
**UNITED STATES
SECURITIES AND EXCHANGE COMMISSION**

Washington, D.C. 20549

FORM 8-K

**CURRENT REPORT
Pursuant to Section 13 or 15(d)
of the Securities Exchange Act of 1934**

Date of Report (Date of earliest event reported): September 16, 2021

Gritstone bio, Inc.

(Exact name of registrant as specified in its charter)

Delaware
(State or other jurisdiction
of incorporation)

001-38663
(Commission
File Number)

47-4859534
(IRS Employer
Identification Number)

**5959 Horton Street, Suite 300
Emeryville, California 94608**
(Address of principal executive offices, including Zip Code)

Registrant's telephone number, including area code: (510) 871-6100

Check the appropriate box below if the Form 8-K filing is intended to simultaneously satisfy the filing obligation of the registrant under any of the following provisions:

- Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)
- Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)
- Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))
- Pre-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))

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

Title of each class	Trading Symbol(s)	Name of each exchange on which registered
Common Stock, par value \$0.0001	GRTS	The Nasdaq Global Select Market

Indicate by check mark whether the registrant is an emerging growth company as defined in Rule 405 of the Securities Act of 1933 (§230.405 of this chapter) or Rule 12b-2 of the Securities Exchange Act of 1934 (§240.12b-2 of this chapter).

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.

Item 1.01 Entry into a Material Definitive Agreement.

On September 16, 2021, Gritstone bio, Inc. (the “Company”) entered into a Securities Purchase Agreement (the “Purchase Agreement”) with certain purchasers identified on the signature pages thereto (the “Purchasers”), pursuant to which the Company issued and sold to the Purchasers, in an unregistered offering, an aggregate of 5,000,000 shares of common stock, par value \$0.0001 per share (the “Common Stock”) at a per share purchase price of \$11.00 per share, for aggregate gross proceeds to the Company of \$55.0 million (the “Private Placement”). The closing of the Private Placement occurred on September 17, 2021 (the “Closing”).

Pursuant to the Purchase Agreement, the Company has agreed to file a resale registration statement with the Securities and Exchange Commission as soon as practicable, and in all events within 30 days after the Closing, to register the resale of the Securities issued at the time of the Closing.

Cowen & Company LLC acted as sole placement agent for the Private Placement.

The foregoing summaries of the Private Placement, the Shares to be issued in connection therewith, and the Purchase Agreement are qualified in their entirety by reference to the definitive transaction documents. A copy of the Purchase Agreement is attached hereto as Exhibit 10.1 and is incorporated herein by reference.

Item 3.02 Unregistered Sales of Equity Securities.

To the extent required by Item 3.02 of Form 8-K, the information regarding the Common Stock set forth under Item 1.01 of this Form 8-K is incorporated by reference in this Item 3.02. The Company issued the Common Stock in reliance on the exemption from registration provided for under Section 4(a)(2) of the Securities Act of 1933, as amended (the “Securities Act”), and Rule 506 of Regulation D thereunder. The Company relied on this exemption from registration for private placements based in part on the representations made by the Purchasers, including the representations with respect to each Purchaser’s status as an accredited investor, as such term is defined in Rule 501(a) of the Securities Act, and each Purchaser’s investment intent. The offer and sale of the Securities have not been registered under the Securities Act.

Item 9.01 Financial Statements and Exhibits.**(d) Exhibits**

<u>Exhibit No.</u>	<u>Description</u>
10.1	Securities Purchase Agreement, dated September 16, 2021
104	Cover Page Interactive Data File (embedded within the Inline XBRL document).

SIGNATURES

Pursuant to the requirements 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 hereunto duly authorized.

GRITSTONE BIO, INC.

Date: September 17, 2021

By: /s/ Andrew Allen
Andrew Allen
President and Chief Executive Officer

SECURITIES PURCHASE AGREEMENT

This Securities Purchase Agreement (this “**Agreement**”) is dated as of September 16, 2021 (the “**Effective Date**”), among Gritstone bio, Inc., a Delaware corporation (the “**Company**”), and each purchaser identified on the signature pages hereto (each a “**Purchaser**” and collectively the “**Purchasers**”).

WHEREAS, the Company and the Purchasers are executing and delivering this Agreement in reliance upon the exemption from securities registration afforded by Section 4(a)(2) of the Securities Act of 1933, as amended (the “**Securities Act**”), and Rule 506 of Regulation D as promulgated by the United States Securities and Exchange Commission (the “**Commission**”) under the Securities Act.

WHEREAS, each Purchaser wishes to purchase, and the Company wishes to sell, upon the terms and conditions stated in this Agreement, shares of the Company’s Common Stock (the “**Shares**” or the “**Securities**”).

WHEREAS, in connection with the offering and sale of the Shares, the Company has entered into an engagement letter dated August 20, 2021 (as amended, the “**Engagement Letter**”), with Cowen and Company, LLC (the “**Placement Agent**”).

NOW, THEREFORE, in consideration of the mutual covenants contained in this Agreement, and for other good and valuable consideration the receipt and adequacy of which are hereby acknowledged, the Company and each Purchaser agree as follows:

1. DEFINITIONS

1.1 Definitions. In addition to the terms defined elsewhere in this Agreement, the following terms have the meanings set forth in this Section 1.1:

“**Closing**” means the closing of the purchase and sale of the Securities on the Closing Date pursuant to Section 2.1 of this Agreement.

“**Closing Date**” means September 17, 2021.

“**Common Stock**” means the common stock of the Company, \$0.0001 par value per share, and any other class of securities into which such securities may hereafter be reclassified or changed into.

“**Effectiveness Date**” means the date the Resale Registration Statement pursuant to Section 4 has been declared effective by the Commission.

“**Exchange Act**” means the Securities Exchange Act of 1934, as amended, and the rules and regulations promulgated thereunder.

“**GAAP**” means U.S. generally accepted accounting principles consistently applied.

“**Investment Company Act**” means the Investment Company Act of 1940, as amended.

“**Material Adverse Effect**” means a circumstance that (i) could reasonably be expected to have a material adverse effect on the performance of this Agreement or the consummation of any of the transactions contemplated hereby or (ii) could reasonably be expected to have a material adverse effect on the condition (financial or otherwise), prospects, earnings, business or properties of the Company and any subsidiary (as defined below) taken as a whole.

“**Nasdaq**” means the Nasdaq Global Select Market.

“**Purchase Price**” means \$11.00 per share.

“**Reporting Period**” means the period commencing on the Closing Date and ending on the date that no Registrable Shares are outstanding.

“**Resale Registration Statement**” means a registration statement or registration statements of the Company filed under the Securities Act pursuant to Section 4 hereof.

“**Rule 144**” means Rule 144 promulgated by the Commission pursuant to the Securities Act, as such Rule may be amended from time to time, or any similar rule or regulation hereafter adopted by the Commission having substantially the same effect as such Rule.

“**SEC Reports**” means collectively all reports, schedules, forms, statements and other documents required to be filed by the Company under the Exchange Act, including pursuant to Section 13(a) or 15(d) thereof, since January 1, 2019 (the foregoing materials, including the exhibits thereto and documents incorporated by reference therein).

“**Short Sales**” means all “short sales” as defined in Rule 200 of Regulation SHO of the Exchange Act, but shall be deemed to not include the location and/or reservation of borrowable shares of Common Stock.

“**subsidiary**” means any individual or entity the Company wholly-owns or controls, or in which the Company, directly or indirectly, owns a majority of the voting stock or similar voting interest, in each case that would be disclosable pursuant to Item 601(b)(21) of Regulation S-K promulgated under the Securities Act.

“**Trading Day**” means a day on which the Common Stock is traded on Nasdaq.

“**Transaction Documents**” means this Agreement, and any other documents or agreements executed and delivered to the Purchasers in connection with the transactions contemplated hereunder.

2. PURCHASE AND SALE

2.1 Closing.

(a) At the Closing, upon the terms set forth herein, the Company hereby agrees to issue and sell to each Purchaser, and each Purchaser agrees to purchase from the Company, severally and not jointly, the number of Shares set forth opposite such Purchaser’s name on **Exhibit A** hereto, at a purchase price equal to the Purchase Price per share of Common Stock.

(b) At the Closing, each Purchaser shall deliver to the Company via wire transfer of immediately available funds equal to the purchase price set forth opposite such Purchaser's name on **Exhibit A** hereto, and the Company shall deliver to each Purchaser its respective Securities in the amounts set forth opposite such Purchaser's name on **Exhibit A** hereto, deliverable at the Closing on the Closing Date in accordance with Section 2.2 of this Agreement. The Closing shall occur at 10:00 a.m. (New York City Time) on the Closing Date or such other time and location as the parties shall mutually agree.

2.2 Deliveries; Closing Conditions.

(a) At the Closing, the Company will deliver or cause to be delivered to each Purchaser certificate(s) or book-entry shares, at the Purchaser's option, representing the Shares purchased by such Purchaser, registered in such Purchaser's name. Such delivery shall be against payment of the purchase price therefor by such Purchaser by wire transfer of immediately available funds to the Company in accordance with the Company's written wire instructions.

(b) The respective obligations of the Company, on the one hand, and the Purchasers, on the other hand, hereunder in connection with the Closing are subject to the following conditions being met:

(i) the accuracy in all material respects on the Closing Date of the representations and warranties contained herein (unless made as of a specified date therein) of the Company (with respect to the obligations of the Purchasers) and the Purchasers (with respect to the obligations of the Company);

(ii) all obligations, covenants and agreements of the Company (with respect to the obligations of the Purchasers) and the Purchasers (with respect to the obligations of the Company) required to be performed at or prior to the Closing Date shall have been performed in all material respects;

(iii) there shall have been no Material Adverse Effect with respect to the Company since the date hereof;

(iv) Purchasers shall have received a certificate of the Secretary of the Company (a "**Secretary's Certificate**"), dated as of the Closing Date in form and substance reasonably satisfactory to the Purchasers;

(v) Purchasers shall have received a certificate signed by the Chief Executive Officer of the Company (an "**Officer's Certificate**"), dated as of the Closing Date in form and substance reasonably satisfactory to the Purchasers;

(vi) Purchasers shall have received an opinion of Latham & Watkins LLP, counsel for the Company ("**Company Counsel**"), dated as of the Closing Date, in a form reasonably satisfactory to the Purchasers; and

(vii) each of the Company's executive officers and directors (in their capacities in such positions) shall enter into a lock-up agreement for a period not to exceed 90 days from the Closing Date.

3. REPRESENTATIONS AND WARRANTIES

3.1 Representations and Warranties of the Company. Assuming the accuracy of the representations and warranties of the Purchasers set forth in Section 3.2 of this Agreement and except as set forth in the SEC Reports, which disclosures serve to qualify these representations and warranties in their entirety, the Company represents and warrants to the Purchasers and the Placement Agent that the statements contained in this Section 3.1 are true and correct as of the date hereof and as of the Closing Date:

(a) The Company was not and is not an Ineligible Issuer (as defined in Rule 405), without taking account of any determination by the Commission pursuant to Rule 405 that it is not necessary that the Company be considered an Ineligible Issuer.

(b) The Company has been duly incorporated and is validly existing as a corporation in good standing under the laws of the State of Delaware, with full corporate power and authority to own, lease and operate its properties and conduct its business, to execute and deliver this Agreement and the Warrants and to issue, sell and deliver the Securities as contemplated herein.

(c) The Company is duly qualified to do business as a foreign corporation and is in good standing in the State of California, which is the only jurisdiction where the ownership or leasing of its properties or the conduct of its business requires such qualification, except where the failure to be so qualified and in good standing would not, individually or in the aggregate, have a Material Adverse Effect.

(d) The Shares have been duly and validly authorized and, when issued and delivered against payment therefor as provided herein, will be duly and validly issued, fully paid and non-assessable and free of statutory and contractual preemptive rights, rights of first refusal and similar rights; the Shares, when issued and delivered against payment therefor as provided herein, will be free of any restriction upon the voting thereof pursuant to the Delaware General Corporation Law or the Company's charter or bylaws or any agreement or other instrument to which the Company is a party.

(e) This Agreement has been duly authorized, executed and delivered by the Company and constitutes the lawful, valid and legally binding obligation of the Company, enforceable in accordance with its terms, except as enforceability may be limited by bankruptcy, insolvency or similar laws affecting the rights of creditors generally and general equitable principles.

(f) Neither the Company nor any subsidiary is in breach or violation of or in default under (nor has any event occurred which, with notice, lapse of time or both, would result in any breach or violation of, constitute a default under or give the holder of any indebtedness (or a person acting on such holder's behalf) the right to require the repurchase, redemption or repayment of all or a part of such indebtedness under) (A) its respective charter or bylaws, or (B) any indenture, mortgage, deed of trust, bank loan or credit agreement or other evidence of indebtedness, or any

license, lease, contract or other agreement or instrument to which it is a party or by which it or any of its properties may be bound or affected, or (C) any applicable federal, state, local or foreign law, regulation or rule, or (D) any applicable rule or regulation of any self-regulatory organization or other non-governmental regulatory authority (including, without limitation, the rules and regulations of Nasdaq), or (E) any decree, judgment or order applicable to it or any of its properties, except, in the case of the foregoing clauses (B), (C), (D) and (E), for any such breach, violation, default or event that would not, individually or in the aggregate, have a Material Adverse Effect.

(g) Neither the Company nor any subsidiary is and, after giving effect to the offering and sale of the Securities and the application of the proceeds thereof as described in Section 5.4 of this Agreement, none of them will be, an “investment company” or an entity “controlled” by an “investment company,” as such terms are defined in the Investment Company Act.

(h) The execution, delivery and performance of this Agreement, the issuance and sale of the Securities and the consummation of the transactions contemplated hereby will not conflict with, result in any breach or violation of or constitute a default under (nor constitute any event which, with notice, lapse of time or both, would result in any breach or violation of, constitute a default under or give the holder of any indebtedness (or a person acting on such holder’s behalf) the right to require the repurchase, redemption or repayment of all or a part of such indebtedness under) (or result in the creation or imposition of a lien, charge or encumbrance on any property or assets of the Company or any subsidiary pursuant to) (A) the charter or bylaws of the Company or any subsidiary, or (B) any indenture, mortgage, deed of trust, bank loan or credit agreement or other evidence of indebtedness, or any license, lease, contract or other agreement or instrument to which the Company or any subsidiary is a party or by which either of them or any of their respective properties may be bound or affected, or (C) any applicable federal, state, local or foreign law, regulation or rule, or (D) any applicable rule or regulation of any self-regulatory organization or other non-governmental regulatory authority (including, without limitation, the rules and regulations of Nasdaq), or (E) any decree, judgment or order applicable to the Company or any subsidiary or any of their respective properties, except, in the case of the foregoing clauses (B), (C), (D) and (E), for any such conflict, breach, violation, default or event that would not, individually or in the aggregate, have a Material Adverse Effect.

(i) No approval, authorization, consent or order of or filing with any federal, state, local or foreign governmental or regulatory commission, board, body, authority or agency, or of or with any self-regulatory organization or other non-governmental regulatory authority (including, without limitation, Nasdaq) having jurisdiction over the Company, or approval of the stockholders of the Company, is required in connection with the issuance and sale of the Securities or the consummation by the Company of the transactions contemplated hereby, other than (i) any necessary qualification under the securities or blue sky laws of the various jurisdictions in which the Securities are being offered, (ii) any listing applications and related consents or any notices required by Nasdaq in the ordinary course of the offering of the Securities, (iii) filings with the Commission under the Securities Act or (iv) filings with the Commission on Form 8-K with respect to this Agreement.

(j) The Company is authorized under its Certificate of Incorporation to issue 300,000,000 shares of Common Stock. The Company's disclosure of its issued and outstanding capital stock in its most recent SEC Filing containing such disclosure was accurate in all material respects as of the date indicated in such SEC Filing. Since the date indicated in such SEC Filing, there has not been any change the Company's capital stock, other than as a result of the exercise of stock options or the award of stock options or restricted stock units in the ordinary course of business pursuant to the Company's stock-based compensation plans described in the SEC Reports. All of the issued and outstanding shares of the Company's capital stock have been duly authorized and validly issued and are fully paid, nonassessable and none of such shares were issued in violation of any pre-emptive rights and such shares were issued in compliance in all material respects with applicable state and federal securities law and any rights of third parties. Except for stock options and restricted stock units approved pursuant to Company stock-based compensation plans described in the SEC Reports and warrants described in the SEC Reports, there are no outstanding warrants, options, convertible securities or other rights, agreements or arrangements of any character under which the Company is or may be obligated to issue any equity securities of any kind and except as contemplated by this Agreement. There are no voting agreements, buy-sell agreements, option or right of first purchase agreements or other agreements of any kind among the Company and any of the security holders of the Company relating to the securities of the Company held by them. The issuance and sale of the Securities hereunder will not obligate the Company to issue shares of Common Stock or other securities to any other Person (other than the Purchasers) and will not result in the adjustment of the exercise, conversion, exchange or reset price of any outstanding security. Other than pursuant to this Agreement, (i) no person has the right, contractual or otherwise, to cause the Company to issue or sell to it any shares of Common Stock or shares of any other capital stock or other equity interests of the Company, (ii) no person has any preemptive rights, resale rights, rights of first refusal or other rights to purchase any shares of Common Stock or shares of any other capital stock of or other equity interests in the Company and (iii) no person has the right to act as an underwriter or as a financial advisor to the Company in connection with the offer and sale of the Securities; no person has the right, contractual or otherwise, to cause the Company to register under the Securities Act any shares of Common Stock or shares of any other capital stock of or other equity interests in the Company, or to include any such shares or interests in the Resale Registration Statement or the offering contemplated by this Agreement, except any such right that has been validly waived in writing as of the date of this Agreement, copies of such waivers to have been made available to you; no person has the right, contractual or otherwise, to cause the Company to register under the Securities Act any shares of Common Stock or shares of any other capital stock of or other equity interests in the Company, or to include any such shares or interests in any other offering of securities of the Company.

(k) Each of the Company and each subsidiary has all necessary licenses, authorizations, consents and approvals and has made all necessary filings required under any applicable law, regulation or rule, and has obtained all necessary licenses, authorizations, consents and approvals from other persons, in order to conduct their respective businesses, except where failure to have, make or obtain the same would not, individually or in the aggregate, have a Material Adverse Effect; neither the Company nor any subsidiary is in violation of, or in default under, or has received notice of any proceedings relating to revocation or modification of, any such license, authorization, consent or approval or any federal, state, local or foreign law, regulation or rule or any decree, order or judgment applicable to the Company or any subsidiary, except where such violation, default, revocation or modification would not, individually or in the aggregate, have a Material Adverse Effect.

(l) The Company's Common Stock is registered under Section 12 of the Exchange Act. The Company has filed all SEC Reports on a timely basis or has received a valid extension of such time of filing and has filed any such SEC Reports prior to the expiration of any such extension. As of their respective dates, the SEC Reports complied in all material respects with the requirements of the Exchange Act and, in each case, to the rules promulgated thereunder, as applicable, and none of the SEC Reports, when filed, contained any untrue statement of a material fact or omitted to state a material fact required to be stated therein or necessary in order to make the statements therein, in the light of the circumstances under which they were made, not misleading.

(m) The financial statements included in the SEC Reports, together with the related notes and schedules, present fairly the financial position of the Company as of the dates indicated and the results of operations, cash flows and changes in stockholders' equity of the Company for the periods specified and have been prepared in compliance in all material respects with the requirements of the Securities Act and Exchange Act and in conformity with U.S. generally accepted accounting principles applied on a consistent basis during the periods involved, except as otherwise disclosed therein and, in the case of unaudited, interim financial statements, subject to normal year-end audit adjustments and the exclusion of certain footnotes.

(n) There are no actions, suits, claims, investigations or proceedings pending to which the Company or any subsidiary or, to the Company's knowledge, any of their respective directors or officers is or would be a party or of which any of their respective properties is or would be subject at law or in equity, before or by any federal, state, local or foreign governmental or regulatory commission, board, body, authority or agency, or before or by any self-regulatory organization or other non-governmental regulatory authority (including, without limitation, the Nasdaq), except any such action, suit, claim, investigation or proceeding which, if resolved adversely to the Company or any subsidiary, would not, individually or in the aggregate, have a Material Adverse Effect (assuming, with respect to any such action, suit, claim, investigation or proceeding to which the Company or any subsidiary is a party, that such action, suit, claim, investigation or proceeding was resolved adversely to the Company or any subsidiary, as the case may be); and, to the Company's knowledge, no such actions, suits, claims, investigations or proceedings are threatened or contemplated.

(o) Ernst & Young LLP, who have certified certain financial statements of the Company and delivered their report with respect to the audited financial statements included in the SEC Reports, are independent public accountants with respect to the Company within the meaning of the Securities Act and the applicable published rules and regulations thereunder.

(p) Each stock option granted under any equity incentive plan of the Company (each, a "**Stock Plan**") was granted with a per share exercise price no less than the fair market value per share of Common Stock on the grant date of such option, and no such grant involved any "back-dating" or similar practice with respect to the effective date of such grant, each such option (i) was granted in compliance with applicable law and with the applicable Stock Plan(s), (ii) was duly approved by the board of directors (or a duly authorized committee thereof or by an executive officer pursuant to Section 157(c) of the Delaware General Corporation Law) of the Company and (iii) has been properly accounted for in the Company's financial statements in accordance with U.S. generally accepted accounting principles and disclosed in the Company's filings with the Commission.

(q) Subsequent to the date of this Agreement, there has not been (i) any material adverse change, or any development that would be reasonably expected to result in a material adverse change, in the business, properties, management, financial condition or results of operations of the Company and any subsidiary taken as a whole, (ii) any transaction to which the Company is a party which is material to the Company and any subsidiary taken as a whole, (iii) any obligation or liability, direct or contingent (including any off-balance sheet obligations), incurred by the Company or any subsidiary, which is material to the Company and any subsidiary taken as a whole, (iv) any change in the capital stock or outstanding indebtedness of the Company or any subsidiary (other than the issuance of shares of Common Stock upon exercise of stock options or vesting of restricted stock units granted under Stock Plans in existence on the date hereof and the grant of awards under Stock Plans in existence on the date hereof, in each case in the ordinary course of business) or (v) any dividend or distribution of any kind declared, paid or made on the capital stock of the Company.

(r) Each of the Company and each subsidiary has good title to all personal property, free and clear of all liens, claims, security interest or other encumbrances, except those that do not materially interfere with the use or proposed use of such property by the Company or any subsidiary, respectively, or as would not materially or adversely affect the value of such property; neither the Company nor any subsidiary own any real property; all the real property held under lease by the Company or any subsidiary is held thereby under valid, subsisting and enforceable leases.

(s) Except as would not, individually or in the aggregate, have a Material Adverse Effect, (i) the Company or any subsidiary owns the inventions, patent applications, patents, trademarks (both registered and unregistered), tradenames, service names, copyrights, trade secrets and other proprietary information (collectively, "**Intellectual Property**") described in the SEC Reports as being owned by it and owns or has obtained valid and enforceable licenses for, or other rights to use, all Intellectual Property used in, or necessary for, the conduct of the businesses of the Company and any subsidiary as currently conducted or as proposed to be conducted (collectively, "**Company Intellectual Property**"), except as enforceability may be limited by bankruptcy, insolvency or similar laws affecting the rights of creditors generally and general equitable principles; (ii) there are no third parties who have, or, to the Company's knowledge, will be able to establish, rights to use any Company Intellectual Property that is owned or purported to be owned by the Company or any subsidiary, other than any co-owner of any patent or patent application constituting Intellectual Property who is listed as such on the records of the U.S. Patent and Trademark Office (the "**PTO**"), and, to the Company's knowledge, no third party has any ownership interest in or to any Company Intellectual Property that is exclusively licensed to the Company or any subsidiary, except for, and to the extent of, the ownership rights of the owners of the Company Intellectual Property which the SEC Reports disclose is licensed to the Company or any subsidiary; (iii) to the Company's knowledge, there is no infringement, misappropriation or other violation by any third parties of any Company Intellectual Property owned by or exclusively licensed to the Company or any subsidiary; (iv) neither the Company nor any subsidiary has received any notice from, and there is no pending or, to the Company's knowledge, threatened

action, suit, proceeding or claim by, others challenging the Company's or any subsidiary's rights in or to any Company Intellectual Property, and the Company is unaware of any facts which would form a reasonable basis for any such action, suit, proceeding or claim; (v) neither the Company nor any subsidiary has received any notice from, and there is no pending or, to the Company's knowledge, threatened action, suit, proceeding or claim by, others challenging the validity, enforceability or scope of any Company Intellectual Property; and (vi) neither the Company nor any subsidiary has received any notice from, and there is no pending or, to the Company's knowledge, threatened action, suit, proceeding or claim by, others that the Company or any subsidiary infringes, misappropriates or otherwise violates, or would, upon the commercialization of any product or service described in the SEC Reports as under development, infringe, misappropriate or violate, any Intellectual Property of others.

(t) Neither the Company nor any subsidiary is engaged in any unfair labor practice; except for matters which would not, individually or in the aggregate, have a Material Adverse Effect, (i) there is (A) no unfair labor practice complaint pending or, to the Company's knowledge, threatened against the Company or any subsidiary before the National Labor Relations Board, and no grievance or arbitration proceeding arising out of or under collective bargaining agreements is pending or, to the Company's knowledge, threatened, (B) no strike, labor dispute, slowdown or stoppage pending or, to the Company's knowledge, threatened against the Company or any subsidiary and (C) no union representation dispute currently existing concerning the employees of the Company or any subsidiary, (ii) to the Company's knowledge, no union organizing activities are currently taking place concerning the employees of the Company or any subsidiary and (iii) there has been no violation of any federal, state, local or foreign law relating to discrimination in the hiring, promotion or pay of employees, any applicable wage or hour laws or any provision of the Employee Retirement Income Security Act of 1974, as amended, or the rules and regulations promulgated thereunder concerning the employees of the Company or any subsidiary.

(u) The Company and each subsidiary and their respective properties, assets and operations are in compliance with, and the Company and any subsidiary hold all permits, authorizations and approvals required under, Environmental Laws (as defined below), except to the extent that failure to so comply or to hold such permits, authorizations or approvals would not, individually or in the aggregate, have a Material Adverse Effect; there are no past, present or, to the Company's knowledge, reasonably anticipated future events, conditions, circumstances, activities, practices, actions, omissions or plans that would reasonably be expected to give rise to any material costs or liabilities to the Company or any subsidiary under, or to interfere with or prevent compliance by the Company or any subsidiary with, Environmental Laws; except as would not, individually or in the aggregate, have a Material Adverse Effect, neither the Company nor any subsidiary (i) is the subject of any investigation, (ii) has received any notice or claim, (iii) is a party to or affected by any pending or, to the Company's knowledge, threatened action, suit or proceeding, (iv) is bound by any judgment, decree or order or (v) has entered into any agreement, in each case relating to any alleged violation of any Environmental Law or any actual or alleged release or threatened release or cleanup at any location of any Hazardous Materials (as defined below) (as used herein, "**Environmental Law**" means any federal, state, local or foreign law, statute, ordinance, rule, regulation, order, decree, judgment, injunction, permit, license, authorization or other binding requirement, or common law, relating to health, safety or the protection, cleanup or restoration of the environment or natural resources, including those relating

to the distribution, processing, generation, treatment, storage, disposal, transportation, other handling or release or threatened release of Hazardous Materials, and “**Hazardous Materials**” means any material (including, without limitation, pollutants, contaminants, hazardous or toxic substances or wastes) that is regulated by or may give rise to liability under any Environmental Law).

(v) All tax returns required to be filed by the Company or any subsidiary have been timely filed, and all taxes and other assessments of a similar nature (whether imposed directly or through withholding) including any interest, additions to tax or penalties applicable thereto due or claimed to be due from such entities have been timely paid, other than those being contested in good faith and for which adequate reserves have been provided, except to the extent failure to file such return or make such payments would not, individually or in the aggregate, have a Material Adverse Effect.

(w) The Company maintains insurance covering the properties, operations, personnel and businesses of the Company and any subsidiary as the Company reasonably deems adequate to insure against such losses and risks in accordance with customary industry practice to protect the Company and any subsidiary and their respective businesses; all such insurance is fully in force on the date hereof and will be fully in force at the time of purchase; the Company has no reason to believe that it will not be able to renew any such insurance as and when such insurance expires or obtain similar coverage at reasonable cost from similar insurers.

(x) The Company (i) does not have any material lending or other relationship with any bank or lending affiliate of the Placement Agent and (ii) does not intend to use any of the proceeds from the sale of the Securities hereunder to repay any outstanding debt owed to any affiliate of the Placement Agent.

(y) Neither the Company nor any subsidiary has sent any communication or received any written communication regarding termination of, or intent not to renew, any of the contracts or agreements referred to or described in the SEC Reports, and no such termination or non-renewal has been threatened by the Company or any subsidiary or, to the Company’s knowledge, threatened in writing by any other party to any such contract or agreement.

(z) The Company has established and maintains a system of internal accounting controls sufficient to provide reasonable assurance that (i) transactions are executed in accordance with management’s general or specific authorization; (ii) transactions are recorded as necessary to permit preparation of financial statements in conformity with generally accepted accounting principles and to maintain accountability for assets; (iii) access to assets is permitted only in accordance with management’s general or specific authorization; and (iv) the recorded accountability for assets is compared with existing assets at reasonable intervals and appropriate action is taken with respect to any differences.

(aa) The Company has established and maintains “disclosure controls and procedures” (as such term is defined in Rules 13a-15 and 15d-15 under the Exchange Act) that have been designed to ensure that material information relating to the Company is made known to the Company’s principal executive officer and principal financial officer by others within those entities; and such disclosure controls and procedures are effective. The Company maintains a

system of internal control over financial reporting (as such term is defined in Rule 13a-15(f) under the Exchange Act) that (i) has been designed by the Company's principal executive officer and principal financial officer, or under their supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles and (ii) is sufficient to provide reasonable assurance that (A) transactions are executed in accordance with management's general or specific authorization, (B) transactions are recorded as necessary to permit preparation of financial statements in conformity with generally accepted accounting principles and to maintain accountability for assets, (C) access to assets is permitted only in accordance with management's general or specific authorization, and (D) the recorded accountability for assets is compared with the existing assets at reasonable intervals and appropriate action is taken with respect to any differences. The Company is not aware of any material weaknesses in its internal control over financial reporting (it being understood that this subsection shall not require the Company to comply with Section 404 of the Sarbanes Oxley Act of 2002 (the "**Sarbanes-Oxley Act**") as of an earlier date than it would otherwise be required to so comply under applicable law).

(bb) Each "forward-looking statement" (within the meaning of Section 27A of the Securities Act or Section 21E of the Exchange Act) contained or incorporated by reference in the SEC Reports has been made or reaffirmed with a reasonable basis and in good faith.

(cc) All statistical or market-related data included in the SEC Reports are based on or derived from sources that the Company reasonably believes to be reliable and accurate, and the Company has obtained the written consent to the use of such data from such sources to the extent required.

(dd) Neither the Company nor any subsidiary nor any of their respective directors or officers, affiliates or controlling persons has taken, directly or indirectly, without giving effect to activities by the Placement Agent, any action designed to or that would constitute or that might reasonably be expected to cause or result in, under the Exchange Act or otherwise, stabilization or manipulation of the price of any security of the Company to facilitate the sale or resale of the Securities.

(ee) The interactive data in eXtensible Business Reporting Language included in the SEC Reports fairly presents the information called for in all material respects and has been prepared in accordance with the Commission's rules and guidelines applicable thereto.

(ff) Neither the Company nor any subsidiary nor, to the knowledge of the Company, any director, officer, agent, employee or affiliate of the Company or any subsidiary has taken any action, directly or indirectly, while acting on behalf of the Company or any subsidiary, that would result in a violation by such persons of the Foreign Corrupt Practices Act of 1977, as amended, and the rules and regulations thereunder (the "**Foreign Corrupt Practices Act**") or any similar anti-corruption law; the Company is not aware of any such action, directly or indirectly, having been taken on behalf of the Company or any subsidiary; and the Company and any subsidiary and, to the knowledge of the Company, their respective affiliates have instituted and maintain policies and procedures designed to ensure continued compliance therewith.

(gg) The operations of the Company and any subsidiary are and have been conducted at all times in compliance with applicable financial recordkeeping and reporting requirements of the USA Patriot Act, the Bank Secrecy Act of 1970, as amended, the money laundering statutes of all jurisdictions, the rules and regulations thereunder and any related or similar rules, regulations or guidelines, issued, administered or enforced by any governmental agency (collectively, the “**Money Laundering Laws**”); and no action, suit or proceeding by or before any court or governmental agency, authority or body or any arbitrator or non-governmental authority involving the Company or any subsidiary with respect to the Money Laundering Laws is pending or, to the Company’s knowledge, threatened.

(hh) Neither the Company nor any subsidiary nor any of their respective affiliates, directors, officers, nor to the knowledge of the Company, any agent or employee of the Company or any subsidiary is subject to any sanctions administered or enforced by the Office of Foreign Assets Control (“**OFAC**”) of the United States Treasury Department, the U.S. Department of State, the United Nations Security Council, the European Union, Her Majesty’s Treasury or any other relevant sanctions authority; and the Company will not directly or indirectly use the proceeds of the offering of the Securities contemplated hereby, or lend, contribute or otherwise make available such proceeds to any subsidiary, joint venture partner or other person or entity for the purpose of financing the activities of any person that is the target of sanctions administered or enforced by such authorities or in connection with any country or territory that is the target of country- or territory-wide OFAC sanctions (currently, Iran, Syria, Cuba, North Korea, and the Crimea Region of Ukraine).

(ii) The preclinical studies and clinical trials that are described in, or the results of which are referred to in, the SEC Reports were and, if still pending, are being conducted in all material respects in accordance with standard accepted medical and scientific research procedures and all applicable Laws, including, but not limited to, the Federal Food, Drug and Cosmetic Act (the “**FDCA**”) and its applicable implementing regulations at 21 C.F.R. Parts 50, 54, 56, 58 and 312; the descriptions of and information regarding the results of such studies, tests and trials, and the data and results derived therefrom, contained in the SEC Reports are accurate and complete, as of the date indicated, in all material respects and fairly present the data derived from such tests and trials, and neither the Company nor any subsidiary, after due inquiry, has any knowledge of any other studies, tests, trials, publications, presentations or other information relating to the Company’s products or product candidates not described in the SEC Reports the results of which reasonably call into question the results described or referred to in the SEC Reports; neither the Company nor any subsidiary has received any notices or other correspondence from the Food and Drug Administration of the U.S. Department of Health and Human Services or any committee thereof or from any other U.S. or foreign government or drug or medical device regulatory agency (collectively, the “**Regulatory Agencies**”) requiring or threatening the termination, suspension or material modification of any studies, tests or trials that are described or referred to in the SEC Reports; and the Company and any subsidiary have operated and currently are in compliance in all material respects with all applicable rules, regulations and policies of the Regulatory Agencies.

(jj) Except as would not, individually or in the aggregate, have or may reasonably be expected to have a Material Adverse Effect: (i) neither the Company nor any subsidiary has received any written notice of adverse filing, warning letter, untitled letter or other correspondence

or notice from any Regulatory Agency or other relevant regulatory authorities, or any other court or arbitrator or federal, state, local or foreign governmental or regulatory authority, alleging or asserting material noncompliance with the Federal Food, Drug and Cosmetic Act (21 U.S.C. § 301 et seq.) or similar state, federal or foreign law or regulation; (ii) the Company and any subsidiary, and to the Company's knowledge, their respective directors, officers, employees or agents, are and have been since January 1, 2016 in compliance in all material respects with applicable health care laws, including without limitation, the Federal Food, Drug and Cosmetic Act (21 U.S.C. § 301 et seq.), the federal Anti-Kickback Statute (42 U.S.C. § 1320a-7b(b)), the Civil Monetary Penalties Law (42 U.S.C. § 1320a-7a), the U.S. Civil False Claims Act (31 U.S.C. § 3729 et seq.), 18 U.S.C. §§ 286 and 287, and the health care fraud criminal provisions under the U.S. Health Insurance Portability and Accountability Act of 1996 ("**HIPAA**") (42 U.S.C. § 1320d et seq.), the exclusion laws (42 U.S.C. § 1320a-7), Medicare (Title XVIII of the Social Security Act), Medicaid (Title XIX of the Social Security Act), HIPAA, as amended by the Health Information Technology for Economic and Clinical Health Act (42 U.S.C. § 17921 et seq.), each as amended, and the regulations promulgated thereunder; and all other comparable local, state, federal, national, supranational and foreign laws, and the regulations promulgated thereunder, (collectively, "**Health Care Laws**"); (iii) neither the Company nor any subsidiary has received written notice of any ongoing claim, action, suit, proceeding, hearing, enforcement, investigation, arbitration or other action from any U.S. or non-U.S. federal, national, state, provincial, local, municipal, international government or other governmental, administrative or regulatory authority, governmental, administrative or regulatory agency or body, department, board, bureau, agency or instrumentality, court, tribunal, arbitrator or arbitral body (public or private) or self-regulatory organization (each, a "**Governmental Authority**") or third party alleging that any product, operation or activity is in violation of any Health Care Laws or has any knowledge that any such Governmental Authority or third party is considering any such claim, litigation, arbitration, action, suit, investigation or proceeding; (iv) neither the Company nor any subsidiary or any of their respective directors, officers, employees or, to the Company's knowledge, agents, is or has been debarred, suspended or excluded, or has been convicted of any crime or engaged in any conduct that would result in a debarment, suspension or exclusion from any federal or state government health care program; and (v) the Company and any subsidiary are not a party to nor have any ongoing reporting obligations pursuant to any corporate integrity agreement, deferred prosecution agreement, monitoring agreement, consent decree, settlement order, plan of correction or similar agreement imposed by any Governmental Authority.

(kk) The Company has not received any notice from the Nasdaq Global Select Market regarding the delisting of the Common Stock and is in compliance with all continued listing standards of the Nasdaq Global Select Market.

(ll) No "bad actor" disqualifying event described in Rule 506(d)(1)(i)-(viii) of the 1933 Act (a "**Disqualification Event**") is applicable to the Company or, to the Company's knowledge, any Company Covered Person (as defined below), except for a Disqualification Event as to which Rule 506(d)(2)(ii-iv) or (d)(3), is applicable. "**Company Covered Person**" means, with respect to the Company as an "issuer" for purposes of Rule 506 promulgated under the 1933 Act, any person listed in the first paragraph of Rule 506(d)(1). Other than the Placement Agents, the Company is not aware of any Person (other than any Company Covered Person) that has been or will be paid (directly or indirectly) remuneration for solicitation of purchasers in connection with the sale of the Securities pursuant to this Agreement. The Company has complied, to the extent applicable, with its disclosure obligations under Rule 506(e), and has furnished to the Placement Agents a copy of any disclosures provided thereunder.

(mm) The Company shall file a Form D with respect to the Securities as required under Regulation D and, to the extent the Form D is not publicly available on the Commission's EDGAR reporting system, shall provide a copy thereof to each Purchaser promptly after such filing. The Company, on or before the Closing Date, shall take such action as the Company shall reasonably determine is necessary in order to obtain an exemption for or to qualify the Securities for sale to the Purchasers at the Closing, pursuant to this Agreement under applicable securities or blue sky laws of the states of the United States (or to obtain an exemption from such qualification), and, if requested by a Purchaser, shall provide evidence of any material action so taken to such Purchaser on or prior to the Closing Date. The Company shall make all filings and reports relating to the offer and sale of the Securities required under applicable securities or blue sky laws of the states of the United States following the Closing Date.

3.2 Representations, Warranties and Covenants of the Purchasers. Each Purchaser, for itself and for no other Purchaser, hereby represents, warrants and covenants to the Company and the Placement Agent as of the Closing:

(a) Purchaser represents and warrants that: (i) Purchaser has all requisite legal and corporate or other power and capacity and has taken all requisite corporate or other action to execute and deliver this Agreement, to purchase the Securities and to carry out and perform all of its obligations under this Agreement; and (ii) this Agreement constitutes the legal, valid and binding obligation of the Purchaser, enforceable against the Purchaser in accordance with its terms, except (x) as limited by applicable bankruptcy, insolvency, reorganization or similar laws relating to or affecting the enforcement of creditors' rights generally and (y) as limited by equitable principles generally.

(b) At the time such Purchaser was offered the Securities, it was, and as of the date hereof it is, either: (i) an "accredited investor" as defined in Rule 501(a)(1), (a)(2), (a)(3), (a)(7) or (a)(8) under the Securities Act or (ii) a "qualified institutional buyer" as defined in Rule 144A(a) under the Securities Act. Purchaser is aware of the Company's business affairs and financial condition and has had access to and has acquired sufficient information about the Company to reach an informed and knowledgeable decision to acquire the Securities. Purchaser has such business and financial experience as is required to give it the capacity to protect its own interests in connection with the purchase of the Securities. Purchaser acknowledges that it has had the opportunity to review the Company's filings with the Commission and has been afforded (i) the opportunity to ask such questions as it has deemed necessary of, and to receive answers from, representatives of the Company concerning the terms and conditions of the offering of the Securities and the merits and risks of investing in the Securities and (ii) the opportunity to obtain such additional information that the Company possesses or can acquire without unreasonable effort or expense that is necessary to make an informed investment decision with respect to the investment.

(c) Each Purchaser is purchasing the Securities for its own account, for investment purposes only, and not with a present view to, or for, resale, distribution or fractionalization thereof, in whole or in part, within the meaning of the Securities Act. Each Purchaser understands that its acquisition of the Securities has not been registered under the Securities Act or registered or qualified under any state securities law in reliance on specific exemptions therefrom, which exemptions may depend upon, among other things, the bona fide nature of each Purchaser's investment intent as expressed herein. Each Purchaser will not, directly or indirectly, offer, sell, pledge, transfer or otherwise dispose of (or solicit any offers to buy, purchase or otherwise acquire or take a pledge of) the Securities except in compliance with the Securities Act and the rules and regulations promulgated thereunder.

(d) Each Purchaser represents and acknowledges that it has not been solicited to offer to purchase or to purchase any Securities by means of any general solicitation or advertising within the meaning of Regulation D under the Securities Act.

(e) Each Purchaser represents that it is not a person of the type described in Section 506(d) of Regulation D under the Securities Act that would disqualify the Company from engaging in a transaction pursuant to Section 506 of Regulation D under the Securities Act.

(f) Each Purchaser understands that the Securities being offered and sold to it in reliance on specific exemptions from the registration requirements of United States federal and state securities laws and that the Company is relying in part upon the truth and accuracy of, and each Purchaser's compliance with, the representations, warranties, agreements, acknowledgements and understandings of each Purchaser set forth herein in order to determine the availability of such exemptions and the eligibility of each Purchaser to acquire the Securities. Each Purchaser further acknowledges and understands that the Securities may not be resold or otherwise transferred except in a transaction registered under the Securities Act or unless an exemption from such registration is available.

(g) The Purchaser understands that nothing in this Agreement or any other materials presented to the Purchaser in connection with the purchase and sale of the Securities constitutes legal, tax or investment advice. The Purchaser has consulted such legal, tax and investment advisors and made such investigations as the Purchaser, in its sole discretion, has deemed necessary or appropriate in connection with its purchase of the Securities. Such Purchaser understands that the Placement Agent has acted solely as the agent of the Company in this placement of the Securities and such Purchaser has not relied on the business, legal, tax or investment advice of the Placement Agent or any of its agents, counsel or affiliates in making its investment decision hereunder, and confirms that none of such persons has made any representations or warranties to such Purchaser in connection with the transactions contemplated herein.

(h) As of the Closing Date, each Purchaser has not directly or indirectly, nor has any person acting on behalf of or pursuant to any understanding with the Purchaser, engaged in any purchases or sales of the Company's securities (including, without limitation, any Short Sales involving the Company's securities) since the time that the Purchaser was first contacted by the Company, the Placement Agent or any other person regarding the transactions contemplated hereby. Each Purchaser covenants that neither it nor any person acting on its behalf or pursuant to any understanding with it will engage in any purchases or sales of the Company's securities (including, without limitation, any Short Sales involving the Company's securities) prior to the time that the transactions contemplated by this Agreement are publicly disclosed.

(i) Purchaser has independently evaluated the merits of its decision to purchase Securities pursuant to this Agreement. Purchaser understands that nothing in this Agreement or any other materials presented to Purchaser in connection with the purchase and sale of the Securities constitutes legal, tax or investment advice.

(j) Purchaser will hold in confidence all information concerning this Agreement and the sale and issuance of the Securities until the Company has made a public announcement concerning this Agreement and the sale and issuance of the Securities, which shall be made not later than 9:00 am New York time on the first Trading Day immediately after the signing of this Agreement.

(k) Purchaser understands that no United States federal or state agency or any other government or governmental agency has passed upon or made any recommendation or endorsement of the Securities.

(l) Legend.

(i) Each Purchaser understands that the Securities shall bear a restrictive legend in substantially the following form (and a stop transfer order may be placed against transfer of the certificates for the Securities):

“THE SECURITIES REPRESENTED BY THIS CERTIFICATE HAVE NOT BEEN REGISTERED UNDER THE SECURITIES ACT OF 1933, AS AMENDED, OR THE SECURITIES LAWS OF ANY STATE OF THE UNITED STATES OR IN ANY OTHER JURISDICTION. THE SECURITIES REPRESENTED HEREBY MAY NOT BE OFFERED, SOLD OR TRANSFERRED IN THE ABSENCE OF AN EFFECTIVE REGISTRATION STATEMENT FOR THE SECURITIES UNDER APPLICABLE SECURITIES LAWS UNLESS OFFERED, SOLD OR TRANSFERRED PURSUANT TO AN AVAILABLE EXEMPTION FROM THE REGISTRATION REQUIREMENTS OF THOSE LAWS.”

(ii) The Company shall, at its sole expense, upon appropriate notice from any Purchaser stating that Registrable Shares have been sold pursuant to an effective Registration Statement, timely prepare and deliver certificates or book-entry shares representing the Securities to be delivered to a transferee pursuant to the Registration Statement, which certificates or book-entry shares shall be free of any restrictive legends and in such denominations and registered in such names as such Purchaser may request. Further, the Company shall, at its sole expense, cause its legal counsel or other counsel satisfactory to the transfer agent: (i) while the Registration Statement is effective, to issue to the transfer agent a “blanket” legal opinion to allow sales without restriction pursuant to the effective Registration Statement, and (ii) provide all other opinions as may reasonably be required by the transfer agent in connection with the removal of legends. A Purchaser may request that the Company remove, and the Company agrees to authorize the removal of, any legend from such Securities, following the delivery by a Purchaser

to the Company or the Company's transfer agent of a legended certificate representing such Securities: (i) following any sale of such Securities pursuant to Rule 144, (ii) if such Securities are eligible for sale under Rule 144(b)(1), or (iii) following the time that the Registration Statement is declared effective. If a legend removal request is made pursuant to the foregoing, the Company will, no later than two business days following the delivery by a Purchaser to the Company or the Company's transfer agent of a legended certificate representing such Securities (or a request for legend removal, in the case of Securities issued in book-entry form), deliver or cause to be delivered to such Purchaser a certificate representing such Securities that is free from all restrictive legends or an equivalent book-entry position, as requested by the Purchaser. Certificates for Securities free from all restrictive legends may be transmitted by the Company's transfer agent to the Purchasers by crediting the account of the Purchaser's prime broker with the Depository Trust Company ("**DTC**") as directed by such Purchaser. The Company warrants that the Securities shall otherwise be freely transferable on the books and records of the Company as and to the extent provided in this Agreement. If a Purchaser effects a transfer of the Securities in accordance with Section 3.2(l)(ii), the Company shall permit the transfer and shall promptly instruct its transfer agent to issue one or more certificates or credit shares to the applicable balance accounts at DTC in such name and in such denominations as specified by such Purchaser to effect such transfer. Each Purchaser hereby agrees that the removal of the restrictive legend pursuant to this Section 3.2(l)(ii) is predicated upon the Company's reliance that such Purchaser will sell any such Securities pursuant to either the registration requirements of the Securities Act, including any applicable prospectus delivery requirements, or an exemption therefrom.

(m) Immediately prior to the Closing, Purchaser, together with its affiliates and any other persons acting as a group together with the Purchaser and any of its affiliates, beneficially owned the number of shares of Common Stock set forth on such Purchaser's signature page attached hereto (as such ownership is calculated pursuant to Section 13 of the Exchange Act).

(n) If Purchaser is not a United States person (as defined by Section 7701(a)(30) of the Code), Purchaser hereby represents that it has satisfied itself as to the full observance of the laws of its jurisdiction in connection with any invitation to subscribe for the Securities or any use of this Agreement, including (a) the legal requirements within its jurisdiction for the purchase of the Securities, (b) any foreign exchange restrictions applicable to such purchase or acquisition, (c) any government or other consents that may need to be obtained, and (d) the income tax and other tax consequences, if any, that may be relevant to the purchase, holding, redemption, sale or transfer of the Securities. The Purchaser's subscription and payment for and continued beneficial ownership of the Securities will not violate any applicable securities or other laws of the Purchaser's jurisdiction.

4. REGISTRATION RIGHTS

4.1 Definitions. For the purpose of this Section 4:

(a) the term "**Resale Registration Statement**" shall mean any registration statement required to be filed by Section 4.2 below, and shall include any preliminary prospectus, final prospectus, exhibit or amendment included in or relating to such registration statements; and

(b) the term “**Registrable Shares**” means the (i) Shares, and (ii) any other shares of Common Stock issued as a dividend or other distribution with respect to, in exchange for, or in replacement of the Shares; provided, however, that a security shall cease to be a Registrable Share upon the earliest to occur of the following: (i) a Resale Registration Statement registering such security under the Securities Act has been declared or becomes effective and such security has been sold or otherwise transferred by the holder thereof pursuant to and in a manner contemplated by such effective Resale Registration Statement, (ii) such security is sold pursuant to Rule 144 under circumstances in which any legend borne by such security relating to restrictions on transferability thereof, under the Securities Act or otherwise, is removed by the Company, (iii) such security is eligible to be sold pursuant to Rule 144 without condition or restriction, including without any limitation as to volume of sales, and without the Holder complying with any method of sale requirements or notice requirements under Rule 144, or (iv) such security shall cease to be outstanding following its issuance.

4.2 Registration Procedures and Expenses. The Company shall:

(a) use commercially reasonable efforts to file a Resale Registration Statement (the “**Mandatory Registration Statement**”) with the Commission on or before the date 30 days following the Closing Date (the “**Filing Date**”) to register all of the Registrable Shares on Form S-3 under the Securities Act (providing for shelf registration of such Registrable Shares under Commission Rule 415), and to provide each Purchaser with a copy of such draft Mandatory Registration Statement for review not less than two business days before filing;

(b) use its commercially reasonable efforts to cause such Mandatory Registration Statement to be declared effective within the earlier of (i) 30 days following the Filing Date (or, in the event the Staff reviews and has written comments to the Mandatory Registration Statement, within 120 days following the Closing Date) and (ii) the 10th business day after the date the Company is notified (orally or in writing, whichever is earlier) by the SEC that the Mandatory Registration Statement will not be “reviewed” or will not be subject to further comments from the Staff (the earlier of the foregoing or the applicable date set forth in Section 4.2(h), the “**Effectiveness Deadline**”), such efforts to include, without limiting the generality of the foregoing, preparing and filing with the Commission any financial statements or other information that is required to be filed prior to the effectiveness of such Mandatory Registration Statement;

(c) notwithstanding anything contained in this Agreement to the contrary, in the event that the Commission limits the amount of Registrable Shares or otherwise requires a reduction in the number of Registrable Shares that may be included and sold by the Purchasers in the Mandatory Registration Statement (in each case, subject to Section 4.3), then the Company shall prepare and file (i) within 10 business days of the first date or time that such excluded Registrable Shares may then be included in a Resale Registration Statement if the Commission shall have notified the Company that certain Registrable Shares were not eligible for inclusion in the Resale Registration Statement or (ii) in all other cases, within 20 days following the date that the Company becomes aware that such additional Resale Registration Statement is required (the “**Additional Filing Date**”), a Resale Registration Statement (any such Resale Registration Statement registering such excluded Registrable Shares, an “**Additional Registration Statement**”

and, together with the Mandatory Registration Statement, a “**Resale Registration Statement**”) to register any Registrable Shares that have been excluded (or, if applicable, the maximum number of such excluded Registrable Shares that the Company is permitted to register for resale on such Additional Registration Statement consistent with Commission guidance), if any, from being registered on the Mandatory Registration Statement;

(d) use its commercially reasonable efforts to cause any such Additional Registration Statement to be declared effective as promptly as practicable following the Additional Filing Date, such efforts to include, without limiting the generality of the foregoing, preparing and filing with the Commission any financial statements or other information that is required to be filed prior to the effectiveness of any such Additional Registration Statement;

(e) prepare and file with the Commission such amendments and supplements to such Resale Registration Statements and the prospectus used in connection therewith as may be necessary to keep such Resale Registration Statements continuously effective and free from any material misstatement or omission to state a material fact therein until termination of such obligation as provided in **Section 4.6** below, subject to the Company’s right to suspend pursuant to **Section 4.5**;

(f) furnish to the Purchasers such number of copies of prospectuses in conformity with the requirements of the Securities Act and such other documents as the Purchasers may reasonably request, in order to facilitate the public sale or other disposition of all or any of the Registrable Shares by the Purchasers;

(g) file such documents as may be required of the Company for normal securities law clearance for the resale of the Registrable Shares in such states of the United States as may be reasonably requested by the Purchasers and use its commercially reasonable efforts to maintain such blue sky qualifications during the period the Company is required to maintain effectiveness of the Resale Registration Statements; provided, however, that the Company shall not be required in connection with this **Section 4.2(g)** to qualify as a foreign corporation or execute a general consent to service of process in any jurisdiction in which it is not now so qualified or has not so consented;

(h) upon notification by the Commission that the Resale Registration Statement will not be reviewed or is not subject to further review by the Commission, the Company shall within three business days following the date of such notification request acceleration of such Resale Registration Statement (with the requested effectiveness date to be not more than two business days later);

(i) upon notification by the Commission that the Resale Registration Statement has been declared effective by the Commission, the Company shall file the final prospectus under Rule 424 of the Securities Act (“**Rule 424**”) within the applicable time period prescribed by Rule 424;

(j) advise the Purchasers promptly:

(i) of the effectiveness of the Resale Registration Statement or any post-effective amendments thereto;

(ii) of any request by the Commission for amendments to the Resale Registration Statement or amendments to the prospectus or for additional information relating thereto;

(iii) of the issuance by the Commission of any stop order suspending the effectiveness of the Resale Registration Statement under the Securities Act or of the suspension by any state securities commission of the qualification of the Registrable Shares for offering or sale in any jurisdiction, or the initiation of any proceeding for any of the preceding purposes; and

(iv) of the existence of any fact and the happening of any event that makes any statement of a material fact made in the Resale Registration Statement, the prospectus and amendment or supplement thereto, or any document incorporated by reference therein, untrue, or that requires the making of any additions to or changes in the Resale Registration Statement or the prospectus in order to make the statements therein not misleading;

(k) cause all Registrable Shares to be listed on each securities exchange, if any, on which equity securities by the Company are then listed; and

(l) bear all expenses in connection with the procedures in paragraphs (a) through (k) of this **Section 4.2** and the registration of the Registrable Shares on such Resale Registration Statement and the satisfaction of the blue sky laws of such states.

4.3 Rule 415; Cutback.

If at any time the staff of the Commission (“**Staff**”) takes the position that the offering of some or all of the Registrable Shares in a Registration Statement is not eligible to be made on a delayed or continuous basis under the provisions of Rule 415 under the Securities Act or requires any Purchaser to be named as an “underwriter,” the Company shall (in consultation with legal counsel to the lead Purchaser) use its commercially reasonable efforts to persuade the Commission that the offering contemplated by the Registration Statement is a valid secondary offering and not an offering “by or on behalf of the issuer” as defined in Rule 415 and that none of the Purchasers is an “underwriter;” provided, that if the Commission or another regulatory agency requests that a Purchaser be identified as a statutory underwriter in the Registration Statement, Purchaser will have the opportunity to withdraw from the Registration Statement upon its prompt written request to the Company. In the event that, despite the Company’s commercially reasonable efforts and compliance with the terms of this Section 4.3, the Staff refuses to alter its position, the Company shall (i) remove from the Registration Statement such portion of the Registrable Shares (the “**Cut Back Shares**”) and/or (ii) agree to such restrictions and limitations on the registration and resale of the Registrable Shares as the Staff may require to assure the Company’s compliance with the requirements of Rule 415 (collectively, the “**SEC Restrictions**”); provided, however, that the Company shall not agree to name any Purchaser as an “underwriter” in such Registration Statement without the prior written consent of such Purchaser. Any cutback imposed on the Purchasers pursuant to this Section 4.3 shall be allocated among the Purchasers on a pro rata basis, unless the SEC Restrictions otherwise require or provide or the Purchasers holding

a majority of the Registrable Shares otherwise agree. No liquidated damages shall accrue as to any Cut Back Shares until such date as the Company is able to effect the registration of such Cut Back Shares in accordance with any SEC Restrictions (such date, the “**Restriction Termination Date**” of such Cut Back Shares). From and after the Restriction Termination Date applicable to any Cut Back Shares, all of the provisions of this Section 4 shall again be applicable to such Cut Back Shares; provided, however, that (x) the Filing Deadline for the Registration Statement including such Cut Back Shares shall be 10 business days after such Restriction Termination Date, and (y) the Effectiveness Deadline with respect to such Cut Back Shares shall be the 90th day immediately after the Restriction Termination Date or the 120th day if the Staff reviews such Registration Statement (but in any event no later than three business days from the Staff indicating it has no further comments on such Registration Statement).

4.4 Indemnification.

(a) The Company agrees to indemnify and hold harmless the Purchasers, and the partners, members, officers and directors of the Purchasers and each person, if any, who controls the Purchasers within the meaning of the Securities Act or the Exchange Act, from and against any losses, claims, damages or liabilities to which they may become subject (under the Securities Act or otherwise) insofar as such losses, claims, damages or liabilities (or actions or proceedings in respect thereof) arise out of, or are based upon, any material breach of this Agreement by the Company or any untrue statement or alleged untrue statement of a material fact contained in the Resale Registration Statement or any omission or alleged omission to state therein a material fact required to be stated therein or necessary to make the statements therein, in light of the circumstances under which they were made, not misleading or arise out of any failure by the Company to fulfill any undertaking included in the Resale Registration Statement and the Company will, as incurred, reimburse the Purchasers, and their partners, members, officers, directors or controlling persons for any legal or other expenses reasonably incurred in investigating, defending or preparing to defend any such action, proceeding or claim; provided, however, that the Company shall not be liable in any such case to the extent that such loss, claim, damage or liability (collectively, “**Loss**”) arises out of, or is based upon: (i) an untrue statement or omission or alleged untrue statement or omission made in such Resale Registration Statement in reliance upon and in conformity with written information furnished to the Company by or on behalf of the Purchasers, or their partners, members, officers, directors or controlling persons specifically for use in preparation of the Resale Registration Statement; or (ii) any breach of this Agreement by the Purchasers; provided further, however, that the Company shall not be liable to the Purchasers (or any partner, member, officer, director or controlling person of the Purchasers) to the extent that any such Loss is caused by an untrue statement or omission or alleged untrue statement or omission made in any preliminary prospectus if either (i) (A) any Purchaser failed to send or deliver a copy of the final prospectus with or prior to, or any Purchaser failed to confirm that a final prospectus was deemed to be delivered prior to (in accordance with Rule 172 of the Securities Act), the delivery of written confirmation of the sale by a Purchaser to the person asserting the claim from which such Loss resulted and (B) the final prospectus corrected such untrue statement or omission, (ii) (X) such untrue statement or omission is corrected in an

amendment or supplement to the prospectus and (Y) having previously been furnished by or on behalf of the Company with copies of the prospectus as so amended or supplemented or notified by the Company that such amended or supplemented prospectus has been filed with the Commission, in accordance with Rule 172 of the Securities Act, any Purchaser thereafter fails to deliver such prospectus as so amended or supplemented, with or prior to or a Purchaser fails to confirm that the prospectus as so amended or supplemented was deemed to be delivered prior to (in accordance with Rule 172 of the Securities Act), the delivery of written confirmation of the sale by a Purchaser to the person asserting the claim from which such Loss resulted or (iii) a Purchaser sold Registrable Shares in violation of such Purchasers' covenant contained in **Section 3.2** of this Agreement.

(b) The Purchasers agree, severally and not jointly, to indemnify and hold harmless the Company (and each person, if any, who controls the Company within the meaning of Section 15 of the Securities Act or Section 20 of the Exchange Act, each officer of the Company who signs the Resale Registration Statement and each director of the Company), from and against any losses, claims, damages or liabilities to which the Company (or any such officer, director or controlling person) may become subject (under the Securities Act or otherwise), insofar as such losses, claims, damages or liabilities (or actions or proceedings in respect thereof) arise out of, or are based upon, any material breach of this Agreement by the Purchasers or untrue statement or alleged untrue statement of a material fact contained in the Resale Registration Statement (or any omission or alleged omission to state therein a material fact required to be stated therein or necessary to make the statements therein, in light of the circumstances under which they were made, not misleading in each case, on the effective date thereof), if, and only to the extent, such untrue statement or omission or alleged untrue statement or omission was made in reliance upon and in conformity with written information furnished by or on behalf of the Purchasers specifically for use in preparation of the Resale Registration Statement, and the Purchasers, severally and not jointly, will reimburse the Company (and each of its officers, directors or controlling persons) for any legal or other expenses reasonably incurred in investigating, defending or preparing to defend any such action, proceeding or claim; provided, however, that in no event shall any indemnity under this **Section 4.4(b)** be greater in amount than the dollar amount of the proceeds received by the Purchasers upon the sale of such Registrable Shares.

(c) Promptly after receipt by any indemnified person of a notice of a claim or the beginning of any action in respect of which indemnity is to be sought against an indemnifying person pursuant to this **Section 4.4**, such indemnified person shall notify the indemnifying person in writing of such claim or of the commencement of such action, and, subject to the provisions hereinafter stated, in case any such action shall be brought against an indemnified person and such indemnifying person shall have been notified thereof, such indemnifying person shall be entitled to participate therein, and, to the extent that it shall wish, to assume the defense thereof, with counsel reasonably satisfactory to such indemnified person. After notice from the indemnifying person to such indemnified person of its election to assume the defense thereof, such indemnifying person shall not be liable to such indemnified person for any legal expenses subsequently incurred by such indemnified person in connection with the defense thereof; provided, however, that if there exists or shall exist a conflict of interest that would make it inappropriate in the reasonable judgment of the indemnified person for the same counsel to represent both the indemnified person and such indemnifying person or any affiliate or associate thereof, the indemnified person shall be

entitled to retain its own counsel at the expense of such indemnifying person; provided, further, that no indemnifying person shall be responsible for the fees and expense of more than one separate counsel for all indemnified parties. The indemnifying party shall not settle an action without the consent of the indemnified party, which consent shall not be unreasonably withheld.

(d) If after proper notice of a claim or the commencement of any action against the indemnified party, the indemnifying party does not choose to participate, then the indemnified party shall assume the defense thereof and upon written notice by the indemnified party requesting advance payment of a stated amount for its reasonable defense costs and expenses, the indemnifying party shall advance payment for such reasonable defense costs and expenses (the “**Advance Indemnification Payment**”) to the indemnified party. In the event that the indemnified party’s actual defense costs and expenses exceed the amount of the Advance Indemnification Payment, then upon written request by the indemnified party, the indemnifying party shall reimburse the indemnified party for such difference; in the event that the Advance Indemnification Payment exceeds the indemnified party’s actual costs and expenses, the indemnified party shall promptly remit payment of such difference to the indemnifying party.

(e) If the indemnification provided for in this **Section 4.4** is held by a court of competent jurisdiction to be unavailable to an indemnified party with respect to any losses, claims, damages or liabilities referred to herein, the indemnifying party, in lieu of indemnifying such indemnified party thereunder, shall to the extent permitted by applicable law contribute to the amount paid or payable by such indemnified party as a result of such loss, claim, damage or liability in such proportion as is appropriate to reflect the relative fault of the indemnifying party on the one hand and of the indemnified party on the other, as well as any other relevant equitable considerations; provided, that in no event shall any contribution by an indemnifying party hereunder be greater in amount than the dollar amount of the proceeds received by such indemnifying party upon the sale of such Registrable Shares.

4.5 Prospectus Suspension. Each Purchaser acknowledges that there may be times when the Company must suspend the use of the prospectus forming a part of the Resale Registration Statement until such time as an amendment to the Resale Registration Statement has been filed by the Company and declared effective by the Commission, or until such time as the Company has filed an appropriate report with the Commission pursuant to the Exchange Act. Each Purchaser hereby covenants that it will not sell any Registrable Shares pursuant to said prospectus during the period commencing at the time at which the Company gives the Purchasers notice of the suspension of the use of said prospectus and ending at the time the Company gives the Purchasers notice that the Purchasers may thereafter effect sales pursuant to said prospectus; provided, that such suspension periods shall in no event exceed 30 days in any 12 month period and that, in the good faith judgment of the Company’s board of directors, the Company would, in the absence of such delay or suspension hereunder, be required under state or federal securities laws to disclose any corporate development, a potentially significant transaction or event involving the Company, or any negotiations, discussions, or proposals directly relating thereto, in either case the disclosure of which would reasonably be expected to have a material adverse effect upon the Company or its stockholders.

4.6 Termination of Obligations. The obligations of the Company pursuant to **Section 4.2** hereof shall cease and terminate, with respect to any Registrable Shares, upon the earlier to occur of (a) such time such Registrable Shares have been resold, or (b) such time as such Registrable Shares no longer remain Registrable Shares pursuant to **Section 4.1(b)** hereof.

4.7 Reporting Requirements.

(a) With a view to making available the benefits of certain rules and regulations of the Commission that may at any time permit the sale of the Shares to the public without registration or pursuant to a registration statement on Form S-3, the Company agrees to:

(i) make and keep public information available, as those terms are understood and defined in Rule 144;

(ii) file with the Commission in a timely manner all reports and other documents required of the Company under the Securities Act and the Exchange Act; and

(iii) so long as a Purchaser owns Registrable Shares, to furnish to such Purchaser upon request (A) a written statement by the Company as to whether it is in compliance with the reporting requirements of Rule 144, the Securities Act and the Exchange Act, or whether it is qualified as a registrant whose securities may be resold pursuant to Commission Form S-3, (B) a copy of the most recent annual or quarterly report of the Company and such other reports and documents so filed by the Company and (C) such other information as may be reasonably requested to permit the Purchaser to sell such securities pursuant to Rule 144.

4.8 Blue Sky. The Company shall obtain and maintain all necessary blue sky law permits and qualifications, or secured exemptions therefrom, required by any state for the offer and sale of Registrable Shares.

5. OTHER AGREEMENTS OF THE PARTIES

5.1 Integration. Except as contemplated by the terms of this Agreement, the Company shall not sell, offer for sale or solicit offers to buy or otherwise negotiate in respect of any security (as defined in Section 2 of the Securities Act) that would be integrated with the offer or sale of the Shares such that the rules of Nasdaq would require shareholder approval of this transaction prior to the closing of such other transaction unless shareholder approval is obtained before the closing of such subsequent transaction.

5.2 Securities Laws Disclosure; Publicity. Except as set forth below, no public release or announcement concerning the transactions contemplated hereby shall be issued by the Company or the Purchasers without the prior written consent of the Company (in the case of a release or announcement by the Purchasers) or the Purchasers (in the case of a release or announcement by the Company) (which consents shall not be unreasonably withheld), except as such release or announcement may be required by law or the applicable rules or regulations of any securities exchange or securities market, in which case the Company or the Purchasers, as the case may be, shall allow the Purchasers or the Company, as applicable, to the extent reasonably practicable in the circumstances, reasonable time to comment on such release or announcement in advance of

such issuance. The Company shall: (a) by 9:00 a.m. (New York City time) on the business day following the execution and delivery of this Agreement, issue a press release disclosing the material terms of the transactions contemplated hereby promptly following the execution and delivery hereof which shall have been previously reviewed by counsel for the Placement Agent (the "**Press Release**"), and (b) by 5:30 p.m. (New York City time) on the fourth Trading Day following the date hereof, file a Current Report on Form 8-K disclosing the material terms of the transactions contemplated hereby which shall have been previously reviewed by counsel for the Placement Agent (the "**Form 8-K**"). Subject to the foregoing, neither the Company nor any Purchaser shall issue any press releases or any other public statements with respect to the transactions contemplated hereby except as may be reviewed and approved by the Company and counsel to the Placement Agent; provided, however, that the Company shall be entitled, without the prior approval of any Purchaser, to make any press release or other public disclosure as is required by applicable law and regulations; provided, further, that no such press release or other public statement shall identify any Purchaser without such Purchaser's prior consent, which consent shall not be unreasonably withheld or conditioned.

5.3 Reserved.

5.4 Exculpation. Each Purchaser (for itself and for each account for which it is acquiring the Securities) has carefully reviewed any disclosure documents used in the transactions contemplated hereby and has been furnished with all other materials that it considers relevant to an investment in the Securities, has had a full opportunity to ask questions of and receive answers from the Company or any person or persons acting on behalf of the Company concerning the terms and conditions of the transactions contemplated hereby, and no statement or printed material which is contrary to the disclosure documents has been made or given to the purchaser by or on behalf of the Company. Each Purchaser is not relying upon, and has not relied upon, any statement, representation or warranty made by any person, including, without limitation, Cowen and Company LLC, except for the statements, representations and warranties contain in the Agreement. Cowen and Company LLC shall be a third-party beneficiary of, and shall be entitled to rely on, the representations and warranties described in this Section 5.4.

6. MISCELLANEOUS

6.1 Termination. This Agreement may be terminated by any Purchaser, as to such Purchaser's obligations hereunder only and without any effect whatsoever on the obligations between the Company and the other Purchasers, by written notice to the other parties, if the Closing has not been consummated within ten calendar days from the Effective Date through no fault of such Purchaser; provided, however, that no such termination will affect the right of any party to sue for any breach by the other party (or parties), and, upon such termination pursuant to this Section 6.1, any purchase price wired to the Company by a Purchaser shall be promptly returned to the Purchaser, but in no event later than the second Trading Day following such termination.

6.2 Fees and Expenses. Except as expressly set forth in the Transaction Documents to the contrary, each party shall pay the fees and expenses of its advisers, counsel, accountants and other experts, if any, and all other expenses incurred by such party incident to the negotiation, preparation, execution, delivery and performance of this Agreement. Notwithstanding the foregoing, (1) the Company shall reimburse Frazier Life Sciences Public Fund, L.P. \$25,000 for

documented and reasonable consulting, legal and other out of pocket expenses related to the investment and due diligence and (2) the Company shall pay all transfer agent fees, stamp taxes and other taxes and duties levied in connection with the delivery of any Securities to the Purchasers.

6.3 Entire Agreement. The Transaction Documents, together with the exhibits and schedules thereto, contain the entire understanding of the parties with respect to the subject matter hereof and supersede all prior agreements and understandings, oral or written, with respect to such subject matter, which the parties acknowledge have been merged into such documents, exhibits and schedules.

6.4 Notices. Any and all notices or other communications or deliveries required or permitted to be provided hereunder shall be in writing and shall be deemed given and effective upon actual receipt via mail, courier or confirmed email by the party to whom such notice is required to be given. The address for such notices and communications shall be as set forth on the signature pages attached hereto.

6.5 Amendments; Waivers. No provision of this Agreement may be waived or amended except in a written instrument signed, in the case of an amendment, by (a) the Company and (b) Purchasers holding at least a majority of the Securities sold in the Closing (as a single class on an as-converted to Common Stock basis) and then-held by a Purchaser or, in the case of a waiver, by the party against whom enforcement of any such waived provision is sought. No waiver of any default with respect to any provision, condition or requirement of this Agreement shall be deemed to be a continuing waiver in the future or a waiver of any subsequent default or a waiver of any other provision, condition or requirement hereof, nor shall any delay or omission of any party to exercise any right hereunder in any manner impair the exercise of any such right.

6.6 Headings. The headings herein are for convenience only, do not constitute a part of this Agreement and shall not be deemed to limit or affect any of the provisions hereof.

6.7 Successors and Assigns. This Agreement shall be binding upon and inure to the benefit of the parties and their permitted successors and assigns. The Company may not assign this Agreement or any rights or obligations hereunder without the prior written consent of each Purchaser (other than by merger). The Purchasers may not assign this Agreement or any rights or obligations hereunder without the prior written consent of the Company (other than by merger).

6.8 Third-Party Beneficiaries. The Placement Agent shall be the third party beneficiary of the representations and warranties of the Company in Section 3.1 and the representations, warranties and covenants of the Purchasers in Section 3.2 of this Agreement. This Agreement is intended for the benefit of the parties hereto and the Placement Agent and their respective permitted successors and assigns and is not for the benefit of, nor may any provision hereof be enforced by, any other person, except as otherwise set forth in this **Section 6.8**.

6.9 Governing Law. All questions concerning the construction, validity, enforcement and interpretation of the Transaction Documents shall be governed by and construed and enforced in accordance with the internal laws of the State of New York, without regard to the principles of conflicts of law thereof. Each party agrees that all legal proceedings concerning the interpretations,

enforcement and defense of the transactions contemplated by this Agreement and any other Transaction Documents (whether brought against a party hereto or its respective affiliates, directors, officers, shareholders, employees or agents) shall be commenced exclusively in the state and federal courts sitting in the State of New York. Each party hereby irrevocably submits to the exclusive jurisdiction of the state and federal courts sitting in the State of New York for the adjudication of any dispute hereunder or in connection herewith or with any transaction contemplated hereby or discussed herein (including with respect to the enforcement of any of the Transaction Documents), and hereby irrevocably waives, and agrees not to assert in any suit, action or proceeding, any claim that it is not personally subject to the jurisdiction of any such court, that such suit, action or proceeding is improper or is an inconvenient venue for such proceeding. Each party hereby irrevocably waives personal service of process and consents to process being served in any such suit, action or proceeding by mailing a copy thereof via registered or certified mail or overnight delivery (with evidence of delivery) to such party at the address in effect for notices to it under this Agreement and agrees that such service shall constitute good and sufficient service of process and notice thereof. Nothing contained herein shall be deemed to limit in any way any right to serve process in any other manner permitted by law. If either party shall commence an action or proceeding to enforce any provisions of the Transaction Documents, then the prevailing party in such action or proceeding shall be reimbursed by the other party for its reasonable attorneys' fees and other costs and expenses incurred with the investigation, preparation and prosecution of such action or proceeding.

6.10 Execution. This Agreement may be executed in two or more counterparts, all of which when taken together shall be considered one and the same agreement and shall become effective when counterparts have been signed by each party and delivered to each other party, it being understood that the parties need not sign the same counterpart. Counterparts may be delivered via facsimile, electronic mail (including any electronic signature covered by the U.S. federal E-SIGN Act of 2000, Uniform Electronic Transactions Act, the Electronic Signatures and Records Act or other applicable law, e.g., www.docusign.com) or other transmission method and any counterpart so delivered shall be deemed to have been duly and validly delivered and be valid and effective for all purposes.

6.11 Severability. If any term, provision, covenant or restriction of this Agreement is held by a court of competent jurisdiction to be invalid, illegal, void or unenforceable, the remainder of the terms, provisions, covenants and restrictions set forth herein shall remain in full force and effect and shall in no way be affected, impaired or invalidated, and the parties hereto shall use their commercially reasonable efforts to find and employ an alternative means to achieve the same or substantially the same result as that contemplated by such term, provision, covenant or restriction. It is hereby stipulated and declared to be the intention of the parties that they would have executed the remaining terms, provisions, covenants and restrictions without including any of such that may be hereafter declared invalid, illegal, void or unenforceable.

6.12 Rescission and Withdrawal Right. Notwithstanding anything to the contrary contained in (and without limiting any similar provisions of) any of the other Transaction Documents, whenever any Purchaser exercises a right, election, demand or option under a Transaction Document and the Company does not timely perform its related obligations within the periods therein provided, then such Purchaser may rescind or withdraw, in its sole discretion from time to time upon written notice to the Company, any relevant notice, demand or election in whole or in part without prejudice to its future actions and rights.

6.13 Replacement of Securities. If any certificate or instrument evidencing any Securities is mutilated, lost, stolen or destroyed, the Company shall issue or cause to be issued in exchange and substitution for and upon cancellation thereof (in the case of mutilation), or in lieu of and substitution therefor, a new certificate or instrument, but only upon receipt of evidence reasonably satisfactory to the Company of such loss, theft or destruction and customary and reasonable indemnity or bond, if requested. The applicant for a new certificate or instrument under such circumstances shall also pay any reasonable third-party costs (including customary indemnity) associated with the issuance of such replacement Shares.

6.14 Remedies. The Company shall be entitled to exercise all rights provided herein or granted by law, including recovery of damages, for any breach of the Transaction Documents.

6.15 Independent Nature of Purchasers' Obligations and Rights. The obligations of each Purchaser under any Transaction Document are several and not joint with the obligations of any other Purchaser, and no Purchaser shall be responsible in any way for the performance or non-performance of the obligations of any other Purchaser under any Transaction Document. Nothing contained herein or in any other Transaction Document, and no action taken by any Purchaser pursuant thereto, shall be deemed to constitute the Purchasers as a partnership, an association, a joint venture or any other kind of entity, or create a presumption that the Purchasers are in any way acting in concert or as a group with respect to such obligations or the transactions contemplated by the Transaction Documents. Each Purchaser shall be entitled to independently protect and enforce its rights, including without limitation, the rights arising out of this Agreement or out of the other Transaction Documents, and it shall not be necessary for any other Purchaser to be joined as an additional party in any proceeding for such purpose.

6.16 Construction. The parties agree that each of them and/or their respective counsel has reviewed and had an opportunity to revise the Transaction Documents and, therefore, the normal rule of construction to the effect that any ambiguities are to be resolved against the drafting party shall not be employed in the interpretation of the Transaction Documents or any amendments hereto.

6.17 WAIVER OF JURY TRIAL. IN ANY ACTION, SUIT, OR PROCEEDING IN ANY JURISDICTION BROUGHT BY ANY PARTY AGAINST ANY OTHER PARTY, THE PARTIES EACH KNOWINGLY AND INTENTIONALLY, TO THE GREATEST EXTENT PERMITTED BY APPLICABLE LAW, HEREBY ABSOLUTELY, UNCONDITIONALLY, IRREVOCABLY AND EXPRESSLY WAIVES FOREVER TRIAL BY JURY.

[Remainder of page intentionally left blank.]

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

GRITSTONE BIO, INC.

By: /s/ Andrew Allen
Name: Andrew Allen
Title: President and Chief Executive Officer

Address for Notice:
5959 Horton Street, Suite 300
Emeryville, CA 94608

Attention: Chief Executive Officer; General
Counsel

With a copy to (which shall not constitute notice):

Latham & Watkins LLP
140 Scott Drive
Menlo Park, CA 94025
Attention: Brian J. Cuneo

**Signature Page to
Securities Purchase Agreement of
Gritstone bio, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

Frazier Life Sciences Public Fund, L.P.

By: FHMLSP, L.P.
Its general partner
By: FHMLSP, L.L.C.
Its general partner

By: /s/ Jamie Brush
Name: Jamie Brush
Title: General Partner

Address for Notice:

Frazier Life Sciences Public Fund, L.P.
Attn: Jamie Brush
70 Willow Rd, Suite 200
Menlo Park, CA 94025

With a copy to:
Frazier Life Sciences Public Fund, L.P.
Attn: Chief Financial Officer
Two Union Square
601 Union St., Suite 3200
Seattle, WA 98101

Shares Beneficially
Owned Prior to

Initial Closing: None, but 1,030,878 shares held by
affiliated fund Frazier Healthcare VII, L.P.

**Signature Page to
Securities Purchase Agreement of
Gritstone Oncology, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

PURCHASERS:

GILEAD SCIENCES, INC.

By: /s/ Andrew Dickinson

Name: Andrew Dickinson

Title: Chief Financial Officer

Address:

333 Lakeside Drive

Foster City, California 94404

Shares Beneficially

Owned Prior to

Initial Closing: 1,169,591

**Signature Page to
Securities Purchase Agreement of
Gritstone Oncology, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

PURCHASERS:

REDMILE CAPITAL FUND, LP

By: Redmile Group, LLC,
its investment manager

By: /s/ Joshua Garcia

Name: Joshua Garcia

Title: Authorized Signatory

Address: One Letterman Drive
Suite D3-300
San Francisco, CA 94129

Shares Beneficially

Owned Prior to

Initial Closing: _____

**Signature Page to
Securities Purchase Agreement of
Gritstone Oncology, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

PURCHASERS:

**REDMILE CAPITAL OFFSHORE MASTER
FUND, LTD.**

By: Redmile Group, LLC,
its investment manager

By: /s/ Joshua Garcia _____

Name: Joshua Garcia

Title: Authorized Signatory

Address: One Letterman Drive
Suite D3-300
San Francisco, CA 94129

Shares Beneficially

Owned Prior to

Initial Closing: _____

**Signature Page to
Securities Purchase Agreement of
Gritstone bio, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

PURCHASERS:

REDMILE CAPITAL OFFSHORE II MASTER FUND, LTD.

By: Redmile Group, LLC,
its investment manager

By: /s/ Joshua Garcia

Name: Joshua Garcia

Title: Authorized Signatory

Address: One Letterman Drive
Suite D3-300
San Francisco, CA 94129

Shares Beneficially

Owned Prior to

Initial Closing: _____

**Signature Page to
Securities Purchase Agreement of
Gritstone bio, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

PURCHASERS:

REDMILE CAPITAL OFFSHORE FUND (ERISA), LTD.

By: Redmile Group, LLC,
its investment manager

By: /s/ Joshua Garcia

Name: Joshua Garcia

Title: Authorized Signatory

Address: One Letterman Drive
Suite D3-300
San Francisco, CA 94129

Shares Beneficially

Owned Prior to

Initial Closing: _____

**Signature Page to
Securities Purchase Agreement of
Gritstone bio, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

PURCHASERS:

REDMILE STRATEGIC MASTER FUND, LP

By: Redmile Group, LLC, its investment manager

By: /s/ Joshua Garcia

Name: Joshua Garcia

Title: Authorized Signatory

Address: One Letterman Drive
Suite D3-300
San Francisco, CA 94129

Shares Beneficially

Owned Prior to

Initial Closing: _____

**Signature Page to
Securities Purchase Agreement of
Gritstone bio, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

PURCHASERS:

**REDMILE CAPITAL OFFSHORE II MASTER FUND, LTD. -
STRAT**

By: Redmile Group, LLC, its investment manager

By: /s/ Joshua Garcia

Name: Joshua Garcia

Title: Authorized Signatory

Address: One Letterman Drive

Suite D3-300

San Francisco, CA 94129

Shares Beneficially

Owned Prior to

Initial Closing: _____

**Signature Page to
Securities Purchase Agreement of
Gritstone bio, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

PURCHASERS:

REDMILE BIOPHARMA INVESTMENTS I, L.P.

By: Redmile Biopharma Investments I (GP),
LLC, its general partner

By: Redmile Group, LLC, its managing member

By: /s/ Joshua Garcia

Name: Joshua Garcia

Title: Authorized Signatory

Address: One Letterman Drive
Suite D3-300
San Francisco, CA 94129

Shares Beneficially

Owned Prior to

Initial Closing: _____

**Signature Page to
Securities Purchase Agreement of
Gritstone bio, Inc.**

IN WITNESS WHEREOF, the parties hereto have caused this Securities Purchase Agreement to be duly executed by their respective authorized signatories as of the date first indicated above.

PURCHASERS:

**MAP 20 SEGREGATED PORTFOLIO, A SEGREGATED
PORTFOLIO OF LMA SPC**

By: Redmile Group, LLC, its investment manager

By: /s/ Joshua Garcia

Name: Joshua Garcia

Title: Authorized Signatory

Address: One Letterman Drive
Suite D3-300
San Francisco, CA 94129

Shares Beneficially

Owned Prior to

Initial Closing: _____

**Signature Page to
Securities Purchase Agreement of
Gritstone bio, Inc.**

Exhibit A

Closing Schedule

<u>Investor Name</u>	<u>Number of Shares to be Purchased</u>	<u>Aggregate Purchase Price of Shares</u>
Frazier Life Sciences Public Fund, L.P.	3,636,364	\$40,000,004.00
Gilead Sciences, Inc.	454,545	\$ 4,999,995.00
Redmile Biopharma Investments I, L.P.	90,910	\$ 1,000,010.00
Redmile Capital Offshore Fund (ERISA), Ltd.	18,806	\$ 206,866.00
Map 20 Segregated Portfolio, a segregated portfolio of LMA SPC	1,289	\$ 14,179.00
Redmile Capital Offshore Master Fund, Ltd.	65,213	\$ 717,343.00
Redmile Capital Offshore II Master Fund, Ltd.	47,188	\$ 519,068.00
Redmile Capital Fund, LP	123,565	\$ 1,359,215.00
Redmile Strategic Master Fund, LP	557,586	\$ 6,133,446.00
Redmile Capital Offshore II Master Fund, Ltd. (Strategic Sleeve)	4,534	\$ 49,874.00
Total	5,000,000	\$55,000,000.00