Goodwin Procter LLP
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VIA EDGAR

March 25, 2024

United States Securities and Exchange Commission
Division of Corporation Finance
Office of Life Sciences
100 F Street, N.E.
Washington, D.C. 20549-3628
Attention: Jenn Do, Mary Mast, Lauren Hamill and Chris Edwards

Re: AVROBIO, Inc.
Registration Statement on Form S-4
Filed February 14, 2024
File No. 333-277048

Ladies and Gentlemen,

On behalf of AVROBIO, Inc. (the "Company"), we are submitting this letter to the Securities and Exchange Commission (the "SEC") via EDGAR in response to the comment letter from the staff of the SEC (the "Staff"), dated March 12, 2024 (the "Comment Letter"), pertaining to the Company's above-referenced Registration Statement on Form S-4 (the "Registration Statement"). In connection with such responses, the Company is concurrently filing Amendment No. 1 to the Registration Statement (the "Amended Registration Statement").

For your convenience, the Staff's comments have been reproduced in bold and italics herein with responses immediately following each comment. Unless otherwise indicated, page references in the reproductions of the Staff's comments refer to the Registration Statement, and page references in the responses below refer to the Amended Registration Statement. Capitalized terms used in this letter but otherwise not defined herein shall have the meanings set forth in the Amended Registration Statement.

Registration Statement on Form S-4 Filed February 14, 2024

Cover Page

1. ***It appears that the shares to be sold in the Tectonic pre-closing private financings are included in the shares to be registered in this registration statement. The investors in the Tectonic pre-closing financing made their investment decision in a private offering and, therefore, the sale must close privately. Please remove the Tectonic pre-closing financing shares from the registration statement.***

   Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the filing fee table filed as Exhibit 107 to the Amended Registration Statement.

What are the private financings?, page 2

2. ***Please revise this Q&A, the summary risks and risk factors, and elsewhere as appropriate to highlight that the closing of the merger is not conditioned upon the closing of the Tectonic private financings in the anticipated aggregate amount of $130.7 million. We note your disclosure to this effect on page 27. Discuss risks and uncertainties if stockholders are asked to make voting decisions without knowing whether the private financings will close in timely manner, or at all. Discuss the combined company's liquidity position and related risks in the event that the merger closes without the private financings in place.***

   Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on the cover page and pages 3, 29, 36-37, 228, 234, 259, 327, 391 and 406 of the Amended Registration Statement.

Why are the two companies proposing to merge?, page 2

3. ***Please revise your disclosure to clarify the combined company's plans with respect to AVROBIO's legacy business. In this regard, we note your disclosure on page 13 and elsewhere throughout that on July 12, 2023, AVROBIO halted development of its clinical and research programs to explore strategic alternatives which may include, but are not limited to, a divestiture of its legacy business.***

   Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that, while it is true that it is anticipated that the combined company will not continue to develop the Company's legacy product candidates, as reflected in the Amended Registration Statement, Tectonic believes it may have potential uses for certain of the Company's intellectual property, which it may explore in the future. For example, the Company's platform uses a proprietary lentiviral-based gene therapy approach for autologous transduction of human hematopoietic stem cells. Tectonic believes it could potentially use this lentiviral-based technology combined with antibodies/nanobodies discovered using Tectonic's GEODE platform to develop CAR-T cell therapies targeting cells overexpressing GPCRs. In addition, Tectonic may choose in the future to further explore the modulation of immune responses in autoimmune diseases using the Company's proprietary technology. During the 18-month period following the closing, pursuant to the terms of the CVR Agreement, the combined company will use commercially reasonable efforts (as defined in the CVR Agreement) to effect dispositions of the Company's pre-closing assets to a third party that has delivered inbound interest (as defined in the CVR Agreement) with respect to such assets.

What are contingent value rights (CVRs)?, page 5

4. ***We note that you disclose here and elsewhere that AVROBIO stockholders of record "as of immediately prior to the effective time" will receive one non-transferable CVR for each outstanding share of AVROBIO common stock held by such stockholder on such date. However, disclosure following the first bullet on page 190 states that a record date will be agreed to by AVROBIO and Tectonic prior to the effective time, and disclosure on page 237 states that the record date for the CVR distribution will be the "close of business on the business day immediately prior to the day on which the effective time occurs." Please revise throughout to reconcile your disclosures and clarify the record date for the issuance of CVRs to AVROBIO stockholders.***

   Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 20, 195 and 244 of the Amended Registration Statement.

Will the common stock of the combined company trade on an exchange?, page 7

5. ***You disclose that AVROBIO intends to file an initial listing application for the combined company's common stock with Nasdaq and that it is expected that such common stock will trade on the exchange. We also note Section 6.10 of the Merger Agreement provides that the approval of the listing of the additional shares of AVROBIO's common stock on Nasdaq shall have been conditionally approved prior to the Effective Time.***

   - ***Please revise the Letter to Stockholders, Q&A, and elsewhere throughout as appropriate to clarify that the closing of the merger is conditioned upon Nasdaq's approval of the listing application.***
   - ***Disclose whether this condition is waivable and if so, by which party or parties.***
   - ***Indicate whether or not Nasdaq's determination will be known at the time that stockholders are asked to vote to approve the merger.***
   - ***Please also include a cross-reference to risk factor disclosure stating that the potential reverse stock split may not result in an increase in the combined company's stock price necessary to satisfy Nasdaq's initial or continued listing requirements for the combined company.***

   Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on the cover page and pages 7, 33 and 228 of the Amended Registration Statement. The Company further advises the Staff that Nasdaq has not yet made a determination with respect to the approval of the listing of the additional shares of AVROBIO common stock on Nasdaq, and such approval may not be known at the time that AVROBIO stockholders are asked to vote to approve the merger. Additionally, the Company advises the Staff that this condition to the closing of the merger is waivable but only to the extent permitted by law and only with the written waiver of each of the Company, Tectonic and Merger Sub.

What are the material U.S. federal income tax consequences of the merger to U.S. Holders of Tectonic common stock?, page 11

6. ***We note your representation here and beginning on page 219 that the parties "intend" the merger to qualify as a reorganization within the meaning of Section 368(a) of the U.S. Internal Revenue Code of 1986, as amended (the "Code"). Please revise your disclosure here and throughout, including the sections addressing the tax consequences of the CVRs, to provide counsel's firm opinion for each material tax consequence, including whether the merger will qualify as a reorganization, or to explain why such opinion cannot be given. If the opinion is subject to uncertainty, please: (1) provide an opinion that reflects the degree of uncertainty (e.g., "should" or "more likely than not") and explains the facts or circumstances giving rise to the uncertainty; and (2) provide disclosure of the possible alternative tax consequences including risk factor and/or other appropriate disclosure setting forth the risks of uncertain tax treatment to investors. Also, please file the tax opinion as an exhibit to the registration statement. Please refer to Item 601(b)(8) of Regulation S-K and Section III.A. of Staff Legal Bulletin 19, Legality and Tax Opinions in Registered Offerings.***

   Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that, because the AVROBIO stockholders are not exchanging their shares in the merger, the U.S. federal income tax consequences of the merger are not material to the Company or its shareholders. Regardless of whether the merger qualifies as a reorganization within the meaning of Section 368(a) of the Code, it will not be a taxable transaction to the AVROBIO stockholders.

   Whether or not the merger qualifies as a "reorganization" within the meaning of Section 368(a) of the Code will not impact the AVROBIO stockholders' decision to approve or not approve the merger or to purchase or sell the Company's shares (or, following the consummation of the merger, shares of the combined company). Existing AVROBIO stockholders will not exchange their shares for shares in any other entity, but will simply retain their existing shares in the Company.

   The only parties affected by the qualification of the merger as a "reorganization" under Section 368(a) of the Code are Tectonic stockholders. However, the Amended Registration Statement is not soliciting the consent of the Tectonic stockholders to the transactions, and such stockholders are not voting at the Company's special meeting. Rather, promptly after the Amended Registration Statement is declared effective under the Securities Act, Tectonic will disseminate to Tectonic stockholders an information statement that includes a material description of the merger, the Merger Agreement and related ancillary documents and appraisal rights available under Delaware law, for purposes of soliciting such Tectonic stockholders' consent to adopt the Merger Agreement and approve the merger. The information statement also will contain information with respect to the qualification of the merger as a "reorganization" within the meaning of Section 368(a) of the Code. In connection with their consideration of the transaction, and based on their review of the information statement, the Merger Agreement and the ancillary agreements, the Tectonic stockholders can seek advice from their own tax advisors and will be responsible for paying their own taxes, if any, that result from the merger. The Company and its stockholders are not required to indemnify Tectonic stockholders for such taxes, if any.

   Due to substantial uncertainty as to the tax treatment of the receipt of the CVRs and the lack of authority addressing such tax treatment, Goodwin Procter LLP and Cooley LLP, the tax counsels for the Company and Tectonic, respectively, cannot express an opinion on the tax consequences of the receipt of the CVRs. The tax disclosure in the Amended Registration Statement has been revised on pages 12 and 264 to highlight this uncertainty and the fact that opinions cannot be provided.

Prospectus Summary
The Companies
AVROBIO, page 13

7. ***With reference to your disclosure on pages 13 and 17, please revise the Summary and the Q&A to highlight, if true, that if the merger is completed, the combined company will focus on developing Tectonic's product candidates, and it is anticipated that the combined company will not continue to develop AVROBIO's legacy product candidates. Also, revise the Q&A on page 5 to provide context for the discussion of the CVRs.***

   Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 2, 6-7 and 14 of the Amended Registration Statement. The Company further advises the Staff that while it is true that it is anticipated that the combined company will not continue to develop the Company's legacy product candidates, as reflected in the Amended Registration Statement, Tectonic believes it may have potential uses for certain of

the Company's intellectual property. The Company's platform uses a proprietary lentiviral-based gene therapy approach for autologous transduction of human hematopoietic stem cells. Tectonic believes it could potentially use this lentiviral-based technology combined with antibodies/nanobodies discovered using Tectonic's GEODE platform to develop CAR-T cell therapies targeting cells overexpressing GPCRs. In addition, Tectonic may choose in the future to further explore the modulation of immune responses in autoimmune diseases using the Company's proprietary technology.

Tectonic, page 14

8. ***Please revise the Summary and Tectonic's Business section to provide context and balance to the discussion of Tectonic's proprietary technology platform, GEODe. To the extent you highlight the capabilities of the platform and Tectonic's belief that it can "overcome the existing challenges of GPCR-targeted drug discovery" when engineering product candidates, please also explain that Tectonic has limited experience in therapeutic discovery and development and that the platform may never result in the regulatory approval of a product candidate.***

   Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 16 and 352 of the Amended Registration Statement. The Company further advises the Staff that the Company has added a risk factor on page 110 of the Amended Registration Statement in response to the Staff's comment.

Interests of AVROBIO's Directors and Executive Officers in the Merger, page 20

9. ***Here and in the parallel sections of the registration statement regarding the interests of Tectonic's directors and executive officers in the merger, please revise to quantify the value of the interests of such parties. For example only, please disclose on an aggregate basis:***

   - ***the value of options to purchase AVROBIO common stock that will be subject to accelerated vesting, and the value of RSUs that will be subject to accelerated vesting and settlement into shares of AVROBIO common stock, including any necessary assumptions; and***
   - ***the amount of additional cash payments or "golden parachute" compensation to be received in connection with the merger due to change in control agreements, employment contract terminations, consulting fees, etc.***

   Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 22-23 and 217 of the Amended Registration Statement.

10. ***Here and elsewhere as appropriate, please revise to explain whether any material payments to AVROBIO's executives, such as "golden parachute" compensation that is based on or otherwise relates to the merger, will be excluded from the calculation of "net cash" at the determination time, and if so, disclose the types and aggregate amounts of such payments and explain the impact to other AVROBIO stockholders. In this regard, we note your disclosure regarding the calculation of AVROBIO's net cash beginning on page 216 and your disclosures throughout that under certain circumstances the ownership percentages in the combined company may be adjusted up or down depending on the amount of AVROBIO's net cash as of closing.***

    Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 22-23 and 217 of the Amended Registration Statement. The Company respectively advises the Staff that the definition of "Aspen Net Cash" in the Merger Agreement sets forth the types of amounts that will be excluded from the calculation of "net cash" at the determination time, and in particular for purposes of this comment, the Company notes clauses (vi) and (xi) of such definition.

Risk Factors
Risks Related to the Proposed Reverse Stock Split, page 38

11. ***We note your disclosure that the principal purpose of the reverse stock split is to increase AVROBIO's common stock price so that the combined company is able to meet initial Nasdaq listing requirements and the shares of AVROBIO common stock being issued in the merger will be approved for listing. In your risk factors and elsewhere as appropriate:***

    - ***Please disclose the minimum size of the reverse split that will be necessary for listing.***

- ***Please indicate the criteria, if any, for the ratio to be used for the reverse stock split. For example, indicate whether you intend to use the minimum ratio or a larger ratio in an attempt for a higher price per share subsequent to the reverse stock split.***
- ***Explain the effects on the proposed transaction and/or the combined company of a failure to comply with the initial listing requirements of Nasdaq. If the Nasdaq listing approval of the combined company is a condition that can be waived, please include a discussion of the potential consequences to investors, including the ability of investors to buy and sell shares of common stock, if the Nasdaq does not approve the listing application of the combined company, but the election is made to waive the closing condition and proceed with the merger.***
- ***You state on page 39 that there can be no assurance that the stock price of the combined company will meet the listing requirements for any meaningful period of time. Please enhance your disclosure to explain the effects on the combined company and its shareholders of a failure to comply with the continued listing requirements of Nasdaq, including the potential delisting of its common stock and its impact. Please similarly revise your summary risk factor on page 30 to explain the effect on combined company if the reverse stock split does not increase the combined company's stock price over both the short- or long-term so as to qualify for Nasdaq listing.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 31, 36-37, 41-42 and 161 of the Amended Registration Statement. The Company advises the Staff that while a final or more narrow exchange ratio cannot yet be determined, in the event a final ratio or a narrower or more specific ratio range is determined prior to the filing of the Company's final proxy statement/prospectus, the Company will provide the relevant updated disclosures.

Risk Factors
Risks Related to AVROBIO, page 43

12. ***You state in the risk factor on page 89 that: "In particular, AVROBIO had in- licensed certain intellectual property rights and know-how from the University Health Network ("UHN") (relevant to AVR-RD-01 and AVROBIO's Fabry program, which AVROBIO deprioritized in January 2022) and affiliates of Lund University (relevant to AVR-RD-02 and AVROBIO's Gaucher type 1 and type 3 programs), which license agreement was terminated as of January 4, 2024." Please revise herein as applicable to more clearly disclose, if true, that the termination of the license agreement was only with UHN, as we note the development of AVROBIO's Gaucher disease program with Lund University appears to remain in effect, as indicated on page 321 and elsewhere.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 93 of the Amended Registration Statement.

AVROBIO's HSC lentiviral-based gene therapy product candidates are based on a novel technology..., page 53

13. ***Please revise to remove or revise conclusory statements regarding AVROBIO product candidates' performance. In this regard, we note your reference to "favorable preliminary results observed to date."***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 56 of the Amended Registration Statement.

Risks Related to Tectonic, page 102

14. ***In the risk factor on page 105, you disclose that Tectonic concluded that its recurring losses from operations and need for additional financing to fund future operations raise substantial doubt about its ability to continue as a going concern in its financial statements for the year ended December 31, 2022 and the nine months ended September 30, 2023 and that "Similarly, Tectonic's independent registered public accounting firm included an explanatory paragraph in its report on Tectonic's financial statements for the year ended December 31, 2022 and the nine months ended September 30, 2023 with respect to this uncertainty." Please revise this sentence to remove the implication that a report was issued by Tectonic's auditor for the nine months ended September 30, 2023.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 109 and 404 of the Amended Registration Statement.

The bylaws of the combined company will provide that..., page 160

15. ***Consistent with your risk factor disclosure on page 101, please revise to state that there is uncertainty as to whether a court would enforce the Federal Forum provision in the combined company's bylaws. In this regard, we note that Section 22 of the Securities Act creates concurrent jurisdiction for federal and state courts over all suits brought to enforce any duty or liability created by the Securities Act or the rules and regulations thereunder.***

    Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 164 of the Amended Registration Statement.

The Merger
Background of the Merger, page 171

16. ***You disclose that at the July 6, 2023 meeting, the AVROBIO Board and management identified certain reverse merger candidate criteria ("Critera"), and that such Critera "continued to be discussed, expanded and/or refined at subsequent meetings of the Board and Transaction Committee." Please revise your background disclosure to explain how and why the Criteria evolved subsequent to the July 6, 2023 meeting, and identify who proposed any expansion, refinement or revision of the Criteria and any material resulting discussion in this regard.***

    Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 177-178 of the Amended Registration Statement.

17. ***With respect to the various starting pools of potential reverse merger transaction candidates:***

    - ***Please revise page 174 to explain how advisor TD Cowen identified and selected the initial 85 companies to which it began distributing process letters on July 18, 2023, including with respect to the Criteria identified by the AVROBIO Board and management at the July 6, 2023 meeting.***
    - ***Revise page 179 to explain how AVROBIO management and its advisors selected the companies with which to engage or re-engage following the termination of discussions with Party O, including with respect to the discussions of initial impressions of quality and actionability across the Critera at the October 23, 2023 meeting.***

    Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 178 and 183 of the Amended Registration Statement.

18. ***Please revise page 178 to explain Party O's relative strengths in relation to the Criteria that led the Transaction Committe to determine to proceed to a term sheet with Party O.***

    Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 182 of the Amended Registration Statement.

19. ***Please revise the November 10, 2023 and November 17, 2023 entries on pages 180 and 181, respectively, to:***

    - ***Summarize the Transaction Committee's discussions of their impressions of the quality and actionability of Tectonic and Party R across the Criteria as reverse merger counterparties.***
    - ***Additionally, please revise pages 180-182 to describe the "uncertainties" and "continued" concerns about Party R's ability to meet one or more of the Criteria as compared to Tectonic that were discussed at various meetings.***
    - ***Further with respect to the November 17, 2023 entry, explain why the Transaction Committee determined to continue to evaluate and negotiate terms with Company R in light of the Committee's decision the same day to decline to advance other companies' proposals to the term sheet phase due to weaknesses with respect to at least one of the Criteria.***

    Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 184-185 of the Amended Registration Statement.

20. ***Please revise to explain the interactions between the representatives and advisors of AVROBIO and Party R from and after the November 17, 2023 meeting of the AVROBIO Transaction Committee until the November 27, 2023 meeting, at which time it appears that said Committee authorized AVROBIO management to communicate to Party R that AVROBIO would be ending its engagement with Party R toward a strategic transaction.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 187 and 189 of the Amended Registration Statement.

21. ***Please revise page 183 to disclose any interaction between representatives of AVROBIO and Party GGG from and after submission of the Party GGG December 7, 2023 Proposal. Describe the Transaction Committee's consideration of this proposal, and when and why Party GGG was eliminated from consideration as a potential reverse merger candidate.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 189 of the Amended Registration Statement.

22. ***With respect to the negotiations between AVROBIO and Tectonic:***

- ***Please revise your disclosure throughout this section to provide greater detail as to how the material terms of the transaction structure and consideration evolved during the negotiations through proposals and counter-proposals. For example, please revise to explain the reason(s) for the inclusion of, and any revisions to, the material terms from the initial non-binding indication of interest AVROBIO received from Tectonic on October 23, 2023 through the Tectonic Term Sheet dated December 13, 2023 to the final Merger Agreement executed January 30, 2024. Explain which party proposed initial terms and requested revised terms, and the reason(s) they did so. In your revisions, please specifically include a materially complete description of the discussions and/or "negotiations on the economics of a potential reverse merger with Tectonic," particularly the structure, types, and amount of the merger consideration, including but not limited to:***
- ***the acceleration of AVROBIO options and RSUs;***
- ***contingent value rights to be issued to pre-merger AVROBIO stockholders;***
- ***the valuations of the parties, including the additional $12.5 million ascribed by Tectonic to AVROBIO in excess of its ending net cash position;***
- ***the Exchange Ratio;***
- ***the concurrent private financings with Tectonic; and***
- ***the minimum closing cash condition. In this regard, we note your disclosure on pages 18 and 189 that Tectonic's obligation to complete the merger is conditioned on AVROBIO having at least $50.0 million closing net cash.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 183, 188-189 and 190 of the Amended Registration Statement.

AVROBIO's Reasons for the Merger, page 187

23. ***You disclose that among the factors the AVROBIO Board viewed as supporting its decision to approve the Merger Agreement as the Board's belief that Tectonic constituted the "most compelling" reverse merger counterparty as it pertains to each of the Criteria enumerated by the Avrobio board. Please revise in the appropriate place to explain the basis for this belief.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 187 of the Amended Registration Statement.

Opinion of Houlihan Lokey to the AVROBIO Board
Material Financial Analyses, page 202

24. ***Please revise this section as follows:***

- ***Describe in more detail the underlying methodology and selection criteria the advisor used to select the public companies, M&A transactions, IPO transactions, and private financing transactions it deemed relevant. If any companies or transactions otherwise meeting the criteria were excluded, please briefly explain why.***
- ***Disclose the conclusions of the advisor's various analyses relative to Tectonic, including how the results of each analysis formed the basis for selecting an implied enterprise value reference range for Tectonic.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 209-214 of the Amended Registration Statement.

Tectonic—Selected Companies Analysis, page 203

25. ***Please revise the table on page 203 to include the number of products in the development pipeline for the selected companies. In this regard, we note your disclosure that the advisor reviewed this data in its analysis.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 209 of the Amended Registration Statement.

Nasdaq Stock Market Listing, page 222

26. ***Please revise this section to disclose the "certain period of time" following the proposed reverse stock split wherein the combined company must maintain a minimum bid price of $4.00 in order for the Nasdaq listing application to be accepted.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 161, 229 and 303 of the Amended Registration Statement.

Conditions to the Completion of the Merger, page 243

27. ***Please revise this section to clarify which conditions are waivable and by which party or parties. As appropriate, please revise your risk factors to address material risks associated with waivable conditions.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 36 and 250-251 of the Amended Registration Statement.

Tectonic's Business, page 342

28. ***Revise this section to discuss the development history of Tectonic's GEODe platform. For instance, discuss whether it was developed internally and whether current Tectonic employees were responsible for such development. Clarify whether the platform is fully developed. Additionally, explain how Tectonic has utilized and plans to utilize this platform to execute its product development strategy. In light of Tectonic's early development stage, provide the basis for the following statements, or revise as appropriate to indicate if such statements are currently aspirational:***

- ***Tectonic "uses its proprietary GEODe technology platform to overcome the existing challenges of GPCR-targeted drug discovery..." (pages 14, 342 and 391).***
- ***Tectonic "believes that its GEODe platform holds the potential to consistently generate compelling pipeline assets..." (page 343).***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 15, 351 and 367 of the Amended Registration Statement.

29. ***We note that the descriptions of Tectonic's identified and potential product candidates and the related preclinical and clinical trials include conclusory statements that such candidates are, or are likely to be, effective. You may present a balanced summary of the objective pre-clinical and clinical data, including whether clinical trials trial met primary and secondary endpoints without including your conclusions related to efficacy. However, please remove or revise all statements throughout that present speculation or conclusions regarding the efficacy of Tectonic's product candidates, as these determinations are solely within the authority of the FDA and comparable regulatory bodies. By way of example only:***

- ***You state on page 350 that TX45 "demonstrated efficacy" in a rat model of pulmonary hypertension, and the statement beginning on page 354 that Tectonic's GPCR3 antagonist "provides efficacy in a mouse model of HHT."***
- ***Numerous other statements imply the efficacy of Tectonic candidates, such as those drawing comparison between your product candidates or their mechanisms of action with other unapproved medicinal agents that have been tested for the same indications. You state on page 347 that PDE5 inhibitors have "shown some benefit" and "shown some efficacy" in HFrEF patients with CpcPH, and you conclude that "the efficacy shown with PDE5 inhibitors in CpcPH suggests the potential of success for engineered Fc-relaxin-fusions such as TX45 in CpCPH, because relaxin activates the same nitric oxide signaling pathway by which PDE5 inhibitors exert their action."***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 352-353, 356, 361, 363 and 366-367 of the Amended Registration Statement.

30. ***We note references to companion diagnostic tests on pages 131, 136 and 374. To the extent material, please revise your description of Tectonic's business to explain whether Tectonic is currently developing, or plans to develop, any companion diagnostic test(s) for use with its therapeutic product candidates. If so, please address the following or otherwise advise:***

- ***Explain in the Summary and Business sections how Tectonic plans to develop and use companion diagnostics in its development strategy. Further explain how, if at all, such use may relate to the patient enrichment strategy you reference with respect to Tectonic's planned Phase 1b trial of TX45 on page 353. Include balancing disclosure regarding any material risks or challenges that the development and/or use of companion diagnostics might pose to Tectonic's business and/or development strategy.***
- ***Disclose whether Tectonic currently anticipates that any or all of its programs will require it to develop and obtain FDA or other regulatory approval of a companion diagnostic.***
- ***As appropriate, include summary risk and corresponding risk factor disclosure addressing the risks and challenges related to any proposed use of companion diagnostic tools.***
- ***As appropriate, revise your discussion of government regulation to include a description of the regulation of companion diagnostics.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 135, 140 and 387 of the Amended Registration Statement. The Company further advises the Staff that Tectonic does not currently develop, or have any current plans to develop, companion diagnostic tests.

31. ***While it appears that part of Tectonic's business strategy is to perform preclinical and/or clinical trials in various countries to generate data to be used to seek FDA approval in the United States, please revise your disclosure to clarify your development strategy in this regard.***

- ***Depending on clinical trial results, explain whether Tectonic intends to seek approval of any product candidates in the United States before, or concurrently with, seeking approval in other jurisdictions.***
- ***With respect to TX45 and any other product candidate in development, please disclose the location of completed, ongoing, and planned preclinical and clinical trials.***
- ***To the extent known or planned, disclose at what point in the development process Tectonic intends to seek the FDA's input or involvement in the product development and regulatory approval processes for TX45.***

- ***Highlight that before Tectonic can commence clinical trials for any product candidate in the United States, it must be able to support a future Investigational New Drug ("IND") applications in the United States. Disclose, as you do on page 113, that Tectonic has not interacted with or submitted any IND to the FDA and all of its clinical trials have, to date, been conducted in Australia. Further, disclose as you do on page 364, that when a foreign clinical trial is not conducted under an IND, the sponsor must ensure that the trial complies with certain regulatory requirements of the FDA in order to use the trial as support for an IND or application for marketing approval. Also highlight that the clinical data Tectonic generates abroad may not be accepted by the FDA or comparable foreign regulatory authorities and if so, may result in the need to conduct additional trials.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 363 and 365 of the Amended Registration Statement.

32. ***In light of your disclosure that Tectonic is very early in its development efforts, and that Tectonic currently has only identified lead asset TX45 for clinical development and that candidate is still in Phase 1 clinical trials, please review this section and revise statements such as those in the non-exhaustive list below to provide context for your beliefs and expectations regarding Tectonic's business and the potential performance of the Tectonic product candidates under development. Where appropriate, qualify such statements, or revise to clarify those that are currently aspirational.***

- ***Tectonic has elected to prioritize development of TX45 in Group 2 PH/HfpEF in part because the physiological actions of relaxin "will likely address the key pathophysiology of the disease" (page 343).***
- ***Tectonic's single-chain engineering "streamlines the scale-up manufacturing process" (page 345).***
- ***Tectonic has also identified an indication, Group 2 PH / HFpEF, that "appears to be the ideal setting in which to fully realize the therapeutic potential of relaxin" (page 345).***
- ***"GEODeTM has overcome the challenges of GPCR targeted biologics..." (page 356).***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 352, 355, 357 and 368 of the Amended Registration Statement.

Testing of Group 1 PH (PAH) Drugs as Treatments for Group 2 PH - Implications of PDE5i Results, page 347

33. ***Please review and revise throughout where appropriate to remove premature conclusory references, such as to results that "should" or "would" occur in prelinical or clinical testing of Tectonic product candidates. In this regard, refer to the following non-exhaustive list of examples:***

- ***TX45, a single-chain relaxin-Fc fusion protein, "should be compatible with chronic administration via intermitted subcutaneous injection" (page 345).***
- ***Relaxin's pulmonary and systemic vasodilatory activity "should unload the left ventricle, while relaxin's anti-fibrotic and anti-inflammatory activities should promote reverse remodeling of the left ventricle in HFpEF" (page 347).***
- ***Relaxin's ability to relax the heart muscle "should improve diastolic filling in HFpEf..." (page 347); and***
- ***These benefits would also extend to IpcPH patients and thus to the entire Group 2 PH/HFpEF population" (page 347).***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 353, 355 and 357 of the Amended Registration Statement.

34. ***We note that Figure 3 on page 347, as well as numerous other figures throughout the Tectonic Business section, includes text that is too small to be read. Please review and revise your figures and graphics throughout to ensure that the text in each, including subscript or other notations, are clearly legible.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has replaced the graphics on pages 355 and 357-367 of the Amended Registration Statement.

Background on TX45, page 349

35. ***We note that Figure 5 on page 349 purports to compare the pharmacokinetic profile of TX45 with an earlier TX parent compound and a "different Fc-relaxin fusion described in the literature." Please revise to clarify whether the comparison of Tectonic compounds and the comparator was conducted on a head-to-head basis. If you did not conduct a head- to-head trial, please revise to clearly disclose that fact. If you intend to retain disclosure regarding the comparator relaxin therapeutic, please expand your disclosure to include a citation or citations to the scientific literature to which you refer, and provide the underlying data regarding the comparator.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 359 of the Amended Registration Statement.

36. ***Please remove all claims or conclusions related to efficacy and focus your disclosure on the objective data resulting from preclinical studies and clinical trials. With respect to any trials with TX45, you may compare the objective results without concluding the trials demonstrated your candidate is "superior." In this regard, please remove or revise your references to TX45's "superior PK profile" and "superior tissue penetration" in Figure 5 and Figure 7, respectively.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 359 and 361 of the Amended Registration Statement.

TX45 Pharmacology Studies, page 350

37. ***Please expand your discussion of your preclinical animal studies as follows:***

- ***Briefly describe the number of animal models used, the number of tests conducted, the number of animals tested, the range of results or effects observed in these tests and how such results were measured.***
- ***Disclose whether or not the data from any preclinical model was found to be statistically significant. Include the p-value, and at first use, please provide a brief explanation regarding how p-values are used to measure statistical significance and the p-value that you have to achieve to conclude a statistically significant result.***
- ***State whether you have published the data for any of your preclinical studies.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 360-363 of the Amended Registration Statement.

TX45 Clinical Development Studies and Plans, page 352

38. ***With respect to the Phase 1 study of TX45 in healthy volunteers currently ongoing in Australia and the planned Phase 1b trials of TX45 expected to be conducted in Moldova and the Netherlands in 1H 2024, please disclose additional information regarding the scope and design of such studies, including:***

- ***the number of volunteers or patients being studied, including the number in each cohort;***
- ***duration of treatment;***
- ***dosage information, including the expected timing of participant dosing as well as the amount and frequency; and***
- ***patient enrichment strategies or criteria, as applicable. In this regard, we note your disclosure on page 353 that the planned Phase 1b trial is "designed to enrich the CpcPH population subgroup during enrollment."***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 364 of the Amended Registration Statement.

TX45 Non-clinical Toxicology Studies, page 352

39. ***Please revise to define the acronym "NOAEL" at first use, and explain the relevance of the NOAEL to the toxicology study findings discussed on page 352.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 363 of the Amended Registration Statement.

Phase 2 6-month Proof of Concept Study in Group 2 PH and HFpEF, page 353

40. ***We note your disclosure that Tectonic's TX45 Phase 2 proof-of-concept clinical trial in patients with Group 2 PH and HFpEF is expected to begin in the second half of 2024. If true, please revise to clarify that the commencement of such Phase 2 study is dependent upon the results of Tectonic's Phase 1 trials.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 365 of the Amended Registration Statement.

Type 2 PH Anticipated Pivotal Development Pathway, page 353

41. ***Please revise to qualify the first sentence of this paragraph.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 365 of the Amended Registration Statement.

Collaboration, License and Services Agreements, page 356

42. ***Please revise your disclosure regarding the Harvard License Agreement as follows:***

- ***Quantify all material payment terms, including quantification of the upfront license fee and any installments thereof, amounts paid to date in cash or shares of common stock, and aggregate potential milestone payments segregated by development and commercial milestone payments.***
- ***With respect to applicable royalty rates to be paid, disclose such rates within a range of ten percentage points. In this regard, we note your reference to a royalty rate "in the low double digits" on page 357.***
- ***You state that this agreement expires upon the expiration of the last-to-expire royalty term. Please revise to clarify when the patents underlying the royalty term are expected to expire.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 369, 415 and F-50 of the Amended Registration Statement.

43. ***Please revise this section to include a discussion of the Alloy Therapeutics License Agreement and the Adimab Agreement as you do on page 407, or advise. Additionally, such discussion should conform to the prior comment. File these agreements as exhibits to the registration statement or tell us why you believe they are not required to be filed.***

Response: The Company respectively acknowledges that Staff's comment and advises the Staff that it is not required to file the Alloy Therapeutics License Agreement (the "Alloy Agreement") or the Adimab Funded Discovery Agreement (the "Adimab Agreement" and together with the Alloy Agreements, the "Discovery Agreements") because the Company believes, based on guidance from Tectonic, that these agreements are not material contracts under Item 601(b)(10) of Regulation S-K. The Company's consideration of Item 601(b)(10) of Regulation S-K as it relates to the Discovery Agreements is summarized below.

Item 601(b)(10)(i) of Regulation S-K defines a "material contract" as a contract made outside of the ordinary course of business which is material to the registrant. Item 601(b)(10)(ii)(B) of Regulation S-K clarifies that if an agreement is such as ordinarily accompanies the kind of business conducted by the registrant, it will be deemed to be made in the ordinary course of business, and therefore not required to be filed, unless the agreement is, among other things, one "upon which the registrant's business is substantially dependent." The Alloy Agreement provides various intellectual property that is in early stage research and discovery, and the Alloy Agreement provides for collaboration services on human antibody discovery and a license to certain intellectual property for a program that is also in early stage research and discovery.

The Company respectfully advises the Staff that it believes, based on guidance from Tectonic, that (i) each Discovery Agreement was entered into in the ordinary course of Tectonic's business as a biotechnology company conducting research and discovery, and (ii) Tectonic is not substantially dependent upon either Discovery Agreement at this time. The intellectual property that is the subject of the Alloy Agreement is not material to Tectonic's business as neither Tectonic's GEODe platform nor any of the assets in its pipeline uses the intellectual property licensed pursuant to the Alloy Agreement. Similarly, the collaboration services and intellectual property that are the subject of the Adimab Agreement are not material to Tectonic's business neither Tectonic's GEODe platform nor any of the assets in its pipeline uses the services or intellectual property provided pursuant to the Adimab Agreement.

The Company advises the Staff that it will continue to evaluate in future periods whether either Discovery Agreement satisfies the definition of a "material contract" under Item 601(b)(10) of Regulation S-K.

WuXi Master Development and Manufacturing Services Agreement, page 357

44. ***Please revise to specify the third anniversary of the effective date of the WuXi Biologics Manufacturing Agreement, at which time such agreement may expire.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page 370 of the Amended Registration Statement.

Intellectual Property, page 360

45. ***With respect to the second paragraph of this section:***

- ***We note that a larger number of in-licensed or wholly owned patents are discussed in this this paragraph as compared to the number disclosed in the first sentence. Please reconcile or advise.***
- ***Also clearly describe on an individual or patent family basis the type of patent protection granted for each product or technology (composition of matter, use, or process) and the jurisdiction(s) of each pending or issued foreign patent.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on pages 372-373 and 415 of the Amended Registration Statement.

AVROBIO's Management Discussion and Analysis of Financial Condition and Results of Operations, page 378
Consolidated Results of Operations, page 381

46. ***We note from page 380 that research and development (R&D) expense attributed to the Gaucher program nearly doubled during the nine months ended September 30, 2023 as compared to September 30, 2022. Please revise the explanation on page 383 to specifically address the reason(s) for this increase, when consolidated R&D decreased during this period.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that the disclosure regarding the Company's consolidated results of operations beginning on page 392 of the Amended Registration Statement has been updated to include disclosure for the fiscal years ended December 31, 2023 and December 31, 2022, replacing disclosure regarding the three and nine month periods ended September 30, 2023 and September 30, 2022. The Company respectfully directs the Staff to the table on page 393 of the Amended Registration Statement, which shows a year-over-year increase in research and development expenses attributed to the Company's Gaucher program.

47. ***Please revise AVROBIO's consolidated results of operations section to provide an analysis of the changes in the components of results of operations for the year ended December 31, 2022 as compared to the year ended December 31, 2021, as well as providing an analysis of cash flows for those annual periods. Refer to Item 303(b) of Regulation S-K and the Instructions thereto.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has replaced the previously provided financial statements for the fiscal years ended December 31, 2022 and December 31, 2021 with the Company's financial statements for the fiscal years ended December 31, 2023 and December 31, 2022, beginning on page F-1 of the Amended Registration Statement, which provides a year-over-year analysis of the Company's results of operations and cash flows.

AVROBIO, Inc. Financial Statements for the Nine Months ended September 30, 2023, page F- 31

48. ***Please clarify the interim financial statements are for AVROBIO, Inc.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that the Company has removed the interim financial statements for the nine months ended September 30, 2023 and September 30, 2022, and further advises the Staff that in the index for the financial statements for the fiscal years ended December 31, 2023 and December 31, 2022, beginning on page F-1 of the Amended Registration Statement, the Company has added clarifying headers to indicate the Company's and Tectonic's financial statements.

Tectonic Financial Statements
Independent Auditor's Report, page F-54

49. ***We note that the audit of the financial statements for Tectonic for the two years December 31, 2022 was conducted in accordance with auditing standards generally accepted in the United States of America (GAAS). If AVROBIO is considered a shell company, please tell us what consideration the Tectonic's auditor gave to conducting the audit in accordance with the standards of the PCAOB given, among other things, the fact that Tectonic's financial statements become those of the registrant upon consummation of the merger. If AVROBIO is not a shell company, please confirm that the auditor report for the historical financial statements presented after the business combination will comply with the PCAOB standards.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that Tectonic's auditor will issue an audit report on Tectonic's 2023 and 2022 financial statements in accordance with PCAOB standards in a subsequent amendment to the Amended Registration Statement if the Company is considered a shell company. If the Company is not considered a shell company, the audit report for the historical financial statements after the closing of the merger will comply with PCAOB standards.

2. Summary of Significant Accounting Policies, page F-62
Convertible Preferred Stock, page F-66

50. ***You state hereunder that Tectonic classifies convertible preferred stock outside of stockholders' deficit on the consolidated balance sheets "as it is redeemable upon the occurrence of certain deemed liquidation events that are not strictly within the Company's control." However, we note the disclosure on pages F-79 and F-99 that the preferred stock "is not subject to mandatory redemption or other redemption provisions for which the events resulting in redemption are not within the Company's control, other than upon occurrence of a Deemed Liquidation Event, defined as (a) a merger or consolidation in which the Company is a constituent party or a subsidiary of the Company is a constituent party and the Company issues shares of its capital stock pursuant to the merger or consolidation and (b) the sale or disposition of the Company or one or more subsidiaries of the Company." Please advise regarding these disclosures which appear contradictory or revise as applicable. To the extent the classification of the preferred stock has changed during the periods presented, please revise to explain how you assessed such change in classification in accordance with ASC 480 and ASC 815-40.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure on page F-56 of the Amended Registration Statement to clarify the redemption rights and the classification of convertible preferred stock. There have been no changes to the classification of the convertible preferred stock since issuance.

General

51. ***We note references to Tectonic's Scientific Advisory Board ("SAB") on page 291. If material, please include disclosure in the appropriate section(s) of the registration statement that:***

- ***Describes the role or function of Tectonic's SAB;***

- ***Describes the composition of the SAB, and in light of your disclosure at the bottom of page 143, indicates whether any members of the SAB are or have been clinical investigators in any Tectonic study or trial;***
- ***Describes whether, and if so how, SAB members are compensated; and***
- ***Describes whether any SAB members are party to a consulting or advisory contract with the Company, including any material provisions of such agreements.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that Tectonic does not believe its Scientific Advisory Board plays a material role in the strategy or operations of Tectonic and has no role in Tectonic's corporate governance or authority over management. Tectonic's Scientific Advisory Board has historically consisted solely of Dr. Andrew Kruse, and he is a party to a consulting agreement with Tectonic pursuant to which he receive nominal compensation in exchange for the provision of consulting and advisory services from time to time. Dr. Kruse's compensation is set forth in the Tectonic Director Compensation Table as set forth on page 291 of the Amended Registration Statement. His consulting agreement is filed as Exhibit 10.41 to the Amended Registration Statement. Accordingly, Tectonic does not believe that information concerning the scientific advisory board is material to an investor's understanding of Tectonic's business.

52. ***With reference to your disclosures concerning the current status of AVROBIO's operations, the plans for those operations, and the pro forma accounting treatment for ABROBIO's assets and liabilities beginning on page 422, please provide us an analysis concerning whether AVROBIO is a shell company as defined in Rule 12b-2 of the Exchange Act or whether it could become one prior to Closing. In this regard, we note references to the potential sale, license or other monetization of AVROBIO's legacy business prior to the merger on pages 21, 235, and B-1. For guidance, see Use of Form S- 8, Form 8-K, and Form 20-F by Shell Companies, Release No. 33-8587 (July 15, 2005) at n. 32 as reiterated in Special Purpose Acquisition Companies, Shell Companies, and Projections, Release No. 33-11048 (March 30, 2022) at n. 239 and accompanying text.***

Response: The Company respectfully advises the Staff that the Company does not meet the SEC's definition of a shell company, nor could it become one prior to closing, because it had substantial pre-combination assets and/or activities, including multiple clinical and pre-clinical product candidates, an intellectual property portfolio and key research and development personnel, prior to its decision to seek strategic alternatives for the business.

Rule 12b-2 of the Securities Exchange Act of 1934, as amended, defines a "shell company" as a registrant that has:

(1) No or nominal operations; and

(2) Either: (i) no or nominal assets; (ii) assets consisting solely of cash and cash equivalents; or (iii) assets consisting of any amount of cash and cash equivalents and nominal other assets.

The Company is a gene therapy company historically focused on developing potentially curative hematopoietic stem cell ("HSC") gene therapies to treat patients with rare diseases following a single dose treatment regimen. The Company developed its proprietary plato® HSC gene therapy platform, which incorporates a four-plasmid lentiviral vector designed to optimize vector copy number, transduction efficiency and resulting enzyme activity, a closed, automated manufacturing system designed to improve consistency and predictability of the drug product, and a personalized approach to conditioning. Until July 2023, the Company had multiple clinical stage programs and a pre-clinical development program it was pursuing internally.

As described in the Registration Statement, in July 2023, following a comprehensive review of its business, the Company announced its intention to halt development of its programs and explore strategic alternatives focused on maximizing stockholder value, which may include, but are not limited to, an acquisition, a merger, business combination or divestiture.

More than "nominal" operations

While the Company has taken actions to stop the further internal development of its programs following this decision in July 2023, the Company has continued to engage in operational activities to meet continuing contractual obligations. For example, in June 2023, the Company entered into a Separation Services Agreement with Novartis, following the sale to Novartis of the Company's cystinosis gene therapy program, with continuing contractual obligations for technology transfer services through June 2024, which have manifested in significant continuing engagement between Company personnel and Novartis personnel.

In addition, the Company is seeking potential business development opportunities for (i) its AVR-RD-02 gene therapy program (for the treatment of Gaucher disease type 1 and type 3) and its AVR-RD-03 gene therapy program (for the treatment of Pompe disease); (ii) portions of the Company's patent portfolio; and (iii) its proprietary plato manufacturing platform. In connection with those efforts, since July 2023, the Company has been engaged in activities to wind down its clinical trials in a way that best preserves the ability for others to conduct future research and development and to document the technical aspects and current stage of its assets and other trade secrets and trials.

Further, the Company has retained certain key research and development employees to conduct these operational and business development activities.

For the fiscal year ended December 31, 2023, which includes five months of operations following the Company's decision to explore strategic alternatives, the Company reported approximately $71.7 million of operating expenses associated with operating activities (i.e., research and development expenses and general and administrative expenses). The Company believes that these operating activities and operating expenses were not "nominal," as required under Rule 12b-2 in order for the Company to be deemed a shell company.

More than "nominal" assets

The Company believes that its total assets (other than cash and cash equivalents) and the Company's intellectual property portfolio are more than "nominal." As of December 31, 2023, the Company had approximately $2.4 million of total assets (other than cash and cash equivalents and restricted cash).

The Company has maintained core intellectual property directed to its product candidates, including its Pompe program, intellectual property generated in the area of central nervous system diseases such as GBA Parkinson's disease and GRN frontotemporal dementia, as well as intellectual property covering its plato platform which includes proprietary processes for developing and manufacturing HSC gene therapies.

Additionally, Tectonic believes the Company's proprietary lentiviral-based gene and cell therapy approach could potentially be used by Tectonic to develop CAR-T cell therapies which Tectonic believes could have advantages over currently available treatments. For example, nanobodies targeting GPCR tumor antigens could potentially be generated using the GEODe platform, constructed into a CAR receptor and transduced using the Company's lentiviral technology into patients' T cells with the objective of treating cancer. In the future, Tectonic may choose to further explore the modulation of immune responses in autoimmune diseases using the Company's proprietary technology. Tectonic currently has one pending international Patent Cooperation Treaty application on constitutively activated GPCR technology.

Guidance in (i) Use of Form S-8, Form 8-K, and Form 20-F by Shell Companies, Release No. 33-8587 (July 15, 2005) (the "2005 Adopting Release") and (ii) Special Purpose Acquisition Companies, Shell Companies, and Projections, Release No. 33-11048 (March 30, 2022) (the "2022 Proposing Release")

In the 2022 Proposing Release, the SEC reiterated its previous position set forth in the 2005 Adopting Release that companies that structure transactions to avoid shell company status may nonetheless be shell companies, and noted that a reporting shell company that is made to appear to have, or has cloaked itself as having, more than "nominal" assets or operations would still be subject to the shell company limitations. The Company respectfully submits that the merger is not a scheme "undertaken with the intention of evading the definition of shell company" as described in Footnote 32 to the 2005 Adopting Release.

Footnote 32 describes the scenario of a promoter of a company who appears to place assets within an entity and then seeks a business combination transaction for the entity, with the expectation of a return of the assets in the future. Unlike the scenario in Footnote 32, the Company is not being used to evade the shell company rules. The Company was formed in 2015 to identify and develop its product candidates as described above and to develop and utilize its plato platform. The Company continued these business activities up until July 2023 when the decision was made to halt further internal program development efforts and explore strategic alternatives for its programs and platform technology. After the merger, certain of the assets related to the Company's historical development activities will be subject to a CVR agreement. Each CVR serves the purpose of allowing the Company's legacy stockholders to realize value from the potential sale or licensing of

the Company's legacy assets, without requiring the parties to the merger to agree on a value to ascribe to those assets in advance. Here, there was no promoter who temporarily placed these legacy assets with the Company with the intent of evading shell company status, and there is no expectation of benefitting from the assets being returned. The Company respectfully submits that the scenario described in Footnote 32 does not apply to the Company's facts, and that the Company's agreement to merge with Tectonic is not structured to "cloak" the Company with assets for the purpose of avoiding shell company status. Applying the shell company rules to the Company today, and up until the closing of the merger, would not serve the purpose of protecting investors from the fraud and abuse in the securities markets the shell company rules were designed to deter.

53. ***We note that as of September 2023, Tectonic formed a wholly-owned Australian subsidiary, Tectonic Therapeutic Pty Ltd., to conduct various preclinical studies and clinical trials for its product candidates in Australia. Further, it appears based upon other disclosures on pages F-62 and F-89 that Tectonic has another wholly-owned subsidiary, Tectonic Therapeutic Securities Corp. Please tell us why this latter entity does not appear in Ex 21.1 (List of Subsidiaries of Tectonic Therapeutic, Inc.), or revise.***

Response: The Company respectfully acknowledges the Staff's comment and advises the Staff that it has revised the disclosure in Exhibit 21.1 to the Amended Registration Statement.

*****

Please contact the undersigned at (212) 459-7072 or via email at AdamJohnson@goodwinlaw.com if you have any questions with respect to the foregoing.

Very truly yours,

/s/ Adam V. Johnson
Adam V. Johnson
Goodwin Procter LLP

cc: Erik Ostrowski, *AVROBIO, Inc.*
Mitchell Bloom, *Goodwin Procter LLP*
Robert Masella, *Goodwin Procter LLP*
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