2026	1,564
2027	1,611
2028	1,660
2029	1,292
Total minimum lease payments	7,646
Less: amount representing interest	1,387
Total lease liability obligations	6,259
Less: Current portion of operating lease liabilities	1,452
Operating lease liabilities, net of current portion	<u>\$ 4,807</u>

***Litigation***

From time to time, the Company may become involved in various legal proceedings and claims that arise in the ordinary course of our business activities. As of December 31, 2024 and 2023, the Company was not currently a party to any material legal proceedings.

***Other Commitments***

The Company has various manufacturing, clinical, research and other contracts with vendors in the conduct of the normal course of its business. Such contracts are generally terminable with advanced written notice and payment for any products or services received by the Company through the effective time of termination and any non-cancelable and non-refundable obligations incurred by the vendor at the effective time of the termination. In the case of terminating a clinical trial agreement at a particular site, the Company would also be obligated to provide continued support for appropriate medical procedures at that site until completion or termination.

**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

**12. Net Income (Loss) Per Share**

The following table sets forth the computation of the basic and diluted net loss per share (in thousands, except share and per share amounts):

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
<b>Numerator, basic:</b>		
Net income (loss)	\$ (42,258)	\$ 22,720
Allocation of earnings to participating preferred stockholders	—	19,574
Net income (loss) applicable to common stockholders	<u>\$ (42,258)</u>	<u>\$ 3,146</u>
<b>Denominator, basic:</b>		
Weighted average common shares issued	19,352,859	2,313,115
Less: weighted average unvested common stock issued upon early exercise of stock options	—	(4,143)
Weighted average shares used to compute net income (loss) per common share, basic	<u>19,352,859</u>	<u>2,308,972</u>
<b>Numerator, diluted:</b>		
Net income (loss) attributable to common stockholders	\$ (42,258)	\$ 3,146
Change in fair value of preferred stock warrant liability	—	(5)
Change in fair value of investor rights and obligations liability	—	(2,867)
Net income (loss) applicable to common stockholders	<u>\$ (42,258)</u>	<u>\$ 274</u>
<b>Denominator, diluted:</b>		
Weighted average shares used to compute net income (loss) per common share, diluted	19,352,859	2,308,972
Common stock options	—	998,452
Unvested common stock issued upon early exercise of stock options	—	4,143
Preferred stock warrants (as converted to common stock)	—	1,695
Investor rights and obligations	—	82,249
Weighted average shares used to compute net income (loss) per common share, diluted	<u>19,352,859</u>	<u>3,395,514</u>
Net income (loss) per share, basic	<u>\$ (2.18)</u>	<u>\$ 1.36</u>
Net income (loss) per share, diluted	<u>\$ (2.18)</u>	<u>\$ 0.08</u>

For the year ended December 31, 2024, net loss is attributable equally to each share of Class A common stock and Class B common stock and is determined based on the weighted-average number of the respective class of common stock outstanding. Weighted-average common shares include shares of the Company's Class A common stock and Class B common stock. The basic and diluted net loss per share amounts are the same for Class A common stock and Class B common stock.

For the year ended December 31, 2023, there were no shares of Class B common stock outstanding.

The Company's potentially dilutive securities, which include common stock options and a common stock warrant have been excluded from the computation of diluted net loss per share for the year ended December 31, 2024, as the effect would reduce the net loss per share. Therefore, the weighted-average number of shares of common stock outstanding used to calculate both basic and diluted net loss per share attributable to common stockholders is the same.

The following potentially dilutive securities have been excluded from the diluted per share calculation for the periods presented as they would be anti-dilutive:

	<b>December 31,</b>	
	<b>2024</b>	<b>2023</b>
Common stock options	4,045,500	723,655
Common stock warrant	15,764	—
Total potentially dilutive securities	<u>4,061,264</u>	<u>723,655</u>



**Contineum Therapeutics, Inc.**  
**Notes to Audited Financial Statements — Continued**

### 13. Segment Reporting

The Company operates in one reportable segment, pioneering differentiated therapies for the treatment of NI&I indications with significant unmet need.

Our CODM is our President and Chief Executive Officer, Carmine Stengone. The CODM uses operating expenses, as reported on our statements of operations and comprehensive income (loss). The CODM makes decisions on resource allocation, assesses performance of the business, and monitors budget versus actual results of the Company as a whole using operating expenses. Net income (loss) is also a measure that is considered in monitoring budget versus actual results. The CODM does not review assets in evaluating the results of the Company, and therefore, such information is not presented.

Significant segment expenses within net income (loss) include research and development related to PIPE-791, PIPE-307, CTX-343, discovery programs and unallocated internal costs, general and administrative and interest income. Other segment items within net income (loss) include change in fair value of warrant liability, change in fair value of investor rights and obligations liability, interest expense, other expense, net and provision for (benefit from) income taxes.

The following table provides the operating financial results of our single reportable segment (in thousands):

	<b>Years Ended December 31,</b>	
	<b>2024</b>	<b>2023</b>
Total revenue	\$ —	\$ 50,000
Less: Significant and other segment expenses		
Research and development		
PIPE-791	11,257	11,181
PIPE-307	11,249	4,565
CTX-343	2,460	742
Discovery programs	4,789	3,457
Unallocated internal costs	8,667	7,658
General and administrative	12,472	6,320
Interest income	8,905	4,606
Other segment items <sup>(1)</sup>	(269)	2,037
Net income (loss)	<u>\$ (42,258)</u>	<u>\$ 22,270</u>

(1) Other segment items primarily include change in fair value of warrant liability, change in fair value of investor rights and obligations liability, interest expense, other expense, net, and provision for (benefit from) income taxes.

License revenue for the year ended December 31, 2023 was generated solely from the upfront payment from J&J pursuant to the J&J License Agreement. Revenue is primarily attributed to individual countries based on the location of the customer or licensee.

### 14. Employee Benefit Plan

In January 2018, the Company adopted a defined contribution retirement savings plan under Section 401(k) of the IRC. This plan covers all employees who meet minimum age and service requirements and allows participants to defer a portion of their annual compensation on a pre-tax basis. The Company's contributions to the plan may be made at the discretion of the Company's board of directors. Total contributions by the Company during the years ended December 31, 2024 and 2023 was \$0.3 million and \$0.2 million, respectively.

### 15. Related Party Transactions

In the second quarter of 2023, the Company issued 1,860,999 shares of its Series C convertible preferred stock for total cash proceeds of \$27.9 million to three significant stockholders two that have designated members on the Company's board of directors and each of whom is considered to be a related party. As of December 31, 2024, the two designated members were no longer on the Company's board of directors.

## **Item 9. Changes in and Disagreements with Accountants on Accounting and Financial Disclosure.**

Not applicable.

### **Item 9A. Controls and Procedures.**

#### **Evaluation of Disclosure Controls and Procedures**

As required by Rules 13a-15(b) and 15d-15(b) of the Exchange Act, our management with the participation of our Chief Executive Officer and our Chief Financial Officer, evaluated the effectiveness of our disclosure controls and procedures as of December 31, 2024. The term “disclosure controls and procedures” as defined in Rules 13a-15(e) and 15d-15(e) under the Exchange Act, means controls and other procedures of a company that are designed to ensure that information required to be disclosed by a company in the reports that it files or submits under the Exchange Act is recorded, processed, summarized and reported, within the time periods specified in the SEC’s rules and forms. Disclosure controls and procedures include, without limitation, controls and procedures designed to ensure that information required to be disclosed by a company in the reports that it files or submits under the Exchange Act is accumulated and communicated to the company’s management, including its principal executive and principal financial officer, as appropriate to allow timely decisions regarding required disclosure. Management recognizes that any controls and procedures, no matter how well designed and operated, can provide only reasonable assurance of achieving their objectives, and management necessarily applies its judgment in evaluating the cost-benefit relationship of possible controls and procedures. Based on the evaluation of our disclosure controls and procedures as of December 31, 2024, our Chief Executive Officer and our Chief Financial Officer concluded that, as of such date, our disclosure controls and procedures were effective at the reasonable assurance level.

#### **Management’s Report on Internal Control over Financial Reporting**

This Annual Report does not include a report of management’s assessment regarding internal control over financial reporting or an attestation report of the company’s independent registered public accounting firm due to a transition period established by the rules of the SEC for newly public companies.

#### **Changes in Internal Control over Financial Reporting**

There were no changes in our internal control over financial reporting (as defined by Exchange Act Rule 13a-15(f) and 15d-15(f)) that occurred for the quarter ended December 31, 2024 that have materially affected, or are reasonably likely to materially affect, our internal control over financial reporting.

#### **Inherent Limitations on Effectiveness of Controls**

Our management, including our Chief Executive Officer and Chief Financial Officer, do not expect that our disclosure controls or our internal control over financial reporting will prevent all errors and all fraud. A control system, no matter how well conceived and operated, can provide only reasonable, not absolute, assurance that the objectives of the control system are met. Further, the design of a control system must reflect the fact that there are resource constraints, and the benefits of controls must be considered relative to their costs. Because of the inherent limitations in all control systems, no evaluation of controls can provide absolute assurance that all control issues and instances of fraud, if any, have been detected. These inherent limitations include the realities that judgments in decision-making can be faulty, and that breakdowns can occur because of a simple error or mistake. Additionally, controls can be circumvented by the individual acts of some persons, by collusion of two or more people or by management override of the controls. The design of any system of controls is also based in part on certain assumptions about the likelihood of future events, and there can be no assurance that any design will succeed in achieving its stated goals under all potential future conditions, over time, controls may become inadequate because of changes in conditions, or the degree of compliance with policies or procedures may deteriorate. Because of the inherent limitations in a cost-effective control system, misstatements due to error or fraud may occur and not be detected.

### **Item 9B. Other Information.**

#### *Trading Arrangements*

During the quarter ended December 31, 2024, none of our directors or officers adopted or terminated any Rule 10b5-1 trading arrangement or any non-Rule 10b5-1 trading arrangement (as such terms are defined pursuant to Item 408(a) of Regulation S-K).

**Item 9C. Disclosure Regarding Foreign Jurisdictions that Prevent Inspections.**

Not applicable.

**PART III****Item 10. Directors, Executive Officers and Corporate Governance.**

Information required by this item and not set forth below will be set forth in the sections headed “Directors, Executive Officers and Corporate Governance” and “Proposal 1—Election of Directors” contained in our definitive Proxy Statement to be filed with the Commission within 120 days after the conclusion of our year ended December 31, 2024 (the “Proxy Statement”) pursuant to General Instructions G(3) of Form 10-K and is incorporated herein by reference.

We have adopted a Code of Conduct that applies to all officers, directors and employees, including our principal executive officer, principal financial officer, principal accounting officer or controller, or person performing similar functions. A current copy of the Code of Conduct is available on the Corporate Governance section of our website at [www.contineum-tx.com](http://www.contineum-tx.com) on the “Corporate Governance” page of the section titled “Investors.” If we make any substantive amendments to the Code Conduct or grant any waiver from a provision of the Code Conduct to any executive officer or director that are required to be disclosed pursuant to SEC rules, we will promptly disclose the nature of the amendment or waiver on our website or in a current report on Form 8-K.

**Item 11. Executive Compensation.**

The information required by this item will be set forth in the sections headed “Executive Compensation,” “Director Compensation,” and “Directors, Executive Officers and Corporate Governance” contained in our Proxy Statement and is incorporated herein by reference.

**Item 12. Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters.**

The information required by this item will be set forth in the sections headed “Security Ownership of Certain Beneficial Owners and Management,” “Section 16(a) Beneficial Ownership Reporting Compliance,” and “Securities Authorized for Issuance Under Equity Compensation Plans” contained in our Proxy Statement and is incorporated herein by reference.

**Item 13. Certain Relationships and Related Transactions, and Director Independence.**

The information required by this item will be set forth in the sections headed “Certain Relationships and Related Party Transactions” and “Directors, Executive Officers and Corporate Governance” contained in our Proxy Statement and is incorporated herein by reference.

**Item 14. Principal Accounting Fees and Services.**

The information required by this item will be set forth in the section headed “Independent Registered Public Accounting Firm” and “Proposal 2—Ratification of Appointment of Ernst & Young LLP as our Independent Registered Public Accounting Firm for the Fiscal Year Ending December 31, 2025” contained in our Proxy Statement and is incorporated herein by reference.

**PART IV****Item 15. Exhibits and Financial Statement Schedules.**

(a) The following documents are filed as part of this Annual Report:

- (1) Financial Statements. The financial statements filed as part of this Annual Report are included in Part II, Item 8 of this Annual Report.
- (2) Financial Statement Schedules. Financial statement schedules have been omitted in this Annual Report because they are not applicable, not required under the instructions, or the information requested is set forth in the financial statements or notes thereto.
- (3) Exhibits. The following is a list of exhibits filed or furnished as part of this Annual Report on Form 10-K.

## Exhibits

Exhibit Number	Description	Incorporated by Reference				Filed Herewith
		Form	File No.	Exhibit	Filing Date	
3.1	Amended and Restated Certificate of Incorporation of the Registrant.	8-K	001-42001	3.1	04/09/2024	
3.2	Amended and Restated Bylaws of the Registrant.	8-K	001-42001	3.2	04/09/2024	
4.1	Form of Registrant's Class A common stock certificate.	S-1/A	333-278003	4.1	04/01/2024	
4.2	Description of the Registrant's securities registered pursuant to Section 12 of the Securities Exchange Act of 1934.					X
4.3	Amended and Restated Investors' Rights Agreement, dated February 9, 2021, by and among the Registrant and the other parties thereto.	S-1	333-278003	4.2	03/15/2024	
4.4^	Warrant to Purchase Stock, issued to Silicon Valley Bank, dated as of September 1, 2020.	S-1	333-278003	4.3	03/15/2024	
4.5	Letter Agreement, dated as of July 9, 2021, by and among the Registrant, Baker Bros. Advisors LP.	S-1	333-278003	4.4	03/15/2024	
4.6	Amended and Restated Registration Rights Agreement dated as of July 9, 2021, by and between the Registrant, 667, L.P. and Baker Brothers Life Sciences, L.P.	S-1	333-278003	4.5	03/15/2024	
10.1+	Form of Indemnity Agreement between the Registrant and each of its directors and executive officers.	S-1/A	333-278003	10.1	04/01/2024	
10.2+	Contineum Therapeutics, Inc. 2012 Equity Incentive Plan, as amended, and forms of agreements thereunder.	S-1	333-278003	10.2	03/15/2024	
10.3+	Contineum Therapeutics, Inc. 2024 Equity Incentive Plan and forms of agreements thereunder.	S-1/A	333-278003	10.3	04/01/2024	
10.4+	Contineum Therapeutics, Inc. 2024 Employee Stock Purchase Plan.	S-1/A	333-278003	10.4	04/01/2024	
10.5+	Offer Letter, dated as of August 14, 2018, by and between the Registrant and Carmine Stengone.	S-1/A	333-278003	10.5	04/01/2024	
10.6+	Offer Letter, dated as of March 9, 2018, as amended by Amendment to Original Offer Letter, dated as of December 16, 2021, each by and between the Registrant and Daniel Lorrain, Ph.D.	S-1/A	333-278003	10.6	04/01/2024	
10.7+	Offer Letter, dated as of August 20, 2020, by and between the Registrant and Peter Slover.	S-1/A	333-278003	10.7	04/01/2024	
10.8+	Offer Letter, dated May 28, 2024, by and between the Registrant and John Healy.	10-Q	001-42001	10.2	08/14/2024	

10.9+	Offer Letter, dated as of December 12, 2019 by and between the Registrant and Stephen Huhn, M.D.					X
10.10+	Contineum Therapeutics, Inc. Executive Severance Plan.	8-K	001-42001	10.1	05/31/2024	
10.11+	Form of Registrant's Mutual Arbitration Agreement.	8-K	001-42001	10.2	05/31/2024	
10.12+	Contineum Therapeutics, Inc. Non-Employee Director Compensation Program.	10-Q	001-42001	10.3	08/14/2024	
10.13^	Lease Agreement, dated January 3, 2018, by and between ARE-SD Region No. 44, LLC and the Registrant.	S-1	333-278003	10.8	03/15/2024	
10.14	First Amendment to Lease dated February 16, 2018, by and between ARE-SD Region No. 44, LLC and the Registrant.	S-1	333-278003	10.9	03/15/2024	
10.15	Second Amendment to Lease, dated April 2, 2018, by and between ARE-SD Region No. 44, LLC and the Registrant.	S-1	333-278003	10.10	03/15/2024	
10.16	Third Amendment to Lease, dated June 15, 2021, by and between ARE-SD Region No. 44, LLC and the Registrant.	S-1	333-278003	10.11	03/15/2024	
10.17	Lease Termination, dated October 25, 2023, by and between ARE-SD Region No. 44, LLC and the Registrant.	S-1	333-278003	10.12	03/15/2024	
10.18^	Lease Agreement, dated October 25, 2023, by and between ARE-3535/3566 General Atomics Court, LLC and the Registrant.	S-1	333-278003	10.13	03/15/2024	
10.19	Loan and Security Agreement, dated as of September 1, 2020, by and between the Registrant and Silicon Valley Bank.	S-1	333-278003	10.14	03/15/2024	
10.20	First Amendment to Loan and Security Agreement, dated as of March 15, 2021, by and between the Registrant and Silicon Valley Bank.	S-1	333-278003	10.15	03/15/2024	
10.21 †	License Agreement, dated February 3, 2023, by and between the Registrant and Janssen Pharmaceutica NV.	S-1	333-278003	10.16	03/15/2024	
19.1^	Contineum Therapeutics, Inc. Insider Trading Policy.					X
21.1	List of Subsidiaries.					X
23.1	Consent of Independent Registered Public Accounting Firm.					X
24.1	Power of Attorney (included in the signature page to this Annual Report on Form 10-K).					X
31.1	Certification of Principal Executive Officer Pursuant to Rules 13a-14(a) and 15d-14(a) under the Securities Exchange Act of 1934, as Adopted Pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.					X
31.2	Certification of Principal Financial Officer Pursuant to Rules 13a-14(a) and 15d-14(a) under the Securities Exchange Act of 1934, as Adopted Pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.					X
32.1*	Certification of Principal Executive Officer Pursuant to 18 U.S.C. Section 1350, as Adopted Pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.					X



32.2*	Certification of Principal Financial Officer Pursuant to 18 U.S.C. Section 1350, as Adopted Pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.	X
97.1	Contineum Therapeutics, Inc. Policy for the Recovery of Erroneously Awarded Compensation	X
101.INS	Inline XBRL Instance Document – the instance document does not appear in the Interactive Data File because XBRL tags are embedded within the Inline XBRL document.	X
101.SCH	Inline XBRL Taxonomy Extension Schema With Embedded Linkbase Documents.	X
104	Cover Page Interactive Data File (embedded within the Inline XBRL document).	X

---

+ Indicates management contract or compensatory plan.

† Pursuant to Item 601(b)(10) of Regulation S-K, certain confidential portions of this exhibit have been omitted by means of marking such portions with asterisks as the identified confidential portions are both not material and are the type of information that the Registrant treats as private or confidential.

^ Pursuant to Item 601(a)(5) of Regulation S-K, certain exhibits and schedules have been omitted. The Registrant agrees to supplementally furnish an unredacted copy of this exhibit to the SEC upon its request.

\* The certifications furnished in Exhibit 32.1 and 32.2 hereto are deemed to be furnished with this Annual Report on Form 10-K and will not be deemed to be “filed” for purposes of Section 18 of the Securities Exchange Act of 1934, as amended, except to the extent that the Registrant specifically incorporates them by reference.

#### **Item 16. Form 10-K Summary**

Not applicable.

## SIGNATURES

Pursuant to the requirements of Section 13 or 15(d) of the Securities Exchange Act of 1934, as amended, the Registrant has duly caused this Report to be signed on its behalf by the undersigned, thereunto duly authorized.

### Contineum Therapeutics, Inc.

March 6, 2025

By: /s/ Carmine Stengone  
Carmine Stengone  
President, Chief Executive Officer and Director  
(Principal Executive Officer)

March 6, 2025

By: /s/ Peter Slover  
Peter Slover  
Chief Financial Officer  
(Principal Financial Officer and Principal  
Accounting Officer)

## POWER OF ATTORNEY

KNOW ALL PERSONS BY THESE PRESENTS, that each person whose signature appears below constitutes and appoints Carmine Stengone and Peter Slover and each of them, his or her true and lawful attorneys-in-fact and agents, each with full power of substitution and resubstitution, for him or her and in his or her name, place and stead, in any and all capacities, to sign any and all amendments, to this Annual Report, and to file the same, with exhibits thereto and other documents in connection therewith, with the Securities and Exchange Commission, granting unto said attorneys-in fact and agents, and each of them, full power and authority to do and perform each and every act and thing requisite and necessary to be done, as fully to all intents and purposes as he or she might or could do in person, hereby ratifying and confirming all that each of said attorney-in-fact and agents or their substitute or substitutes may lawfully do or cause to be done by virtue hereof.

Pursuant to the requirements of the Securities Exchange Act of 1934, as amended, this Report has been signed below by the following persons on behalf of the Registrant in the capacities and on the dates indicated.

Name	Title	Date
/s/ Carmine Stengone Carmine Stengone	President, Chief Executive Officer and Director (Principal Executive Officer)	March 6, 2025
/s/ Peter Slover Peter Slover	Chief Financial Officer (Principal Financial Officer and Accounting Officer)	March 6, 2025
/s/ Evert Schimmelpennink Evert Schimmelpennink	Chairperson of the Board of Directors	March 6, 2025
/s/ Lori Lyons-Williams Lori Lyons-Williams	Director	March 6, 2025
/s/ Todd Brady Todd Brady	Director	March 6, 2025
/s/ Olivia Ware Olivia Ware	Director	March 6, 2025
/s/ Sarah Boyce Sarah Boyce	Director	March 6, 2025
/s/ Troy Ignelzi Troy Ignelzi	Director	March 6, 2025

*This page intentionally left blank*



