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

FORM S-3

REGISTRATION STATEMENT
UNDER THE SECURITIES ACT OF 1933

GT BIOPHARMA, INC.

(Exact name of registrant as specified in its charter)

Delaware
*(State of other jurisdiction of
incorporation or organization)*

94-1620407
*(I.R.S. Employer
Identification No.)*

Address Not Applicable¹
(415) 919-4040

(Address, including zip code, and telephone number, including area code, of registrant's principal executive offices)

Paracorp Incorporated
2140 S. Dupont Hwy.
Camden, DE 19934
(302) 697-4590

(Name, address, including zip code, and telephone number, including area code of agent for service)

Copy to:
Louis A. Wharton, Esq.
Stubbs Alderton & Markiles, LLP
15260 Ventura Boulevard, 20th Floor
Sherman Oaks, California 91403
(818) 444-4500

Approximate date of commencement of proposed sale to the public: FROM TIME TO TIME AFTER THE EFFECTIVE DATE OF THIS REGISTRATION STATEMENT.

If the only securities being registered on this Form are being offered pursuant to dividend or interest reinvestment plans, please check the following box:

If any of the securities being registered on this Form are to be offered on a delayed or continuous basis pursuant to Rule 415 under the Securities Act of 1933, other than securities offered only in connection with dividend or interest reinvestment plans, check the following box:

If this Form is filed to register additional securities for an offering pursuant to Rule 462(b) under the Securities Act, please check the following box and list the Securities Act registration statement number of the earlier effective registration statement for the same offering.

If this Form is a post-effective amendment filed pursuant to Rule 462(c) under the Securities Act, check the following box and list the Securities Act registration statement number of the earlier effective registration statement for the same offering.

If this Form is a registration statement pursuant to General Instruction I.D. or a post-effective amendment thereto that shall become effective upon filing with the Commission pursuant to Rule 462(e) under the Securities Act, check the following box.

If this Form is a post-effective amendment to a registration statement filed pursuant to General Instruction I.D. filed to register additional securities or additional classes of securities pursuant to Rule 413(b) under the Securities Act, check the following box.

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

Large accelerated filer
Non-accelerated filer

Accelerated filer
Smaller reporting company
Emerging growth company

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 7(a)(2)(B) of the Securities Act.

The Registrant hereby amends this registration statement on such date or dates as may be necessary to delay its effective date until the Registrant shall file a further amendment which specifically states that this registration statement shall thereafter become effective in accordance with Section 8(a) of the Securities Act or until this Registration Statement shall become effective on such date as the Securities and Exchange Commission, acting pursuant to said Section 8(a), may determine.

¹ Effective as of July 1, 2024, the Company became a fully remote company. We do not maintain a principal executive office. For purposes of compliance with applicable requirements of the Securities Act of 1933, as amended, and the Securities Exchange Act of 1934, as amended, any stockholder communication required to be sent to the Company's principal executive offices may be directed to 505 Montgomery Street, 10th Floor, San Francisco, California 94111, or by email to auditcommittee@gtbiopharma.com.

The information in this preliminary prospectus is not complete and may be changed. These securities may not be sold until the registration statement filed with the Securities and Exchange Commission is effective. This preliminary prospectus is not an offer to sell these securities and is not soliciting an offer to buy these securities in any jurisdiction where the offer or sale is not permitted.

SUBJECT TO COMPLETION, DATED MARCH 6, 2025

PRELIMINARY PROSPECTUS



625,283 Shares of Common Stock

This prospectus relates to the resale, by the selling stockholders identified in this prospectus (the "Selling Stockholders"), or other disposition from time to time of (a) up to 302,069 shares of the common stock, par value \$0.001 per share ("Common Stock"), of GT Biopharma, Inc., a Delaware corporation (the "Company," "we," "us" or "our"), issuable upon the exercise of Series A Inducement Warrants with a per share exercise price of \$2.02 (the "Series A Inducement Warrants") and up to 302,069 shares of Common Stock issuable upon the exercise of Series B Inducement Warrants with a per share exercise price of \$2.02 (the "Series B Inducement Warrants" and together with the Series A Inducement Warrants, the "Inducement Warrants"), issued in a private placement to certain investors in connection with warrant exercise inducement offer letter agreements entered into on February 25, 2025 (the "Inducement Letters") and (b) up to 21,145 shares of Common Stock issuable upon the exercise of Placement Agent Common Stock Purchase Warrants at a price of \$2.8375 per share (the "Inducement Placement Agent Warrants," and together with the Inducement Warrants, the "2025 Inducement Warrants"), issued pursuant to an engagement agreement, dated February 13, 2025, by and between us and H.C. Wainwright & Co., LLC ("HCW").

We are not offering any shares of Common Stock for sale under this prospectus. We are registering the offer and resale of the shares of Common Stock to satisfy contractual obligations owed by us pursuant to the Inducement Letters and documents ancillary thereto.

We will not receive any proceeds from the sale of the shares of Common Stock by the Selling Stockholders. All net proceeds from the sale of the shares of Common Stock covered by this prospectus will go to the Selling Stockholders. However, we may receive the proceeds from any exercise of the 2025 Inducement Warrants if the holders do not exercise the 2025 Inducement Warrants on a cashless basis. See "Use of Proceeds."

The Selling Stockholders may sell all or a portion of the shares of Common Stock from time to time in market transactions through any market on which our shares of Common Stock are then traded, in negotiated transactions or otherwise, and at prices and on terms that will be determined by the then prevailing market price or at negotiated prices directly or through a broker or brokers, who may act as agent or as principal or by a combination of such methods of sale. See "Plan of Distribution."

We are paying the cost of registering the shares of Common Stock pursuant to this prospectus as well as various related expenses. The Selling Stockholders are responsible for all broker or similar commissions related to the offer and sale of their shares.

Our Common Stock is presently listed on the Nasdaq Capital Market under the trading symbol "GTBP." On March 5, 2025, the closing sale price for our Common Stock was \$2.43 per share.

Investing in our securities involves a high degree of risk. See "Risk Factors" contained or incorporated by reference in this prospectus concerning factors you should consider before investing in our Common Stock.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined if this prospectus is truthful or complete. Any representation to the contrary is a criminal offense.

The date of this prospectus is [●], 2025.

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You should rely only on the information that we have provided or incorporated by reference in this prospectus, any applicable prospectus supplement and any related free writing prospectus that we may authorize to be provided to you. We have not authorized anyone to provide you with different information. No dealer, salesperson or other

person is authorized to give any information or to represent anything not contained in this prospectus, any applicable prospectus supplement or any related free writing prospectus that we may authorize to be provided to you. You must not rely on any unauthorized information or representation. This prospectus is an offer to sell only the securities offered hereby, but only under circumstances and in jurisdictions where it is lawful to do so. You should assume that the information in this prospectus, any applicable prospectus supplement or any related free writing prospectus is accurate only as of the date on the front of the document and that any information we have incorporated by reference is accurate only as of the date of the document incorporated by reference, regardless of the time of delivery of this prospectus, any applicable prospectus supplement or any related free writing prospectus, or any sale of a security.

ABOUT THIS PROSPECTUS

This prospectus is part of a registration statement filed with the U.S. Securities and Exchange Commission (the “SEC”) using a “shelf” registration process. By using a shelf registration statement, the Selling Stockholders may sell up to 625,283 shares of Common Stock from time to time in one or more offerings as described in this prospectus. We will not receive any proceeds from the sale by the Selling Stockholders of the shares of Common Stock offered pursuant to this prospectus.

We may also file a prospectus supplement or post-effective amendment to the registration statement of which this prospectus forms a part that may contain material information relating to these offerings. The prospectus supplement or post-effective amendment may also add, update or change information contained in this prospectus with respect to that offering. If there is any inconsistency between the information in this prospectus and the applicable prospectus supplement or post-effective amendment, you should rely on the prospectus supplement or post-effective amendment, as applicable. Before purchasing any securities, you should carefully read this prospectus, any post-effective amendment, and any applicable prospectus supplement, together with the additional information described under the heading “Where You Can Find More Information.”

Neither we, nor the Selling Stockholders, have authorized anyone to provide you with any information or to make any representations other than those contained or incorporated by reference in this prospectus, any post-effective amendment, or any applicable prospectus supplement prepared by or on behalf of us or to which we have referred you. We and the Selling Stockholders take no responsibility for and can provide no assurance as to the reliability of any other information that others may give you. The Selling Stockholders will not make an offer to sell these securities in any jurisdiction where the offer or sale is not permitted. You should assume that the information appearing in this prospectus, any post-effective amendment and any applicable prospectus supplement to this prospectus is accurate only as of the date on its respective cover. Our business, financial condition, results of operations and prospects may have changed since those dates. This prospectus incorporates by reference, and any post-effective amendment or any prospectus supplement may contain or incorporate by reference, market data and industry statistics and forecasts that are based on independent industry publications and other publicly available information.

Although we believe these sources are reliable, we do not guarantee the accuracy or completeness of this information and we have not independently verified this information. In addition, the market and industry data and forecasts that may be incorporated by reference in this prospectus, any post-effective amendment or any prospectus supplement may involve estimates, assumptions and other risks and uncertainties and are subject to change based on various factors, including those discussed under the heading “Risk Factors” incorporated by reference in this prospectus, any post-effective amendment and any applicable prospectus supplement. Accordingly, investors should not place undue reliance on this information.

The information appearing in this prospectus, any applicable prospectus supplement or any related free writing prospectus is accurate only as of the date on the front of the document and any information we have incorporated by reference is accurate only as of the date of the document incorporated by reference, regardless of the time of delivery of this prospectus, any applicable prospectus supplement or any related free writing prospectus, or any sale of a security. Our business, financial condition, results of operations and prospects may have changed since those dates.

This prospectus contains summaries of certain provisions contained in some of the documents described herein, but reference is made to the actual documents for complete information. All of the summaries are qualified in their entirety by the actual documents. Copies of some of the documents referred to herein have been filed, will be filed or will be incorporated by reference as exhibits to the registration statement of which this prospectus is a part, and you may obtain copies of those documents as described below under the heading “Where You Can Find More Information.”

This prospectus and the information incorporated herein by reference include trademarks, service marks and trade names owned by us or other companies. All trademarks, service marks and trade names included or incorporated by reference into this prospectus, any applicable prospectus supplement or any related free writing prospectuses are the property of their respective owners.

Unless the context otherwise requires, the terms “we,” “our,” “us,” “our company,” and “GT Biopharma” refer to GT Biopharma, Inc.

PROSPECTUS SUMMARY

This summary highlights certain information contained elsewhere in this prospectus. This summary does not contain all of the information that may be important to you or that you should consider before investing in our Common Stock. You should read the entire prospectus carefully, including our financial statements and related notes and especially the information under “Risk Factors” incorporated by reference herein from our most recent annual report on Form 10-K for the year ended December 31, 2024 and filed with the SEC. This prospectus contains forward-looking statements, based on current expectations and related to future events and our future financial performance, that involve risks and uncertainties. Our actual results may vary materially from those discussed in the forward-looking statements as a result of various factors, including, without limitation, those set forth under “Risk Factors,” as well as other matters described in this prospectus and in our annual report. See “Forward-Looking Statements.”

Overview

We are a clinical stage biopharmaceutical company focused on the development and commercialization of novel immuno-oncology products based on our proprietary Tri-specific Killer Engager (TriKE®), and Tetra-specific Killer Engager (Dual Targeting TriKE®) fusion protein immune cell engager technology platforms. Our TriKE® and Dual Targeting TriKE® platforms generate proprietary therapeutics designed to harness and enhance the cancer killing abilities of a patient’s own natural killer cells, or NK cells. Once bound to an NK cell, our moieties are designed to activate the NK cell to direct it to one or more specifically targeted proteins expressed on a specific type of cancer cell or virus infected cell, resulting in the targeted cell’s death. TriKE®s can be designed to target any number of tumor antigens, including B7-H3, HER2, CD33 and PDL1, on hematologic malignancies or solid tumors and do not require patient-specific customization. We believe our TriKE® and Dual Targeting TriKE® platforms that activate endogenous NK cells are potentially safer than T-cell immunotherapy because there is less cytokine release syndrome (CRS) and fewer neurological complications. Our preclinical data suggests that this is explained by the TriKE® dependent CD16 directed IL-15 proliferation of NK cells but little effect on endogenous T cells.

We are using our TriKE® platform with the intent to bring to market immuno-oncology products that can treat a range of hematologic malignancies, solid tumors, and potentially autoimmune disorders. The platform is scalable, and we are implementing processes to produce investigational new drug (IND) ready moieties in a timely manner after a specific TriKE® conceptual design. Specific drug candidates can then be advanced into the clinic on our own or through potential collaborations with

partnering companies. We believe our TriKE®s may have the ability, if approved for marketing, to be used as both monotherapy and in combination with other standard-of-care therapies.

Our initial work was conducted in collaboration with the Masonic Cancer Center at the University of Minnesota under a program led by Dr. Jeffrey Miller, Professor of Medicine, and the Interim Director at the Center. Dr. Miller, who also serves as our Consulting Senior Medical Director, is a recognized key opinion leader in the field of NK cell and IL-15 biology and their therapeutic potential. We have exclusive rights to the TriKE® platform and are generating additional intellectual property for specific moieties.

Recent Developments

Warrant Exercise Inducement

On February 25, 2025, we entered into warrant exercise inducement offer letter agreements (the “Inducement Letters”) with certain holders (the “Holders”) of existing warrants to purchase shares of Common Stock (the “Existing Warrants”), pursuant to which the Holders agreed to exercise for cash their Existing Warrants to purchase an aggregate of 302,069 shares of Common Stock, in the aggregate, at a reduced exercise price of \$2.27 per share (the “Reduced Exercise Price”), in exchange for our agreement to issue new Series A Inducement Warrants to purchase shares of Common Stock and Series B Inducement Warrants to purchase shares of Common Stock on the terms described below (the “Warrant Inducement Transaction”). The reduction of the exercise price of the Existing Warrants and the issuance of the Inducement Warrants was structured as an at-market transaction under the rules of The Nasdaq Stock Market, LLC (“Nasdaq”). The closing of the Warrant Inducement Transaction occurred on February 26, 2025, following the satisfaction of the closing conditions set forth in the Inducement Letters. We received aggregate gross proceeds of approximately \$0.7 million from the exercise of the Existing Warrants by the Holders, before deducting placement agent fees and offering expenses.

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In consideration for the immediate exercise of the Existing Warrants for cash at the Reduced Exercise Price, the Holders received one Series A Inducement Warrant and one Series B Inducement Warrant for each Existing Warrant exercised. The Inducement Warrants are exercisable for an aggregate of up to 604,138 shares of Common Stock (the “Inducement Warrant Shares”), at an exercise price of \$2.02 per share. The Inducement Warrants will only be exercisable for cash, except in limited circumstances. A Holder may not exercise the Inducement Warrants if the Holder, together with its affiliates, would beneficially own more than a specified percentage of the outstanding Common Stock (4.99% or 9.99% as applicable), immediately after giving effect to such exercise, which may be increased or decreased at the Holders’ option (not to exceed 9.99%), effective after providing written notice to us.

The Series A Inducement Warrants, representing warrants to purchase up to 302,069 shares of Common Stock, are exercisable immediately and have a term of five years from the date of issuance. The Series B Inducement Warrants, representing warrants to purchase up to 302,069 shares of Common Stock, are exercisable immediately and have a term of eighteen months from the date of issuance.

In connection with the transactions contemplated in the Inducement Letters, we entered into an engagement letter (the “Engagement Letter”) with H.C. Wainwright & Co., LLC (“HCW”) to act as exclusive placement agent in connection with the transactions contemplated by the Inducement Letters. Pursuant to the terms of the Engagement Letter, HCW received approximately \$70,000 cash fee for its services, which includes reimbursement for certain expenses. Additionally, we issued to HCW, or its designees, Inducement Placement Agent Warrants to purchase up to 21,145 shares of Common Stock at an exercise price of \$2.8375 per share that are exercisable immediately and have a term of five years from the date of issuance.

We also agreed to file a registration statement within thirty (30) calendar days from the execution time of the Inducement Letters to register the resale of the Inducement Warrant Shares underlying the Inducement Warrants, and to use commercially reasonable efforts to cause the such registration statement to become effective within 60 calendar days from the execution time of the Inducement Letters (or within 90 calendar days from the execution time of the Inducement Letters in case of “full review” of the Resale Registration Statement by the SEC). We also agreed not to effect or agree to effect any variable rate transaction (as defined in the Inducement Letters) for one year following the closing of the transactions contemplated under the Inducement Letters.

Nasdaq Matters

On November 21, 2024, we received a letter (the “Notification Letter”) from the Nasdaq Listing Qualifications Staff (the “Staff”) notifying us that the amount of our stockholders’ equity had fallen below the \$2,500,000 required minimum for continued listing set forth in Nasdaq Listing Rule 5550(b)(1) (the “Minimum Stockholders’ Equity Requirement”). Nasdaq’s determination was based upon our stockholders’ equity as reported in our Quarterly Report on Form 10-Q for the period ended September 30, 2024. The Notification Letter also noted that we did not meet the alternatives of market value of listed securities or net income from continuing operations, and therefore, we no longer complied with Nasdaq’s Listing Rules.

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The Notification Letter indicated that we had 45 days (i.e., until January 6, 2025) to submit a plan to regain compliance with the Minimum Stockholders’ Equity Requirement, noting that if such plan is accepted, the Staff can grant us an extension of up to 180 days from the date of the Notification Letter to evidence compliance. In determining whether to accept our plan, the Staff will consider such things as the likelihood that the plan will result in compliance with Nasdaq’s continued listing criteria, our past compliance history, the reasons for our current non-compliance, other corporate events that may occur within the review period, our overall financial condition and our public disclosures.

We submitted a plan of compliance to the Staff on December 31, 2024, outlining our plan to conduct periodic public and private securities offerings to regain compliance. The Staff has not, as yet, accepted our plan of compliance, and has requested additional information regarding our financing plans. We can provide no assurance that the Staff will accept our plan of compliance.

If the Staff does not accept our plan of compliance, or if the Staff accepts our plan but we do not regain compliance within the allotted compliance period, Nasdaq will provide notice that our Common Stock will be subject to delisting. If our Common Stock is delisted from Nasdaq, our ability to raise capital through public offerings of our securities and to finance our operations could be adversely affected. We also believe that delisting would likely result in decreased liquidity and/or increased volatility in our Common Stock and could harm our business and future prospects. In addition, we believe that, if our Common Stock is delisted, our stockholders would likely find it more difficult to obtain accurate quotations as to the price of our Common Stock and it may be more difficult for stockholders to buy or sell our Common Stock at competitive market prices, or at all.

Going Concern

We have evaluated the significance of the uncertainty regarding our financial condition in relation to our ability to meet our obligations, which has raised substantial doubt about our ability to continue as a going concern. While it is very difficult to estimate our future liquidity requirements we believe if we are unable to obtain additional financing, existing cash resources will not be sufficient to enable us to fund the anticipated level of our operations through one year from the date the financial statements included in our annual report on Form 10-K for the year ended December 31, 2024 were issued. There can be no assurances that we will be able to secure additional financing on acceptable terms. In the event that we do not secure additional financing, we will be forced to delay, reduce, or eliminate some or all of our discretionary spending, which could adversely affect our business prospects, ability to meet long-term liquidity needs and ability to continue operations.

Implications of Being a Smaller Reporting Company

We are a “smaller reporting company” as defined in the Securities Exchange Act of 1934, as amended (the “Exchange Act”), and have elected to take advantage of certain of the scaled disclosures available to smaller reporting companies. Accordingly, we may provide less public disclosure than larger public companies, including the inclusion of only two years of audited consolidated financial statements and only two years of management’s discussion and analysis of financial condition and results of operations disclosure and the inclusion of reduced disclosure about our executive compensation arrangements. As a smaller reporting company, we are also exempt from compliance with the auditor attestation requirements pursuant to the Sarbanes-Oxley Act. As a result, the information that we provide to our stockholders may be different than you might receive from other public reporting companies in which you hold equity interests. We will continue to be a “smaller reporting company” until we have \$250 million or more in public float (based on our Common Stock) measured as of the last business day of our most recently completed second fiscal quarter or, in the event we have no public float or a public float (based on our Common Stock) that is less than \$700 million, annual revenues of \$100 million or more during the most recently completed fiscal year.

Corporate Information

Effective as of July 1, 2024, we became a fully remote company. We do not maintain a principal executive office. For purposes of compliance with applicable requirements of the Securities Act of 1933, as amended (the “Securities Act”), and the Exchange Act, any stockholder communication required to be sent to our principal executive offices may be directed to 505 Montgomery Street, 10th Floor, San Francisco, CA 94111. Our telephone number is (415) 919-4040. We maintain a website at www.gtbiopharma.com. Information contained on or accessible through our website is not, and should not be considered, part of, or incorporated by reference into, this prospectus.

THE OFFERING

Securities offered by Selling Stockholders:	625,283 shares of Common Stock, issuable upon the exercise of the 2025 Inducement Warrants.
Terms of the offering:	The Selling Stockholders will each determine when and how they will sell the shares of Common Stock offered in this prospectus, as described in the “Plan of Distribution.”
Use of Proceeds:	We will not receive any proceeds from the sale of Common Stock offered by the Selling Stockholders covered by this prospectus.
Risk Factors:	See the section under the heading “Risk Factors” in this prospectus and the other information included in, or incorporated by reference into, this prospectus or any prospectus supplement for a discussion of certain factors you should carefully consider before deciding to invest in shares of our Common Stock.
Trading Market and Symbol:	Our Common Stock is listed on the Nasdaq Capital Market under the symbol “GTBP.”

RISK FACTORS

Investment in the shares of Common Stock offered pursuant to this prospectus and any applicable prospectus supplement involves risks. You should carefully consider the risk factors incorporated by reference herein from our most recent annual report on Form 10-K, as well as any subsequent annual reports on Form 10-K, quarterly reports on Form 10-Q or current reports on Form 8-K we file after the date of this prospectus, and all other information contained or incorporated by reference into this prospectus, as updated by our subsequent filings under the Exchange Act, and the risk factors and other information contained in the applicable prospectus supplement and any applicable free writing prospectus before acquiring any of such Common Stock. The occurrence of any of these risks might cause you to lose all or part of your investment in the offered shares of Common Stock.

FORWARD-LOOKING STATEMENTS

This prospectus and the documents incorporated by reference contain forward-looking statements within the meaning of Section 27A of the Securities Act and Section 21E of the Exchange Act. These statements involve known and unknown risks, uncertainties and other important factors that may cause our actual results, performance or achievements to be materially different from any future results, performances or achievements expressed or implied by the forward-looking statements.

In some cases, you can identify forward-looking statements by terms such as “anticipates,” “believes,” “continue,” “could,” “estimates,” “expects,” “intends,” “may,” “ongoing,” “plans,” “potential,” “predicts,” “projects,” “seeks,” “should,” “will,” “would” as well as similar expressions, but the absence of these words does not mean that a statement is not forward-looking. Forward-looking statements reflect our current views with respect to future events, are based on assumptions and are subject to risks, uncertainties and other important factors. We discuss many of these risks, uncertainties and other important factors in greater detail in the risk factors incorporated by reference herein under the heading “Risk Factors” in the applicable prospectus supplement and any related free writing prospectus, and in our most recent annual report on Form 10-K and in our most recent quarterly report on Form 10-Q, as well as any amendments thereto reflected in subsequent filings with the SEC. Given these risks, uncertainties and other important factors, you should not place undue reliance on these forward-looking statements. Also, these forward-looking statements represent our estimates and assumptions only as of the date such forward-looking statements are made. Except as required by law, we assume no obligation to update any forward-looking statements publicly, or to reflect facts and circumstances after the date of this prospectus. Before deciding to purchase our securities, you should carefully read both this prospectus, the applicable prospectus supplement and any related free writing prospectus, together with the information incorporated herein by reference as described under the heading “Incorporation of Certain Information by Reference,” completely and with the understanding that our actual future results may be materially different from what we expect.

This prospectus and the documents incorporated by reference also contain estimates and other information concerning our industry, including market size and customer satisfaction ratings, that we obtained from industry publications, surveys and forecasts. This information involves a number of assumptions and limitations, and you are cautioned not to give undue weight to these estimates. Although we believe the information in these industry publications, surveys and forecasts is reliable, we have not

USE OF PROCEEDS

We will not receive any proceeds from the sale of shares of Common Stock offered by this prospectus and any accompanying prospectus supplement. All proceeds from the sale of shares of Common Stock will be for the respective accounts of the Selling Stockholders. We will bear all other costs, fees and expenses incurred in effecting the registration of the shares of Common Stock offered by this prospectus and any accompanying prospectus supplement, including, without limitation, all registration and filing fees and fees and expenses of our counsel and our accountants. Each Selling Stockholder will pay any discounts, commissions, and fees of underwriters, selling brokers, dealer managers or similar securities industry professionals incurred by such Selling Stockholder in disposing of the shares of Common Stock covered by this prospectus.

DETERMINATION OF OFFERING PRICE

The Selling Stockholders will determine at what price they may sell the shares of Common Stock offered by this prospectus, and such sales may be made at fixed prices, prevailing market prices at the time of the sale, varying prices determined at the time of sale, or negotiated prices. For more information, see “*Plan of Distribution.*”

SELLING STOCKHOLDERS

The Selling Stockholders may offer and sell, from time to time, any or all of the shares covered by this prospectus. We are registering 625,283 shares of Common Stock that may be issued upon the exercise of the 2025 Inducement Warrants held by the Selling Stockholders. The 2025 Inducement Warrants were issued in connection with a private placement transaction entered into on February 25, 2025, in which we agreed to file this registration statement covering the resale of the shares of Common Stock issuable upon exercise of the 2025 Inducement Warrants.

The following table sets forth the name of the Selling Stockholders, the number of shares of Common Stock beneficially owned by the Selling Stockholders prior to and after completion of the offering contemplated by this prospectus, and the aggregate number of shares that may be offered by the Selling Stockholders pursuant to this prospectus. In calculating the percentages of shares of Common Stock beneficially owned by the Selling Stockholders, we treated as outstanding the number of shares of our Common Stock issuable upon exercise of the 2025 Inducement Warrants and did not assume exercise of any other warrants. The percentage of shares owned prior to the offering is based on 2,536,397 shares of Common Stock outstanding as of February 28, 2025.

Under the terms of the 2025 Inducement Warrants, a Selling Stockholder may not exercise the 2025 Inducement Warrants to the extent such exercise would cause such Selling Stockholder, together with its affiliates, to beneficially own a number of shares of Common Stock which would exceed 4.99% (or, at the election of the purchaser, 9.99%) of our then outstanding shares of Common Stock following such exercise. The numbers of shares set forth in the following table do not reflect this limitation or any similar limitation.

There is no assurance that the 2025 Inducement Warrants will be exercised. If the 2025 Inducement Warrants are exercised, the Selling Stockholders may sell some, all or none of the shares obtained thereby. We do not know how long the Selling Stockholders will hold the shares before selling them, and we currently have no agreements, arrangements or understandings with the Selling Stockholders regarding the sale or other disposition of any of the shares. As a result, we cannot estimate the number of shares of Common Stock the Selling Stockholders will beneficially own after termination of sales under this prospectus. In addition, a Selling Stockholder may have sold, transferred or otherwise disposed of all or a portion of its shares of Common Stock since the date on which they provided information for this table.

Information concerning the Selling Stockholders may change from time to time and, to the extent required, we will supplement this prospectus accordingly. We have prepared the following table and the related notes based on information filed with the SEC, supplied to us by the Selling Stockholders or estimated based on our internal records, which may not include shares held by a Selling Stockholders in “street name.”

Selling Stockholder	Shares Beneficially Owned Prior to this Offering	Number of Shares Offered Hereby	Shares Beneficially Owned after this Offering (2)	
	(1)	(1)	Number	Percentage
Bristol Investment Fund Ltd. (3)	475,000	380,000	95,000	3.26%
Intracoastal Capital LLC (4)	113,320	112,070	1,250	*
Boothbay Absolute Return Strategies LP (5)	94,137	62,758	31,379	1.21%
Boothbay Diversified Alpha Master Fund LP (6)	40,344	26,896	13,448	*
Kingsbrook Opportunities Master Fund LP (7)	33,621	22,414	11,207	*
Charles Worthman (8)	341	211	130	*
Craig Schwabe (8)	1,153	714	439	*
Michael Vasinkevich (8)	21,895	13,559	8,336	*
Noam Rubinstein (8)	8,904	6,661	2,243	*

* Represents beneficial ownership of less than one percent.

- (1) Includes shares of Common Stock issuable upon the full exercise of the 2025 Inducement Warrants, without giving effect to the beneficial ownership limitations set forth therein, which restrict the Selling Stockholder from exercising that portion of the 2025 Inducement Warrants that would result in the Selling Stockholder and its affiliates owning, after exercise, a number of shares of Common Stock in excess of the applicable beneficial ownership limitation.
- (2) Assumes the sale of all shares of Common Stock available for sale under this prospectus and no further acquisitions of shares by the Selling Stockholders.
- (3) Consists of (i) 95,000 shares of Common Stock and (ii) 380,000 shares of Common Stock issuable upon the exercise of the Inducement Warrants, the latter of which are subject to a beneficial ownership limitation that prohibits Bristol Investment Fund, Ltd. (“BIF”) from exercising any portion of the Inducement Warrants to the extent that, following such exercise, BIF would beneficially own greater than 9.99% of the outstanding shares of Common Stock. The address of record is 1090 Center Drive, Park City, Utah 84098. Paul Kessler, as manager of Bristol Capital Advisors, LLC, the investment advisor to BIF and Bristol Capital, LLC (“BC”), has voting and investment control over the securities held by BIF and BC. Mr. Kessler disclaims beneficial ownership of these securities except to the extent of his pecuniary interest therein.

(4) Consists of (i) 1,250 shares of Common Stock issuable upon the exercise of previously held warrants and (ii) 112,070 shares of Common Stock issuable upon the exercise of the Inducement Warrants, the latter of which are subject to a beneficial ownership limitation that prohibits Intracoastal Capital, LLC (“Intracoastal”) from exercising any portion of the Inducement Warrants to the extent that, following such exercise, Intracoastal would beneficially own greater than 4.99% of the outstanding shares of Common Stock. The address of record is 245 Palm Trail Delray Beach, FL, 33483. Mitchell P. Kopin (“Mr. Kopin”) and Daniel B. Asher (“Mr. Asher”), each of whom are managers of Intracoastal, have shared voting control and investment discretion over the securities reported herein that are held by Intracoastal. As a result, each of Mr. Kopin and Mr. Asher may be deemed to have beneficial ownership (as determined under Section 13(d) of the Exchange Act) of the securities reported herein that are held by Intracoastal.

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- (5) Consists of (i) 31,379 shares of Common Stock and (ii) 62,758 shares of Common Stock issuable upon the exercise of the Inducement Warrants, the latter of which are subject to a beneficial ownership limitation that prohibits Boothbay Absolute Return Strategies, LP, a Delaware limited partnership (“BBARS”), from exercising any portion of the Inducement Warrants to the extent that, following such exercise, BBARS would beneficially own greater than 4.99% of the outstanding shares of Common Stock. The address of record is 689 Fifth Avenue, 12th Floor, New York, NY, 10022. BBARS is managed by Boothbay Fund Management, LLC, a Delaware limited liability company (“Boothbay”). Boothbay, in its capacity as the investment manager of BBARS, has the power to vote and the power to direct the disposition of all securities held by the BBARS. Ari Glass is the Managing Member of Boothbay. Each of BBARS, Boothbay and Mr. Glass disclaim beneficial ownership of these securities, except to the extent of any pecuniary interest therein.
- (6) Consists of (i) 13,448 shares of Common Stock and (ii) 26,896 shares of Common Stock issuable upon the exercise of the Inducement Warrants, the latter of which are subject to a beneficial ownership limitation that prohibits Boothbay Diversified Alpha Master Fund LP, a Cayman Islands limited partnership (“BBDAMF”), from exercising any portion of the Inducement Warrants to the extent that, following such exercise, BBDAMF would beneficially own greater than 4.99% of the outstanding shares of Common Stock. The address of record is 689 Fifth Avenue, 12th Floor, New York, NY, 10022. BBDAMF is managed by Boothbay. Boothbay, in its capacity as the investment manager of BBDAMF, has the power to vote and the power to direct the disposition of all securities held by BBDAMF. Ari Glass is the Managing Member of Boothbay. Each of BBDAMF, Boothbay and Mr. Glass disclaim beneficial ownership of these securities, except to the extent of any pecuniary interest therein.
- (7) Consists of (i) 11,207 shares of Common Stock and (ii) 22,414 shares of Common Stock issuable upon the exercise of the Inducement Warrants, the latter of which are subject to a beneficial ownership limitation that prohibits Kingsbrook Opportunities Master Fund LP (“Kingsbrook Opportunities”) from exercising any portion of the Inducement Warrants to the extent that, following such exercise, Kingsbrook Opportunities would beneficially own greater than 4.99% of the outstanding shares of Common Stock. Kingsbrook Partners LP (“Kingsbrook Partners”) is the investment manager of Kingsbrook Opportunities and consequently has voting control and investment discretion over securities held by Kingsbrook Opportunities. Kingsbrook Opportunities GP LLC (“Opportunities GP”) is the general partner of Kingsbrook Opportunities and may be considered the beneficial owner of any securities deemed to be beneficially owned by Kingsbrook Opportunities. KB GP LLC (“GP LLC”) is the general partner of Kingsbrook Partners and may be considered the beneficial owner of any securities deemed to be beneficially owned by Kingsbrook Partners. Ari J. Storch, Adam J. Chill and Scott M. Wallace are the sole managing members of Opportunities GP and GP LLC and as a result may be considered beneficial owners of any securities deemed beneficially owned by Opportunities GP and GP LLC. Each of Kingsbrook Partners, Opportunities GP, GP LLC and Messrs. Storch, Chill and Wallace disclaim beneficial ownership of these securities. The address of Kingsbrook Partners is 689 Fifth Avenue, 12th Floor, New York, NY 10022.
- (8) The Selling Stockholder is affiliated with H.C. Wainwright & Co., LLC, a registered broker dealer with a registered address of H.C. Wainwright & Co., LLC, 430 Park Ave, 3rd Floor, New York, NY 10022, and has sole voting and dispositive power over the securities held. The number of shares to be sold in this offering consists of (i) shares of Common Stock issuable upon exercise of Inducement Placement Agent Warrants, which were received as compensation for our private placement, and (ii) shares of Common Stock issuable upon exercise of previously held warrants. The Selling Stockholder acquired the Inducement Placement Agent Warrants in the ordinary course of business and, at the time the Inducement Placement Agent Warrants were acquired, the selling stockholder had no agreement or understanding, directly or indirectly, with any person to distribute such securities.

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Material Relationships with the Selling Stockholders

Below is a description of material relationships in the past three years between the Company, its predecessors or affiliates and the selling stockholders.

2024 Offerings

On May 21, 2024, we signed a purchase agreement (the “2024 Purchase Agreement”) with certain institutional investors identified on the signature pages thereto (the “Purchasers”) pursuant to which we issued and sold 740,000 shares of Common Stock in a registered direct offering at an offering price of \$4.35 per share. In a concurrent private placement, we also issued and sold to the Purchasers warrants to purchase one share of Common Stock for each share of common stock purchased in the registered direct offering (the “2024 Common Warrants”). The 2024 Common Warrants have an exercise price equal to \$4.35, are immediately exercisable and will expire on the date that is five years following the date of issuance. Each of the Holders participated in the registered direct offering and the concurrent private placement.

Warrant Exercise

On February 25, 2025, we entered into Inducement Letters with each of the Holders pursuant to which the Holders each agreed to exercise for cash their Existing Warrants (i.e., their 2024 Common Warrants) to purchase an aggregate of 302,069 shares of Common Stock, in the aggregate, at a reduced exercise price of \$2.27 per share, in exchange for our agreement to issue the Inducement Warrants on the terms described above to purchase up to 604,138 shares of Common Stock. We received aggregate gross proceeds of approximately \$0.7 million from the exercise of the Existing Warrants by the Holders, before deducting placement agent fees and offering expenses.

PLAN OF DISTRIBUTION

We are registering the shares of Common Stock issuable upon exercise of the 2025 Inducement Warrants to permit the resale of these shares of Common Stock by the holders of the 2025 Inducement Warrants from time to time after the date of this prospectus. We will not receive any of the proceeds from the sale by the Selling Stockholders of the shares of Common Stock. We will bear all fees and expenses incident to our obligation to register the shares of Common Stock.

The Selling Stockholders may sell all or a portion of the shares of Common Stock beneficially owned by them and offered hereby from time to time directly or through one or more underwriters, broker-dealers or agents. If the shares of Common Stock are sold through underwriters or broker-dealers, the Selling Stockholders will be responsible for underwriting discounts or commissions or agent’s commissions. The shares of Common Stock may be sold in one or more transactions at fixed prices, at prevailing market prices at the time of the sale, at varying prices determined at the time of sale, or at negotiated prices. These sales may be effected in transactions, which may involve crosses or block transactions:

- on any national securities exchange or quotation service on which the securities may be listed or quoted at the time of sale;
- in the over-the-counter market;
- in transactions otherwise than on these exchanges or systems or in the over-the-counter market;
- through the writing of options, whether such options are listed on an options exchange or otherwise;
- through ordinary brokerage transactions and transactions in which the broker-dealer solicits purchasers;

- through block trades in which the broker-dealer will attempt to sell the securities as agent but may position and resell a portion of the block as principal to facilitate the transaction;
- through purchases by a broker-dealer as principal and resale by the broker-dealer for its account;
- through an exchange distribution in accordance with the rules of the applicable exchange;
- through privately negotiated transactions;
- through settlement of short sales effected after the effective date of the registration statement of which this prospectus is a part;
- in transactions through broker-dealers that agree with the Selling Stockholders to sell a specified number of such securities at a stipulated price per security;
- through the writing or settlement of options or other hedging transactions, whether through an options exchange or otherwise;
- through a combination of any such methods of sale; and
- through any other method permitted pursuant to applicable law.

The Selling Stockholders may also sell securities under Rule 144 or any other exemption from registration under the Securities Act, if available, rather than under this prospectus.

If the Selling Stockholders effect such transactions by selling shares of Common Stock to or through underwriters, broker-dealers or agents, such underwriters, broker-dealers or agents may receive commissions in the form of discounts, concessions or commissions from the Selling Stockholders or commissions from purchasers of the shares of Common Stock for whom they may act as agent or to whom they may sell as principal (which discounts, concessions or commissions as to particular underwriters, broker-dealers or agents may be in excess of those customary in the types of transactions involved). In connection with sales of the shares of Common Stock or otherwise, the Selling Stockholders may enter into hedging transactions with broker-dealers, which may in turn engage in short sales of the shares of Common Stock in the course of hedging in positions they assume. The Selling Stockholders may also sell shares of Common Stock short and deliver shares of Common Stock covered by this prospectus to close out short positions and to return borrowed shares in connection with such short sales. The Selling Stockholders may also loan or pledge shares of Common Stock to broker-dealers that in turn may sell such shares.

The Selling Stockholders may pledge or grant a security interest in some or all of the 2025 Inducement Warrants or shares of Common Stock owned by them and, if they default in the performance of their secured obligations, the pledgees or secured parties may offer and sell the shares of Common Stock from time to time pursuant to this prospectus or any amendment to this prospectus under Rule 424(b)(3) or other applicable provision of the Securities Act, amending, if necessary, the list of Selling Stockholders to include the pledgee, transferee or other successors in interest as Selling Stockholders under this prospectus. The Selling Stockholders also may transfer and donate the shares of Common Stock in other circumstances in which case the transferees, donees, pledgees or other successors in interest will be the selling beneficial owners for purposes of this prospectus.

The Selling Stockholders and any broker-dealer participating in the distribution of the shares of Common Stock may be deemed to be “underwriters” within the meaning of the Securities Act, and any commission paid, or any discounts or concessions allowed to, any such broker-dealer may be deemed to be underwriting commissions or discounts under the Securities Act. At the time a particular offering of the shares of Common Stock is made, a prospectus supplement, if required, will be distributed which will set forth the aggregate amount of shares of common stock being offered and the terms of the offering, including the name or names of any broker-dealers or agents, any discounts, commissions and other terms constituting compensation from the Selling Stockholders and any discounts, commissions or concessions allowed or reallocated or paid to broker-dealers.

Under the securities laws of some states, the shares of Common Stock may be sold in such states only through registered or licensed brokers or dealers. In addition, in some states the shares of Common Stock may not be sold unless such shares have been registered or qualified for sale in such state or an exemption from registration or qualification is available and is complied with.

There can be no assurance that any Selling Stockholder will sell any or all of the shares of Common Stock registered pursuant to the registration statement, of which this prospectus forms a part.

The Selling Stockholders and any other person participating in such distribution will be subject to applicable provisions of the Exchange Act and the rules and regulations thereunder, including, without limitation, Regulation M of the Exchange Act, which may limit the timing of purchases and sales of any of the shares of Common Stock by the Selling Stockholders and any other participating person. Regulation M may also restrict the ability of any person engaged in the distribution of the shares of Common Stock to engage in market-making activities with respect to the shares of Common Stock. All of the foregoing may affect the marketability of the shares of Common Stock and the ability of any person or entity to engage in market-making activities with respect to the shares of Common Stock.

We have agreed to pay all fees and expenses we incur incident to the registration of the shares being offered under this prospectus, including, without limitation, Securities and Exchange Commission filing fees and expenses of compliance with state securities or “blue sky” laws; provided, however, that a Selling Stockholder will pay all underwriting discounts and selling commissions, if any.

Once sold under the registration statement, of which this prospectus forms a part, the shares of Common Stock will be freely tradable in the hands of persons other than our affiliates.

DESCRIPTION OF CAPITAL STOCK

The following summary describes the material terms of our capital stock. The summary is qualified in its entirety by reference to our certificate of incorporation, certificates of designation and our bylaws, each as amended and/or restated to date, copies of which are filed as exhibits to our annual report on Form 10-K for the year ended December 31, 2024, filed with the SEC on February 21, 2025.

Authorized Shares

Our authorized shares consist of 250,000,000 shares of Common Stock and 15,000,000 shares of preferred stock, \$0.001 par value per share. Our Common Stock is registered under Section 12(b) of the Exchange Act and is listed on the Nasdaq under the trading symbol “GTBP.”

On February 2, 2024, the Company effectuated a reverse stock-split of its Common Stock at a ratio of 1-for-30. The Common Stock began trading on a reverse stock-split-adjusted basis on The Nasdaq Capital Market on February 5, 2024 under the existing trading symbol “GTBP.”

As a result of the reverse stock-split, every thirty (30) shares of issued and outstanding Common Stock were automatically combined into one issued and outstanding share of Common Stock, without any change in the par value per share. No fractional shares will be issued in connection with the reverse stock split. Stockholders who otherwise would be entitled to receive fractional shares of Common Stock will be entitled to receive their pro-rata portion of the net proceeds obtained from the aggregation and sale by the exchange agent of the fractional shares resulting from the reverse stock-split (reduced by any customary brokerage fees, commission and other expenses). The number of authorized shares of Common Stock remains unchanged at 250,000,000 shares.

Common Stock

Holders of our Common Stock are entitled to one vote for each share of Common Stock held of record for the election of directors and on all matters submitted to a vote of stockholders. Holders of our Common Stock are entitled to receive dividends ratably, if any, as may be declared by our board of directors (“Board”) out of legally available funds, subject to any preferential dividend rights of any preferred stock then outstanding. In the event of our dissolution, liquidation or winding up, holders of our Common Stock are entitled to share ratably in our net assets legally available after the payment of all of our debts and other liabilities, subject to the liquidation preferences of any preferred stock then outstanding. Holders of our Common Stock have no preemptive, subscription, redemption or conversion rights. The rights, preferences and privileges of holders of Common Stock are subject to, and may be adversely affected by, the rights of the holders of shares of any series of preferred stock currently outstanding or that we may designate and issue in the future. All outstanding shares of our Common Stock are fully paid and non-assessable. Except as described below in “Anti-Takeover Provisions Under Our Charter and Bylaws and Delaware Law,” holders of a majority of the outstanding shares of stock entitled to vote shall constitute a quorum for the transaction of business, and a vote of the majority of the voting power represented at such meeting at which a quorum is generally required to take action under our certificate of incorporation and bylaws.

Preferred Stock

Our Board is authorized, without action by the stockholders, to designate and issue up to 15,000,000 shares of preferred stock in one or more series. In the past the Board designated series lettered A through K and issued shares in those series (other than Series K). As of the date of this prospectus, only preferred shares in the series designated C have shares issued and outstanding. Our Board can fix or alter the rights, preferences and privileges of the shares of each series and any of its qualifications, limitations or restrictions, including dividend rights, conversion rights, voting rights, terms of redemption, liquidation preferences and the number of shares constituting a class or series. The issuance of preferred stock could, under certain circumstances, result in one or more of the following adverse effects:

- decreasing the market price of our Common Stock;
- restricting dividends on our Common Stock;
- diluting the voting power of our Common Stock;
- impairing the liquidation rights of our Common Stock; or
- delaying or preventing a change in control of us without further action by our stockholders.

Our Board will make any determination to issue such shares based on its judgment as to our best interests and the best interests of our stockholders.

Series C Preferred Stock

For a discussion of the terms of our Series C Preferred Stock, see Note 6 to our audited financial statements, Stockholders’ Equity (Deficit), incorporated in this prospectus by reference.

Warrants

Series A Inducement Warrants for the purchase of up to 302,069 shares of Common Stock were issued pursuant to the Inducement Letters and entitle Holders thereof to purchase such shares of Common Stock at a price of \$2.02 per share, subject to adjustment as discussed below, terminating at 5:00 p.m., New York City time, on the fifth anniversary of the date of issuance. Series B Inducement Warrants for the purchase of up to 302,069 shares of Common Stock were issued pursuant to the Inducement Letters and entitle Holders thereof to purchase such shares of Common Stock at a price of \$2.02 per share, subject to adjustment as discussed below, terminating at 5:00 p.m., New York City time, on the 18-month anniversary of the date of issuance. In connection with the transactions contemplated under the Inducement Letters, we issued Inducement Placement Agent Warrants to purchase up to 21,145 shares of Common Stock at a price of \$2.8375 per share, subject to adjustment as discussed below, terminating at 5:00 p.m., New York City time, on the fifth anniversary of the date of issuance.

Common warrants for the purchase of up to 740,000 shares of Common Stock were issued pursuant to the 2024 Purchase Agreement in registered form and entitle the registered holder to purchase one share of our Common Stock at a price equal to \$4.35 per share, subject to adjustment as discussed below, terminating at 5:00 p.m., New York City time, on the fifth anniversary of the date of issuance. Also pursuant to the 2024 Purchase Agreement, we had an additional number of outstanding placement agent warrants for the purchase of up to 88,800 shares of Common Stock at an exercise price of \$5.4375. (the “2024 Placement Agent Warrants,” and together with the 2024 Common Warrants, the “2024 Warrants”).

Common warrants to purchase up to an aggregate of 216,667 shares of Common Stock (the “2023 Common Warrants”), pre-funded warrants to purchase up to 96,667 shares of Common Stock (the “Pre-Funded Warrants”), and placement agent warrants to purchase up to 13,000 of Common Stock (the “2023 Placement Agents Warrants,” and together with the 2023 Common Warrants and Pre-Funded Warrants, the “2023 Warrants”) were issued pursuant to a purchase agreement dated December 30, 2022 (the “2022 Purchase Agreement”). The 2023 Common Warrants have an exercise price equal to \$30.00 per share, are exercisable commencing six months following issuance, and have a term of exercise equal to five years following the initial issuance date. The Pre-Funded Warrants had an exercise price of \$0.003 per share, are immediately exercisable and could be exercised at any time after their original issuance until such Pre-Funded Warrants were exercised in full. The 2023 Placement Agents Warrants have an exercise price equal to \$37.50 per share, are exercisable commencing six months following issuance, and have a term of exercise equal to five years following the initial issuance date. The shares sold pursuant to the 2022 Purchase Agreement and the accompanying 2023 Common Warrants were sold at an offering price of \$30.00 per share and accompanying 2023 Common Warrant, and the Pre-Funded Warrants and 2023 Common Warrants were sold at an offering price of \$29.997 per Pre-Funded Warrant and accompanying 2023 Common Warrant.

Holders of 2023 Warrants, 2024 Warrants and 2025 Inducement Warrants (together, the “Warrants”) may exercise such warrants on a “cashless” basis if an effective registration statement is not available with respect to the offering of shares of Common Stock upon exercise of such Warrant. In such event, the Holder may elect instead to receive upon such exercise (either in whole or in part) the net number of shares of Common Stock determined according to a formula set forth in the Warrants. The exercise price and number of shares of Common Stock issuable upon exercise of the Warrants may be adjusted in certain circumstances, including in the event of a stock dividend, extraordinary dividend on or recapitalization, reorganization, merger or consolidation. The Warrants may be exercised by delivery of a notice of exercise and the aggregate exercise price (assuming no cashless exercise has been elected if an effective registration statement is not available with respect to the offering of shares of Common Stock upon exercise of such Warrant) to us as specified in such Warrant. Holders of Warrants do not have the rights or privileges of holders of Common Stock and any voting rights until they exercise their Warrants and receive shares of Common Stock. After the issuance of shares of Common Stock upon exercise of the Warrants, each holder will be entitled to one vote for each share held of record on all matters to be voted on by stockholders.

Certain provisions of Delaware law, our certificate of incorporation and our bylaws, as amended and/or restated to date, contain provisions that could have the effect of delaying, deferring or discouraging another party from acquiring control of us. These provisions, which are summarized below, may have the effect of discouraging coercive takeover practices and inadequate takeover bids. These provisions are also designed, in part, to encourage persons seeking to acquire control of us to first negotiate with our Board. We believe that the benefits of increased protection of our potential ability to negotiate with an unfriendly or unsolicited acquirer outweigh the disadvantages of discouraging a proposal to acquire us because negotiation of these proposals could result in an improvement of their terms.

Amended and Restated Certificate of Incorporation

Undesignated Preferred Stock. Our Board has the ability to issue preferred stock with voting or other rights or preferences that could impede the success of any attempt to change control of us. These and other provisions may have the effect of deferring hostile takeovers or delaying changes in control or management of our company.

Special Meetings of Stockholders. Our bylaws provide that special meetings of our stockholders may be called only by our Chairman, President or a majority of the entire Board, thus prohibiting a stockholder from calling a special meeting. This provision might delay the ability of our stockholders to force consideration of a proposal or for stockholders controlling a majority of our capital stock to take any action, including the removal of directors.

Board Vacancies Filled Only by Majority of Directors. Vacancies and newly created seats on our Board may be filled only by a majority of the directors then in office. Only our Board may determine the number of directors on our board. The inability of stockholders to determine the number of directors or to fill vacancies or newly created seats on our Board makes it more difficult to change the composition of our Board, but these provisions promote a continuity of existing management.

No Cumulative Voting. The Delaware General Corporation Law (“DGCL”) provides that stockholders are not entitled to the right to cumulate votes in the election of directors unless our certificate of incorporation provides otherwise. Our certificate of incorporation and bylaws do not expressly provide for cumulative voting.

Directors Removed Only by Special Meeting of Stockholders. A director can be removed only by the affirmative vote of a majority of the votes of the issued and outstanding stock entitled to vote for the election of directors of our Company given at a special meeting of the stockholders called and held for this purpose.

Amendment of Charter Provisions. In order to amend certain of the above provisions in our certificate of incorporation and our bylaws, the Board is expressly authorized to adopt, alter or repeal the bylaws, subject to the rights of the stockholders entitled to vote. Stockholders can vote at any stockholder meeting and repeal, alter, or amend the bylaws by the affirmative vote of a majority of the stockholders entitled to vote in such meeting.

Delaware Anti-takeover Statute

We are subject to Section 203 of the DGCL. In general, Section 203 prohibits a publicly held Delaware corporation from engaging in a “business combination” with an “interested stockholder” for a period of three years after the date of the transaction in which the person became an interest stockholder, unless the business combination is approved in a prescribed manner. A “business combination” includes mergers, asset sales and other transactions in which the interested stockholder receives or could receive a financial benefit on other than a pro rata basis with other stockholders. An “interested stockholder” is a person who, together with affiliates and associates, owns, or within three years did own, 15% or more of the corporation’s outstanding voting stock. This provision has an anti-takeover effect with respect to transactions not approved in advance by our Board, including discouraging takeover attempts that might result in a premium over the market price for the shares of our market price. With approval of our stockholders, we could amend our certificate of incorporation in the future to avoid the restrictions imposed by this anti-takeover law.

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The provisions of Delaware law and our certificate of incorporation could have the effect of discouraging others from attempting hostile takeovers and, as a consequence, they may also inhibit temporary fluctuations in the market price of our Common Stock that often result from actual or rumored hostile takeover attempts. These provisions may also have the effect of preventing changes in our management. It is possible that these provisions could make it more difficult to accomplish transactions that stockholders may otherwise deem to be in their best interests.

Transfer Agent and Registrar

Our transfer agent and registrar for our capital stock is Computershare. The transfer agent’s address is 8742 Lucent Blvd., Suite 225, Highland Ranch, CO 80129, and its telephone number is (303) 262-0600.

Existing Trading Market

Our Common Stock is listed on the Nasdaq Capital Market under the symbol “GTBP.” The closing sale price of our Common Stock on the Nasdaq Capital Market on March 5, 2025, was \$2.43 per share.

LEGAL MATTERS

The validity of the shares of Common Stock being offered hereby will be passed upon for us by Stubbs Alderton & Markiles, LLP, Sherman Oaks, California.

EXPERTS

The consolidated balance sheets of GT Biopharma, Inc. as of December 31, 2024 and 2023, and the related consolidated statements of comprehensive loss, stockholders’ equity (deficit) and cash flows of GT Biopharma, Inc. for the years ended December 31, 2024 and 2023, incorporated by reference in this prospectus have been so incorporated in reliance on the reports of Weinberg and Company, P.A., an independent registered public accounting firm, given on the authority of said firm as experts in auditing and accounting.

WHERE YOU CAN FIND MORE INFORMATION

We file reports, proxy statements and other information with the SEC. The SEC maintains a website that contains reports, proxy and information statements and other information about issuers, such as us, who file electronically with the SEC. The address of that website is <http://www.sec.gov>.

Our website address is <https://www.gtbiopharma.com>. The information contained in, or accessible through, our website, however, is not, and should not be deemed to be, a part of this prospectus.

This prospectus and any prospectus supplement are part of a registration statement that we filed with the SEC and do not contain all of the information in the registration statement. The full registration statement may be obtained from the SEC or us, as provided below. Statements in this prospectus or any prospectus supplement about these documents are summaries and each statement is qualified in all respects by reference to the document to which it refers. You should refer to the actual documents for a more complete description of the relevant matters. You may inspect a copy of the registration statement through the SEC’s website, as provided above.

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INCORPORATION OF CERTAIN INFORMATION BY REFERENCE

The SEC allows us to incorporate by reference the information we file with it, which means that we can disclose important information to you by referring you to another document that we have filed separately with the SEC. You should read the information incorporated by reference because it is an important part of this prospectus. We incorporate by reference the following information or documents that we have filed with the SEC (Commission File No. 001-39256):

- our annual report on [Form 10-K](#) for our fiscal year ended December 31, 2024 (filed on February 21, 2025);
- our current reports on Form 8-K, dated [January 27, 2025](#) (filed on January 27, 2025), and dated [February 25, 2025](#) (filed on February 26, 2025); and
- the description of our Common Stock contained in our registration statement on [Form 8-A](#), as filed with the SEC on February 8, 2021, including any amendments or reports filed for the purpose of updating such description.

Any information in any of the foregoing documents will automatically be deemed to be modified or superseded to the extent that information in this prospectus or in a later filed document that is incorporated or deemed to be incorporated herein by reference modifies or replaces such information.

We also incorporate by reference any future filings (other than current reports furnished under Item 2.02 or Item 7.01 of Form 8-K and exhibits filed on such form that are related to such items) made with the SEC pursuant to Sections 13(a), 13(c), 14 or 15(d) of the Exchange Act, including all such reports filed after the date of the initial registration statement and prior to effectiveness of the registration statement, until we file a post-effective amendment that indicates the termination of the offering of the securities made by this prospectus. Information in such future filings updates and supplements the information provided in this prospectus. Any statements in any such future filings will automatically be deemed to modify and supersede any information in any document we previously filed with the SEC that is incorporated or deemed to be incorporated herein by reference to the extent that statements in the later filed document modify or replace such earlier statements.

We will furnish without charge to each person to whom a copy of this prospectus is delivered, upon written or oral request, a copy of the documents that have been incorporated by reference into this prospectus, including exhibits to these documents. You should direct any requests for copies to:

GT Biopharma, Inc.
505 Montgomery Street, 10th Floor
San Francisco, CA 94111
Attn: Secretary
Telephone: (415) 919-4040

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625,283 Shares of Common Stock

PROSPECTUS

[•], 2025

PART II

INFORMATION NOT REQUIRED IN PROSPECTUS

ITEM 14. OTHER EXPENSES OF ISSUANCE AND DISTRIBUTION.

The following table sets forth the estimated costs and expenses, other than the underwriting discounts and commissions payable by the Registrant in connection with the offering of the securities being registered. All amounts are estimates, except the SEC registration fee.

SEC registration fee	\$	215.40
Accounting fees and expenses		*
Legal fees and expenses		*
Transfer Agent fees and expenses		*
Printing and related fees		*
Miscellaneous		*
Total	\$	*

* Except for the SEC registration fee, estimated fees and expenses are not presently known. The foregoing sets forth the general categories of fees and expenses (other than

underwriting discounts and commissions) that we anticipate we will incur in connection with the offering of shares of Common Stock under this registration statement. To the extent required, any applicable prospectus supplement will set forth the estimated aggregate amount of expenses payable in connection with the offering of shares of Common Stock under this registration statement.

ITEM 15. INDEMNIFICATION OF DIRECTORS AND OFFICERS.

Section 145 of the DGCL provides that a corporation may indemnify directors and officers as well as other employees and individuals against expenses (including attorneys' fees), judgments, fines and amounts paid in settlement actually and reasonably incurred by such person in connection with any threatened, pending or completed actions, suits or proceedings in which such person is made a party by reason of such person being or having been a director, officer, employee or agent to us. The DGCL provides that Section 145 is not exclusive of other rights to which those seeking indemnification may be entitled under any bylaw, agreement, vote of stockholders or disinterested directors or otherwise. Our certificate of incorporation provides for indemnification by us of our directors, officers and employees to the fullest extent permitted by the DGCL.

Section 102(b)(7) of the DGCL permits a corporation to provide in its certificate of incorporation that a director of the corporation shall not be personally liable to the corporation or its stockholders for monetary damages for breach of fiduciary duty as a director, except for liability (i) for any breach of the director's duty of loyalty to the corporation or its stockholders, (ii) for acts or omissions not in good faith or which involve intentional misconduct or a knowing violation of law, (iii) for unlawful payments of dividends or unlawful stock repurchases, redemptions or other distributions or (iv) for any transaction from which the director derived an improper personal benefit. Our certificate of incorporation provides for such limitation of liability.

We have entered into separate indemnification agreements with our directors and executive officers.

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ITEM 16. EXHIBITS.

Exhibit Number	Exhibit Description	Form	Date	Number	Filed Herewith
4.1	Restated Certificate of Incorporation as filed in Delaware September 10, 1996 and as thereafter amended through March 1, 2002	10-KSB	04/01/2002	3.A	
4.2	Certificate of Amendment to the Restated Certificate of Incorporation of GT Biopharma, Inc., dated February 9, 2011	10-K	03/31/2011	3.2	
4.3	Certificate of Amendment to the Restated Certificate of Incorporation of GT Biopharma, Inc., effective as of July 19, 2017	8-K/A	03/15/2018	3.1	
4.4	Certificate of Amendment to the Restated Certificate of Incorporation of GT Biopharma, Inc., effective as of February 10, 2021	8-K	02/11/2021	3.1	
4.5	Certificate of Amendment to the Restated Certificate of Incorporation of GT Biopharma, Inc., effective June 13, 2022	10-K	03/30/2023	3.5	
4.6	Amended and Restated Bylaws of GT Biopharma, Inc., effective November 3, 2022	8-K	11/09/2022	3.1	
4.7	Certificate of Amendment of Restated Certificate of Incorporation of GT Biopharma, Inc., effective February 1, 2024	8-K	02/01/2024	3.1	
4.8	Form of Series A Inducement Warrant	8-K	02/26/2025	4.1	
4.9	Form of Series B Inducement Warrant	8-K	02/26/2025	4.2	
4.10	Form of Inducement Placement Agent Warrants				X
5.1	Opinion of Counsel				X
23.1	Consent of Weinberg & Company, P.A.				X
24.1	Power of Attorney (included on signature page)				X
107	Filing fee table.				X

ITEM 17. UNDERTAKINGS.

The undersigned Registrant hereby undertakes:

(1) To file, during any period in which offers or sales are being made, a post-effective amendment to this registration statement to:

(i) include any prospectus required by Section 10(a)(3) of the Securities Act of 1933;

(ii) reflect in the prospectus any facts or events arising after the effective date of the registration statement (or the most recent post-effective amendment thereof) which, individually or in the aggregate, represent a fundamental change in the information set forth in the registration statement; and

(iii) include any material information with respect to the plan of distribution not previously disclosed in the registration statement or any material change to such information in the registration statement;

provided, however, that paragraphs (1)(i), (1)(ii) and (1)(iii) above do not apply if the information required to be included in a post-effective amendment by those paragraphs is contained in reports filed with or furnished to the Commission by the Registrant pursuant to Section 13 or Section 15(d) of the Securities Exchange Act of 1934 that are incorporated by reference in the registration statement, or is contained in a form of prospectus filed pursuant to Rule 424(b) that is part of the registration statement.

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(2) That, for the purpose of determining any liability under the Securities Act of 1933, each such post-effective amendment shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial *bona fide* offering thereof.

(3) To remove from registration by means of a post-effective amendment any of the securities being registered which remain unsold at the termination of the offering.

(4) That, for the purpose of determining liability under the Securities Act of 1933 to any purchaser:

(i) Each prospectus filed by the Registrant pursuant to Rule 424(b)(3) shall be deemed to be part of the registration statement as of the date the filed prospectus was deemed part of and included in the registration statement; and

(ii) Each prospectus required to be filed pursuant to Rule 424(b)(2), (b)(5), or (b)(7) as part of a registration statement in reliance on Rule 430B relating to an offering made pursuant to Rule 415(a)(1)(i), (vii), or (x) for the purpose of providing the information required by Section 10(a) of the Securities Act of 1933 shall be deemed to

be part of and included in the registration statement as of the earlier of the date such form of prospectus is first used after effectiveness or the date of the first contract of sale of securities in the offering described in the prospectus. As provided in Rule 430B, for liability purposes of the issuer and any person that is at that date an underwriter, such date shall be deemed to be a new effective date of the registration statement relating to the securities in the registration statement to which that prospectus relates, and the offering of such securities at that time shall be deemed to be the initial *bona fide* offering thereof. *Provided, however*, that no statement made in a registration statement or prospectus that is part of the registration statement or made in a document incorporated or deemed incorporated by reference into the registration statement or prospectus that is part of the registration statement will, as to a purchaser with a time of contract of sale prior to such effective date, supersede or modify any statement that was made in the registration statement or prospectus that was part of the registration statement or made in any such document immediately prior to such effective date.

(5) That, for the purpose of determining liability of the Registrant under the Securities Act of 1933 to any purchaser in the initial distribution of the securities, the undersigned Registrant undertakes that in a primary offering of securities of the undersigned Registrant pursuant to this registration statement, regardless of the underwriting method used to sell the securities to the purchaser, if the securities are offered or sold to such purchaser by means of any of the following communications, the undersigned Registrant will be a seller to the purchaser and will be considered to offer or sell such securities to such purchaser:

(i) Any preliminary prospectus or prospectus of the undersigned Registrant relating to the offering required to be filed pursuant to Rule 424;

(ii) Any free writing prospectus relating to the offering prepared by or on behalf of the undersigned Registrant or used or referred to by the undersigned Registrant;

(iii) The portion of any other free writing prospectus relating to the offering containing material information about the undersigned Registrant or its securities provided by or on behalf of the undersigned Registrant; and

(iv) Any other communication that is an offer in the offering made by the undersigned Registrant to the purchaser.

(6) That, for purposes of determining any liability under the Securities Act of 1933, each filing of the Registrant's annual report pursuant to Section 13(a) or 15(d) of the Securities Exchange Act of 1934 (and, where applicable, each filing of an employee benefit plan's annual report pursuant to Section 15(d) of the Securities Exchange Act of 1934) that is incorporated by reference in the registration statement shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial *bona fide* offering thereof.

Insofar as indemnification for liabilities arising under the Securities Act of 1933, as amended (the "Securities Act"), may be permitted to directors, officers and controlling persons of the Registrant pursuant to the foregoing provisions, or otherwise, the Registrant has been advised that in the opinion of the Securities and Exchange Commission such indemnification is against public policy as expressed in the Securities Act and is, therefore unenforceable. In the event that a claim for indemnification against such liabilities (other than the payment by the Registrant of expenses incurred or paid by a director, officer or controlling person of the Registrant in the successful defense of any action, suit or proceeding) is asserted by such director, officer or controlling person in connection with the securities being registered, the Registrant will, unless in the opinion of its counsel the matter has been settled by controlling precedent, submit to a court of appropriate jurisdiction the question whether such indemnification by it is against public policy as expressed in the Securities Act and will be governed by the final adjudication of such issue.

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SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, as amended, the Registrant certifies that it has reasonable grounds to believe that it meets all of the requirements for filing on Form S-3 and has duly caused this Registration Statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of Los Angeles, State of California, on March 6, 2025.

GT BIOPHARMA, INC.

By: /s/ Michael Breen
Michael Breen
Interim Chief Executive Officer

POWER OF ATTORNEY

KNOW ALL PERSONS BY THESE PRESENTS that each individual whose signature appears below constitutes and appoints Michael Breen and Alan Urban, and each of them, his true and lawful attorneys-in-fact and agents with full power of substitution, for him and in his name, place and stead, in any and all capacities, to sign any and all amendments (including post-effective amendments) to this Registration Statement, and to sign any registration statement for the same offering covered by the Registration Statement that is to be effective upon filing pursuant to Rule 462(b) promulgated under the Securities Act of 1933, as amended, and all post-effective amendments thereto, and to file the same, with all exhibits thereto and all documents in connection therewith, with the Securities and Exchange Commission, granting unto said attorneys-in-fact and agents, and each of them, full power and authority to do and perform each and every act and thing requisite and necessary to be done in and about the premises, as fully to all intents and purposes as he might or could do in person, hereby ratifying and confirming all that said attorneys-in-fact and agents or any of them, or his or their substitute or substitutes, may lawfully do or cause to be done or by virtue hereof. This power of attorney shall be governed by and construed in accordance with the laws of the State of Delaware and applicable federal securities laws.

Pursuant to the requirements of the Securities Act of 1933, this Registration Statement has been signed by the following persons in the capacities and on the dates stated.

<u>Signature</u>	<u>Title</u>	<u>Date</u>
<u>/s/ Michael Breen</u> Michael Breen	Executive Chairman of the Board and Interim Chief Executive Officer (Principal Executive Officer)	March 6, 2025
<u>/s/ Alan Urban</u> Alan Urban	Chief Financial Officer and Secretary (Principal Financial and Accounting Officer)	March 6, 2025
<u>/s/ Charles J. Casamento</u> Charles J. Casamento	Director	March 6, 2025
<u>/s/ Rajesh Shrotriya</u> Rajesh Shrotriya, M.D.	Director	March 6, 2025
<u>/s/ Bruce Wendel</u> Bruce Wendel	Director	March 6, 2025

NEITHER THIS SECURITY NOR THE SECURITIES FOR WHICH THIS SECURITY IS EXERCISABLE HAVE BEEN REGISTERED WITH THE SECURITIES AND EXCHANGE COMMISSION OR THE SECURITIES COMMISSION OF ANY STATE IN RELIANCE UPON AN EXEMPTION FROM REGISTRATION UNDER THE SECURITIES ACT OF 1933, AS AMENDED (THE “SECURITIES ACT”), AND, ACCORDINGLY, MAY NOT BE OFFERED OR SOLD EXCEPT PURSUANT TO AN EFFECTIVE REGISTRATION STATEMENT UNDER THE SECURITIES ACT OR PURSUANT TO AN AVAILABLE EXEMPTION FROM, OR IN A TRANSACTION NOT SUBJECT TO, THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT AND IN ACCORDANCE WITH APPLICABLE STATE SECURITIES LAWS. THIS SECURITY AND THE SECURITIES ISSUABLE UPON EXERCISE OF THIS SECURITY MAY BE PLEDGED IN CONNECTION WITH A BONA FIDE MARGIN ACCOUNT OR OTHER LOAN SECURED BY SUCH SECURITIES.

PLACEMENT AGENT COMMON STOCK PURCHASE WARRANT

GT BIOPHARMA, INC.

Warrant No.: [●]
Warrant Shares: [●]

Initial Exercise Date: February 26, 2025
Issue Date: February 26, 2025

THIS PLACEMENT AGENT COMMON STOCK PURCHASE WARRANT (the “Warrant”) certifies that, for value received, [NAME] or its assigns (the “Holder”) is entitled, upon the terms and subject to the limitations on exercise and the conditions hereinafter set forth, at any time on or after February 26, 2025 (the “Initial Exercise Date”) and on or prior to 5:00 p.m. (New York City time) on February 26, 2030 (the “Termination Date”) but not thereafter, to subscribe for and purchase from GT Biopharma, Inc., a Delaware corporation (the “Company”), up to [NUMBER] shares (as subject to adjustment hereunder, the “Warrant Shares”) of Common Stock. The purchase price of one share of Common Stock under this Warrant shall be equal to the Exercise Price, as defined in Section 2(b). This Warrant is being issued pursuant to that certain Engagement Agreement by and between the Company and H.C. Wainwright & Co., LLC, dated as of February 13, 2025 (the “Engagement Agreement”).

Section 1. Definitions. In addition to the terms defined elsewhere in this Warrant, the following terms have the meanings indicated in this Section 1:

“Affiliate” means any Person that, directly or indirectly through one or more intermediaries, controls or is controlled by or is under common control with a Person, as such terms are used in and construed under Rule 405 under the Securities Act.

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“Bid Price” means, for any date, the price determined by the first of the following clauses that applies: (a) if the Common Stock is then listed or quoted on a Trading Market, the bid price of the Common Stock for the time in question (or the nearest preceding date) on the Trading Market on which the Common Stock is then listed or quoted as reported by Bloomberg L.P. (based on a Trading Day from 9:30 a.m. (New York City time) to 4:02 p.m. (New York City time)), (b) if OTCQB or OTCQX is not a Trading Market, the volume weighted average price of the Common Stock for such date (or the nearest preceding date) on OTCQB or OTCQX as applicable, (c) if the Common Stock is not then listed or quoted for trading on OTCQB or OTCQX and if prices for the Common Stock are then reported on the Pink Open Market (or a similar organization or agency succeeding to its functions of reporting prices), the most recent bid price per share of the Common Stock so reported, or (d) in all other cases, the fair market value of a share of Common Stock as determined by an independent appraiser selected in good faith by the Holders of a majority in interest of the Warrants then outstanding and reasonably acceptable to the Company, the fees and expenses of which shall be paid by the Company.

“Board of Directors” means the board of directors of the Company.

“Business Day” means any day other than Saturday, Sunday or other day on which commercial banks in The City of New York are authorized or required by law to remain closed; provided, however, for clarification, commercial banks shall not be deemed to be authorized or required by law to remain closed due to “stay at home”, “shelter-in-place”, “non-essential employee” or any other similar orders or restrictions or the closure of any physical branch locations at the direction of any governmental authority so long as the electronic funds transfer systems (including for wire transfers) of commercial banks in The City of New York generally are open for use by customers on such day.

“Commission” means the United States Securities and Exchange Commission.

“Common Stock” means the common stock of the Company, par value \$0.001 per share, and any other class of securities into which such securities may hereafter be reclassified or changed.

“Common Stock Equivalents” means any securities of the Company or the Subsidiaries which would entitle the holder thereof to acquire at any time Common Stock, including, without limitation, any debt, preferred stock, right, option, warrant or other instrument that is at any time convertible into or exercisable or exchangeable for, or otherwise entitles the holder thereof to receive, Common Stock.

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

“Person” means an individual or corporation, partnership, trust, incorporated or unincorporated association, joint venture, limited liability company, joint stock company, government (or an agency or subdivision thereof) or other entity of any kind.

“Securities Act” means the Securities Act of 1933, as amended, and the rules and regulations promulgated thereunder.

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“Subsidiary” means any subsidiary of the Company and shall, where applicable, also include any direct or indirect subsidiary of the Company formed or acquired after the date hereof.

“Trading Day” means a day on which the principal Trading Market is open for trading.

“Trading Market” means any of the following markets or exchanges on which the Common Stock is listed or quoted for trading on the date in question: the NYSE American, the Nasdaq Capital Market, the Nasdaq Global Market, the Nasdaq Global Select Market, the New York Stock Exchange (or any successors to any of the foregoing).

“Transfer Agent” means Computershare Trust Company, N.A., the current transfer agent of the Company, and any successor transfer agent of the Company.

“Warrants” means this Warrant and other Placement Agent Common Stock purchase warrants issued by the Company pursuant to the Engagement Agreement.

Section 2. Exercise.

a) Exercise of Warrant. Exercise of the purchase rights represented by this Warrant may be made, in whole or in part, at any time or times on or after the Initial Exercise Date and on or before the Termination Date by delivery to the Company of a duly executed PDF copy submitted by e-mail (or e-mail attachment) of the Notice of Exercise in the form annexed hereto (the “Notice of Exercise”). Within the earlier of (i) one (1) Trading Day and (ii) the number of Trading Days comprising the Standard Settlement Period (as defined in Section 2(d)(i) herein) following the date of exercise as aforesaid, the Holder shall deliver the aggregate Exercise Price for the shares specified in the applicable Notice of Exercise by wire transfer or cashier’s check drawn on a United States bank unless the cashless exercise procedure specified in Section 2(c) below is specified in the applicable Notice of Exercise. No ink-original Notice of Exercise shall be required, nor shall any medallion guarantee (or other type of guarantee or notarization) of any Notice of Exercise be required. Notwithstanding anything herein to the contrary, the Holder shall not be required to physically surrender this Warrant to the Company until the Holder has purchased all of the Warrant Shares available hereunder and the Warrant has been exercised in full, in which case, the Holder shall surrender this Warrant to the Company for cancellation within three (3) Trading Days of the date on which the final Notice of Exercise is delivered to the Company. Partial exercises of this Warrant resulting in purchases of a portion of the total number of Warrant Shares available hereunder shall have the effect of lowering the outstanding number of Warrant Shares purchasable hereunder in an amount equal to the applicable number of Warrant Shares purchased. The Holder and the Company shall maintain records showing the number of Warrant Shares purchased and the date of such purchases. The Company shall deliver any objection to any Notice of Exercise within one (1) Trading Day of receipt of such notice. **The Holder and any assignee, by acceptance of this Warrant, acknowledge and agree that, by reason of the provisions of this paragraph, following the purchase of a portion of the Warrant Shares hereunder, the number of Warrant Shares available for purchase hereunder at any given time may be less than the amount stated on the face hereof.**

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b) Exercise Price. The exercise price per share of Common Stock under this Warrant shall be **\$2.8375**, subject to adjustment hereunder (the “Exercise Price”).

c) Cashless Exercise. If at the time of exercise hereof there is no effective registration statement registering, or the prospectus contained therein is not available for the resale of the Warrant Shares by the Holder, then this Warrant may also be exercised, in whole or in part, at such time by means of a “cashless exercise” in which the Holder shall be entitled to receive a number of Warrant Shares equal to the quotient obtained by dividing [(A-B) (X)] by (A), where:

- (A) = as applicable: (i) the VWAP on the Trading Day immediately preceding the date of the applicable Notice of Exercise if such Notice of Exercise is (1) delivered pursuant to Section 2(a) hereof on a day that is not a Trading Day or (2) delivered pursuant to Section 2(a) hereof on a Trading Day prior to the opening of “regular trading hours” (as defined in Rule 600(b) of Regulation NMS promulgated under the federal securities laws) on such Trading Day, (ii) the highest Bid Price of the Common Stock on the principal Trading Market as reported by Bloomberg L.P. (“Bloomberg”) within two (2) hours of the time of the Holder’s delivery of the Notice of Exercise pursuant to Section 2(a) hereof if such Notice of Exercise is delivered during “regular trading hours,” or with two (2) hours after the close of “regular trading hours,” on a Trading Day or (iii) the VWAP on the date of the applicable Notice of Exercise if the date of such Notice of Exercise is a Trading Day and such Notice of Exercise is delivered pursuant to Section 2(a) hereof after two (2) hours following the close of “regular trading hours” on such Trading Day;
- (B) = the Exercise Price of this Warrant, as adjusted hereunder; and
- (X) = the number of Warrant Shares that would be issuable upon exercise of this Warrant in accordance with the terms of this Warrant if such exercise were by means of a cash exercise rather than a cashless exercise.

If Warrant Shares are issued in such a cashless exercise, the parties acknowledge and agree that in accordance with Section 3(a)(9) of the Securities Act, the holding period of the Warrant Shares being issued may be tacked on to the holding period of this Warrant. The Company agrees not to take any position contrary to this Section 2(c).

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“Bid Price” means, for any date, the price determined by the first of the following clauses that applies: (a) if the Common Stock is then listed or quoted on a Trading Market, the bid price of the Common Stock for the time in question (or the nearest preceding date) on the Trading Market on which the Common Stock is then listed or quoted as reported by Bloomberg (based on a Trading Day from 9:30 a.m. (New York City time) to 4:02 p.m. (New York City time)), (b) if OTCQB or OTCQX is not a Trading Market, the volume weighted average price of the Common Stock for such date (or the nearest preceding date) on OTCQB or OTCQX as applicable, (c) if the Common Stock is not then listed or quoted for trading on OTCQB or OTCQX and if prices for the Common Stock are then reported on The Pink Open Market (or a similar organization or agency succeeding to its functions of reporting prices), the most recent bid price per share of the Common Stock so reported, or (d) in all other cases, the fair market value of a share of Common Stock as determined by an independent appraiser selected in good faith by the Purchasers of a majority in interest of the Securities then outstanding and reasonably acceptable to the Company, the fees and expenses of which shall be paid by the Company.

“VWAP” means, for any date, the price determined by the first of the following clauses that applies: (a) if the Common Stock is then listed or quoted on a Trading Market, the daily volume weighted average price of the Common Stock for such date (or the nearest preceding date) on the Trading Market on which the Common Stock is then listed or quoted as reported by Bloomberg L.P. (based on a Trading Day from 9:30 a.m. (New York City time) to 4:02 p.m. (New York City time)), (b) if the OTCQB Venture Market (“OTCQB”) or the OTCQX Best Market (“OTCQX”) is not a Trading Market, the volume weighted average price of the Common Stock for such date (or the nearest preceding date) on OTCQB or OTCQX as applicable, (c) if the Common Stock is not then listed or quoted for trading on OTCQB or OTCQX and if prices for the Common Stock are then reported on the Pink Open Market (“Pink Market”) operated by the OTC Markets Group Inc. (or a similar organization or agency succeeding to its functions of reporting prices), the most recent bid price per share of the Common Stock so reported, or (d) in all other cases, the fair market value of a share of Common Stock as determined by an independent appraiser selected in good faith by the Purchasers of a majority in interest of the Securities then outstanding and reasonably acceptable to the Company, the fees and expenses of which shall be paid by the Company.

Notwithstanding anything herein to the contrary, on the Termination Date, this Warrant shall be automatically exercised via cashless exercise pursuant to this Section 2(c).

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d) Mechanics of Exercise.

i. Delivery of Warrant Shares Upon Exercise. The Company shall cause the Warrant Shares purchased hereunder to be transmitted by the Transfer Agent to the Holder by crediting the account of the Holder’s or its designee’s balance account with The Depository Trust Company through its Deposit or Withdrawal at Custodian system (“DWAC”) if the Company is then a participant in such system and either (A) there is an effective registration statement permitting the issuance of the Warrant Shares to or resale of the Warrant Shares by Holder or (B) the Warrant Shares are eligible for resale by the Holder without volume or manner-of-sale limitations pursuant to Rule 144 (assuming cashless exercise of the Warrants), and otherwise by physical delivery of a certificate, registered in the Company’s share register in the name of the Holder or its designee, for the number of Warrant Shares to which the Holder is entitled pursuant to such exercise to the address specified by the Holder in the Notice of Exercise by the date that is the earlier of (i) one (1) Trading Day after the delivery to the Company of the Notice of Exercise and (ii) the number of Trading Days

comprising the Standard Settlement Period after the delivery to the Company of the Notice of Exercise (such date, the “Warrant Share Delivery Date”); provided, however, that the aggregate Exercise Price has been delivered to the Company by the Warrant Share Delivery Date. Upon delivery of the Notice of Exercise, the Holder shall be deemed for all corporate purposes to have become the holder of record of the Warrant Shares with respect to which this Warrant has been exercised, irrespective of the date of delivery of the Warrant Shares, provided that payment of the aggregate Exercise Price (other than in the case of a cashless exercise) is received within the earlier of (i) one (1) Trading Day and (ii) the number of Trading Days comprising the Standard Settlement Period following delivery of the Notice of Exercise. If the Holder duly exercises the Warrant pursuant to Section 2(a) hereof and the Company fails for any reason to deliver to the Holder the Warrant Shares subject to a Notice of Exercise by the Warrant Share Delivery Date, the Company shall pay to the Holder, in cash, as liquidated damages and not as a penalty, for each \$1,000 of Warrant Shares subject to such exercise (based on the VWAP of the Common Stock on the date of the applicable Notice of Exercise), \$10 per Trading Day (increasing to \$20 per Trading Day on the third Trading Day after the Warrant Share Delivery Date) for each Trading Day after such Warrant Share Delivery Date until such Warrant Shares are delivered or Holder rescinds such exercise. The Company agrees to maintain a transfer agent that is a participant in the FAST program so long as this Warrant remains outstanding and exercisable. As used herein, “Standard Settlement Period” means the standard settlement period, expressed in a number of Trading Days, on the Company’s primary Trading Market with respect to the Common Stock as in effect on the date of delivery of the Notice of Exercise.

ii. Delivery of New Warrants Upon Exercise. If this Warrant shall have been exercised in part, the Company shall, at the request of a Holder and upon surrender of this Warrant certificate, at the time of delivery of the Warrant Shares, deliver to the Holder a new Warrant evidencing the rights of the Holder to purchase the unpurchased Warrant Shares called for by this Warrant, which new Warrant shall in all other respects be identical with this Warrant.

iii. Rescission Rights. If the Company fails to cause the Transfer Agent to transmit to the Holder the Warrant Shares pursuant to Section 2(d) (i) by the Warrant Share Delivery Date, then the Holder will have the right to rescind such exercise.

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iv. Compensation for Buy-In on Failure to Timely Deliver Warrant Shares Upon Exercise. In addition to any other rights available to the Holder, if the Company fails to cause the Transfer Agent to transmit to the Holder the Warrant Shares in accordance with the provisions of Section 2(d)(i) above pursuant to an exercise on or before the Warrant Share Delivery Date, and if after such date the Holder is required by its broker to purchase (in an open market transaction or otherwise) or the Holder’s brokerage firm otherwise purchases, shares of Common Stock to deliver in satisfaction of a sale by the Holder of the Warrant Shares which the Holder anticipated receiving upon such exercise (a “Buy-In”), then the Company shall (A) pay in cash to the Holder the amount, if any, by which (x) the Holder’s total purchase price (including brokerage commissions, if any) for the shares of Common Stock so purchased exceeds (y) the amount obtained by multiplying (1) the number of Warrant Shares that the Company was required to deliver to the Holder in connection with the exercise at issue times (2) the price at which the sell order giving rise to such purchase obligation was executed, and (B) at the option of the Holder, either reinstate the portion of the Warrant and equivalent number of Warrant Shares for which such exercise was not honored (in which case such exercise shall be deemed rescinded) or deliver to the Holder the number of shares of Common Stock that would have been issued had the Company timely complied with its exercise and delivery obligations hereunder. For example, if the Holder purchases Common Stock having a total purchase price of \$11,000 to cover a Buy-In with respect to an attempted exercise of shares of Common Stock with an aggregate sale price giving rise to such purchase obligation of \$10,000, under clause (A) of the immediately preceding sentence the Company shall be required to pay the Holder \$1,000. The Holder shall provide the Company written notice indicating the amounts payable to the Holder in respect of the Buy-In and, upon request of the Company, evidence of the amount of such loss. Nothing herein shall limit a Holder’s right to pursue any other remedies available to it hereunder, at law or in equity including, without limitation, a decree of specific performance and/or injunctive relief with respect to the Company’s failure to timely deliver shares of Common Stock upon exercise of the Warrant as required pursuant to the terms hereof.

v. No Fractional Shares or Scrip. No fractional shares or scrip representing fractional shares shall be issued upon the exercise of this Warrant. As to any fraction of a share which the Holder would otherwise be entitled to purchase upon such exercise, the Company shall, at its election, either pay a cash adjustment in respect of such final fraction in an amount equal to such fraction multiplied by the Exercise Price or round up to the next whole share.

vi. Charges, Taxes and Expenses. Issuance of Warrant Shares shall be made without charge to the Holder for any issue or transfer tax or other incidental expense in respect of the issuance of such Warrant Shares, all of which taxes and expenses shall be paid by the Company, and such Warrant Shares shall be issued in the name of the Holder or in such name or names as may be directed by the Holder; provided, however, that, in the event that Warrant Shares are to be issued in a name other than the name of the Holder, this Warrant when surrendered for exercise shall be accompanied by the Assignment Form attached hereto duly executed by the Holder and the Company may require, as a condition thereto, the payment of a sum sufficient to reimburse it for any transfer tax incidental thereto. The Company shall pay all Transfer Agent fees required for same-day processing of any Notice of Exercise and all fees to the Depository Trust Company (or another established clearing corporation performing similar functions) required for same-day electronic delivery of the Warrant Shares.

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vii. Closing of Books. The Company will not close its stockholder books or records in any manner which prevents the timely exercise of this Warrant, pursuant to the terms hereof.

e) Holder's Exercise Limitations. The Company shall not effect any exercise of this Warrant, and a Holder shall not have the right to exercise any portion of this Warrant, pursuant to Section 2 or otherwise, to the extent that after giving effect to such issuance after exercise as set forth on the applicable Notice of Exercise, the Holder (together with the Holder's Affiliates, and any other Persons acting as a group together with the Holder or any of the Holder's Affiliates (such Persons, "Attribution Parties")), would beneficially own in excess of the Beneficial Ownership Limitation (as defined below). For purposes of the foregoing sentence, the number of shares of Common Stock beneficially owned by the Holder and its Affiliates and Attribution Parties shall include the number of shares of Common Stock issuable upon exercise of this Warrant with respect to which such determination is being made, but shall exclude the number of shares of Common Stock which would be issuable upon (i) exercise of the remaining, nonexercised portion of this Warrant beneficially owned by the Holder or any of its Affiliates or Attribution Parties and (ii) exercise or conversion of the unexercised or nonconverted portion of any other securities of the Company (including, without limitation, any other Common Stock Equivalents) subject to a limitation on conversion or exercise analogous to the limitation contained herein beneficially owned by the Holder or any of its Affiliates or Attribution Parties. Except as set forth in the preceding sentence, for purposes of this Section 2(e), beneficial ownership shall be calculated in accordance with Section 13(d) of the Exchange Act and the rules and regulations promulgated thereunder, it being acknowledged by the Holder that the Company is not representing to the Holder that such calculation is in compliance with Section 13(d) of the Exchange Act and the Holder is solely responsible for any schedules required to be filed in accordance therewith. To the extent that the limitation contained in this Section 2(e) applies, the determination of whether this Warrant is exercisable (in relation to other securities owned by the Holder together with any Affiliates and Attribution Parties) and of which portion of this Warrant is exercisable shall be in the sole discretion of the Holder, and the submission of a Notice of Exercise shall be deemed to be the Holder's determination of whether this Warrant is exercisable (in relation to other securities owned by the Holder together with any Affiliates and Attribution Parties) and of which portion of this Warrant is exercisable, in each case subject to the Beneficial Ownership Limitation, and the Company shall have no obligation to verify or confirm the accuracy of such determination. In addition, a determination as to any group status as contemplated above shall be determined in accordance with Section 13(d) of the Exchange Act and the rules and regulations promulgated thereunder. For purposes of this Section 2(e), in determining the number of outstanding shares of Common Stock, a Holder may rely on the number of outstanding shares of Common Stock as reflected in (A) the Company's most recent periodic or annual report filed with the Commission, as the case may be, (B) a more recent public announcement by the Company or (C) a more recent written notice by the Company or the Transfer Agent setting forth the number of shares of Common Stock outstanding. Upon the written or oral request of a Holder, the Company shall within one Trading Day confirm orally and in writing to the Holder the number of shares of Common Stock then outstanding. In any case, the number of outstanding shares of Common Stock shall be determined after giving effect to the conversion or exercise of securities of the Company, including this Warrant, by the Holder or its Affiliates or Attribution Parties since the date as of which such number of outstanding shares of Common Stock was reported. The "Beneficial Ownership Limitation" shall be 4.99% of the number of shares of the Common Stock outstanding immediately after giving effect to the issuance of shares of Common Stock issuable upon exercise of this Warrant. The Holder, upon notice to the Company, may increase or decrease the Beneficial Ownership Limitation provisions of this Section 2(e), provided that the Beneficial Ownership Limitation in no event exceeds 9.99% of the number of shares of the Common Stock outstanding immediately after giving effect to the issuance of shares of Common Stock upon exercise of this Warrant held by the Holder and the provisions of this Section 2(e) shall continue to apply. Any increase in the Beneficial Ownership Limitation will not be effective until the 61st day after such notice is delivered to the Company. The provisions of this paragraph shall be construed and implemented in a manner otherwise than in strict conformity with the terms of this Section 2(e) to correct this paragraph (or any portion hereof) which may be defective or inconsistent with the intended Beneficial Ownership Limitation herein contained or to make changes or supplements necessary or desirable to properly give effect to such limitation. The limitations contained in this paragraph shall apply to a successor holder of this Warrant.

Section 3. Certain Adjustments.

a) Stock Dividends and Splits. If the Company, at any time while this Warrant is outstanding: (i) pays a stock dividend or otherwise makes a distribution or distributions on shares of its Common Stock or any other equity or equity equivalent securities payable in shares of Common Stock (which, for avoidance of doubt, shall not include any shares of Common Stock issued by the Company upon exercise of this Warrant), (ii) subdivides outstanding shares of Common Stock into a larger number of shares, (iii) combines (including by way of reverse stock split) outstanding shares of Common Stock into a smaller number of shares, or (iv) issues by reclassification of shares of the Common Stock any shares of capital stock of the Company, then in each case the Exercise Price shall be multiplied by a fraction of which the numerator shall be the number of shares of Common Stock (excluding treasury shares, if any) outstanding immediately before such event and of which the denominator shall be the number of shares of Common Stock outstanding immediately after such event, and the number of shares issuable upon exercise of this Warrant shall be proportionately adjusted such that the aggregate Exercise Price of this Warrant shall remain unchanged. Any adjustment made pursuant to this Section 3(a) shall become effective immediately after the record date for the determination of stockholders entitled to receive such dividend or distribution and shall become effective immediately after the effective date in the case of a subdivision, combination or re-classification.

b) Subsequent Rights Offerings. In addition to any adjustments pursuant to Section 3(a) above, if at any time the Company grants, issues or sells any Common Stock Equivalents or rights to purchase stock, warrants, securities or other property pro rata to the record holders of any class of shares of Common Stock (the "Purchase Rights"), then the Holder will be entitled to acquire, upon the terms applicable to such Purchase Rights, the aggregate Purchase Rights which the Holder could have acquired if the Holder had held the number of shares of Common Stock acquirable upon complete exercise of this Warrant (without regard to any limitations on exercise hereof, including without limitation, the Beneficial Ownership Limitation) immediately before the date on which a record is taken for the grant, issuance or sale of such Purchase Rights, or, if no such record is taken, the date as of which the record holders of shares of Common Stock are to be determined for the grant, issue or sale of such Purchase Rights (provided, however, that, to the extent that the Holder's right to participate in any such Purchase Right would result in the Holder exceeding the Beneficial Ownership Limitation, then the Holder shall not be entitled to participate in such Purchase Right to such extent (or beneficial ownership of such shares of Common Stock as a result of such Purchase Right to such extent) and such Purchase Right to such extent shall be held in abeyance for the Holder until such time, if ever, as its right thereto would not result in the Holder exceeding the Beneficial Ownership Limitation).

c) Pro Rata Distributions. During such time as this Warrant is outstanding, if the Company shall declare or make any dividend or other distribution of its assets (or rights to acquire its assets) to holders of shares of Common Stock, by way of return of capital or otherwise (including, without limitation, any distribution of cash, stock or other securities, property or options by way of a dividend, spin off, reclassification, corporate rearrangement, scheme of arrangement or other similar transaction) (a "Distribution"), at any time after the issuance of this Warrant, then, in each such case, the Holder shall be entitled to participate in such Distribution to the same extent that the Holder would have participated therein if the Holder had held the number of shares of Common Stock acquirable upon complete exercise of this Warrant (without regard to any limitations on exercise hereof, including without limitation, the Beneficial Ownership Limitation) immediately before the date of which a record is taken for such Distribution, or, if no such record is taken, the date as of which the record holders of shares of Common Stock are to be determined for the participation in such Distribution (provided, however, that, to the extent that the Holder's right to participate in any such Distribution would result in the Holder exceeding the Beneficial Ownership Limitation, then the Holder shall not be entitled to participate in such Distribution to such extent (or in the beneficial ownership of any shares of Common Stock as a result of such Distribution to such extent) and the portion of such Distribution shall be held in abeyance for the benefit of the Holder until such time, if ever, as its right thereto would not result in the Holder exceeding the Beneficial Ownership Limitation). To the extent that this Warrant has not been partially or completely exercised at the time of such Distribution, such portion of the Distribution shall be held in abeyance for the benefit of the Holder until the Holder has exercised this Warrant.

d) Fundamental Transaction. If, at any time while this Warrant is outstanding, (i) the Company, directly or indirectly, in one or more related transactions effects any merger or consolidation of the Company with or into another Person, (ii) the Company or any Subsidiary, directly or indirectly, effects any sale, lease, license, assignment, transfer, conveyance or other disposition of all or substantially all of its assets in one or a series of related transactions, (iii) any, direct or indirect, purchase offer, tender offer or exchange offer (whether by the Company or another Person) is completed pursuant to which holders of Common Stock are permitted to sell, tender

or exchange their shares for other securities, cash or property and has been accepted by the holders of greater than 50% of the outstanding Common Stock or greater than 50% of the voting power of the common equity of the Company, (iv) the Company, directly or indirectly, in one or more related transactions effects any reclassification, reorganization or recapitalization of the Common Stock or any compulsory share exchange pursuant to which the Common Stock is effectively converted into or exchanged for other securities, cash or property, or (v) the Company, directly or indirectly, in one or more related transactions consummates a stock or share purchase agreement or other business combination (including, without limitation, a reorganization, recapitalization, spin-off, merger or scheme of arrangement) with another Person or group of Persons whereby such other Person or group acquires greater than 50% of the outstanding shares of Common Stock or greater than 50% of the voting power of the common equity of the Company (each a “Fundamental Transaction”), then, upon any subsequent exercise of this Warrant, the Holder shall have the right to receive, for each Warrant Share that would have been issuable upon such exercise immediately prior to the occurrence of such Fundamental Transaction, at the option of the Holder (without regard to any limitation in Section 2(e) on the exercise of this Warrant), the number of shares of Common Stock of the successor or acquiring corporation or of the Company, if it is the surviving corporation, and any additional consideration (the “Alternate Consideration”) receivable as a result of such Fundamental Transaction by a holder of the number of shares of Common Stock for which this Warrant is exercisable immediately prior to such Fundamental Transaction (without regard to any limitation in Section 2(e) on the exercise of this Warrant). For purposes of any such exercise, the determination of the Exercise Price shall be appropriately adjusted to apply to such Alternate Consideration based on the amount of Alternate Consideration issuable in respect of one share of Common Stock in such Fundamental Transaction, and the Company shall apportion the Exercise Price among the Alternate Consideration in a reasonable manner reflecting the relative value of any different components of the Alternate Consideration. If holders of Common Stock are given any choice as to the securities, cash or property to be received in a Fundamental Transaction, then the Holder shall be given the same choice as to the Alternate Consideration it receives upon any exercise of this Warrant following such Fundamental Transaction. Notwithstanding anything to the contrary, in the event of a Fundamental Transaction, the Company or any Successor Entity (as defined below) shall, at the Holder’s option, exercisable at any time concurrently with, or within 30 days after, the consummation of the Fundamental Transaction (or, if later, the date of the public announcement of the applicable Fundamental Transaction), purchase this Warrant from the Holder by paying to the Holder an amount of cash equal to the Black Scholes Value (as defined below) of the remaining unexercised portion of this Warrant on the date of the consummation of such Fundamental Transaction; provided, however, that, if the Fundamental Transaction is not within the Company’s control, including not approved by the Company’s Board of Directors, the Holder shall only be entitled to receive from the Company or any Successor Entity the same type or form of consideration (and in the same proportion), at the Black Scholes Value of the unexercised portion of this Warrant, that is being offered and paid to the holders of Common Stock of the Company in connection with the Fundamental Transaction, whether that consideration be in the form of cash, stock or any combination thereof, or whether the holders of Common Stock are given the choice to receive from among alternative forms of consideration in connection with the Fundamental Transaction; provided, further, that if holders of Common Stock of the Company are not offered or paid any consideration in such Fundamental Transaction, such holders of Common Stock will be deemed to have received common stock of the Successor Entity (which Successor Entity may be the Company following such Fundamental Transaction) in such Fundamental Transaction. “Black Scholes Value” means the value of this Warrant based on the Black-Scholes Option Pricing Model obtained from the “OV” function on Bloomberg determined as of the day of consummation of the applicable Fundamental Transaction for pricing purposes and reflecting (A) a risk-free interest rate corresponding to the U.S. Treasury rate for a period equal to the time between the date of the public announcement of the applicable contemplated Fundamental Transaction and the Termination Date, (B) an expected volatility equal to the 100 day volatility as obtained from the HVT function on Bloomberg (determined utilizing a 365 day annualization factor) as of the Trading Day immediately following the public announcement of the applicable contemplated Fundamental Transaction, (C) the underlying price per share used in such calculation shall be the sum of the price per share being offered in cash, if any, plus the value of any non-cash consideration, if any, being offered in such Fundamental Transaction, (D) a remaining option time equal to the time between the date of the public announcement of the applicable contemplated Fundamental Transaction and the Termination Date and (E) a zero cost of borrow. The payment of the Black Scholes Value will be made by wire transfer of immediately available funds (or such other consideration) within the later of (i) five Business Days of the Holder’s election and (ii) the date of consummation of the Fundamental Transaction. The Company shall cause any successor entity in a Fundamental Transaction in which the Company is not the survivor (the “Successor Entity”) to assume in writing all of the obligations of the Company under this Warrant and the other Transaction Documents in accordance with the provisions of this Section 3(d) pursuant to written agreements in form and substance reasonably satisfactory to the Holder and approved by the Holder (without unreasonable delay) prior to such Fundamental Transaction and shall, at the option of the Holder, deliver to the Holder in exchange for this Warrant a security of the Successor Entity evidenced by a written instrument substantially similar in form and substance to this Warrant which is exercisable for a corresponding number of shares of capital stock of such Successor Entity (or its parent entity) equivalent to the shares of Common Stock acquirable and receivable upon exercise of this Warrant (without regard to any limitations on the exercise of this Warrant) prior to such Fundamental Transaction, and with an exercise price which applies the exercise price hereunder to such shares of capital stock (but taking into account the relative value of the shares of Common Stock pursuant to such Fundamental Transaction and the value of such shares of capital stock, such number of shares of capital stock and such exercise price being for the purpose of protecting the economic value of this Warrant immediately prior to the consummation of such Fundamental Transaction), and which is reasonably satisfactory in form and substance to the Holder. Upon the occurrence of any such Fundamental Transaction, the Successor Entity shall be added to the term “Company” under this Warrant (so that from and after the occurrence or consummation of such Fundamental Transaction, each and every provision of this Warrant and the other Transaction Documents referring to the “Company” shall refer instead to each of the Company and the Successor Entity or Successor Entities, jointly and severally), and the Successor Entity or Successor Entities, jointly and severally with the Company, may exercise every right and power of the Company prior thereto and the Successor Entity or Successor Entities shall assume all of the obligations of the Company prior thereto under this Warrant and the other Transaction Documents with the same effect as if the Company and such Successor Entity or Successor Entities, jointly and severally, had been named as the Company herein. For the avoidance of doubt, the Holder shall be entitled to the benefits of the provisions of this Section 3(d) regardless of (i) whether the Company has sufficient authorized shares of Common Stock for the issuance of Warrant Shares and/or (ii) whether a Fundamental Transaction occurs prior to the Initial Exercise Date.

e) Calculations. All calculations under this Section 3 shall be made to the nearest cent or the nearest 1/100th of a share, as the case may be. For purposes of this Section 3, the number of shares of Common Stock deemed to be issued and outstanding as of a given date shall be the sum of the number of shares of Common Stock (excluding treasury shares, if any) issued and outstanding.

f) Notice to Holder.

i. Adjustment to Exercise Price. Whenever the Exercise Price is adjusted pursuant to any provision of this Section 3, the Company shall promptly deliver to the Holder by email a notice setting forth the Exercise Price after such adjustment and any resulting adjustment to the number of Warrant Shares and setting forth a brief statement of the facts requiring such adjustment.

ii. Notice to Allow Exercise by Holder. If (A) the Company shall declare a dividend (or any other distribution in whatever form) on the Common Stock, (B) the Company shall declare a special nonrecurring cash dividend on or a redemption of the Common Stock, (C) the Company shall authorize the granting to all holders of the Common Stock rights or warrants to subscribe for or purchase any shares of capital stock of any class or of any rights, (D) the approval of any stockholders of the Company shall be required in connection with any reclassification of the Common Stock, any consolidation or merger to which the Company (or any of its Subsidiaries) is a party, any sale or transfer of all or substantially all of its assets, or any compulsory share exchange whereby the Common Stock is converted into other securities, cash or property, or (E) the Company shall authorize the voluntary or involuntary dissolution, liquidation or winding up of the affairs of the Company, then, in each case, the Company shall cause to be delivered by email to the Holder at its last email address as it shall appear upon the Warrant Register of the Company, at least 20 calendar days prior to the applicable record or effective date hereinafter specified, a notice stating (x) the date on which a record is to be taken for the purpose of such dividend, distribution, redemption, rights or warrants, or if a record is not to be taken, the date as of which the holders of the Common Stock of record to be entitled to such dividend, distributions, redemption, rights or warrants are to be determined or (y) the date on which such reclassification, consolidation, merger, sale, transfer or share exchange is expected to become effective or close, and the date as of which it is expected that holders of the Common Stock of record shall be entitled to exchange their shares of the Common Stock for securities, cash or other property deliverable upon such reclassification, consolidation, merger, sale, transfer or share exchange; provided that the failure to deliver such notice or any defect therein or in the delivery thereof shall not affect the validity of the corporate action required to be specified in such notice. To the extent that any notice provided in this Warrant constitutes, or contains, material, non-public information regarding the Company or any of the Subsidiaries, the Company shall simultaneously file such notice with the Commission pursuant to a Current Report on Form 8-K. The Holder shall remain entitled to exercise this

Warrant during the period commencing on the date of such notice to the effective date of the event triggering such notice except as may otherwise be expressly set forth herein.

Section 4. Transfer of Warrant.

a) Transferability. Subject to compliance with any applicable securities laws and the conditions set forth in Section 4(d) hereof, this Warrant and all rights hereunder (including, without limitation, any registration rights) are transferable, in whole or in part, upon surrender of this Warrant at the principal office of the Company or its designated agent, together with a written assignment of this Warrant substantially in the form attached hereto duly executed by the Holder or its agent or attorney and funds sufficient to pay any transfer taxes payable upon the making of such transfer. Upon such surrender and, if required, such payment, the Company shall execute and deliver a new Warrant or Warrants in the name of the assignee or assignees, as applicable, and in the denomination or denominations specified in such instrument of assignment, and shall issue to the assignor a new Warrant evidencing the portion of this Warrant not so assigned, and this Warrant shall promptly be cancelled. Notwithstanding anything herein to the contrary, the Holder shall not be required to physically surrender this Warrant to the Company unless the Holder has assigned this Warrant in full, in which case, the Holder shall surrender this Warrant to the Company within three (3) Trading Days of the date on which the Holder delivers an assignment form to the Company assigning this Warrant in full. The Warrant, if properly assigned in accordance herewith, may be exercised by a new holder for the purchase of Warrant Shares without having a new Warrant issued.

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b) New Warrants. This Warrant may be divided or combined with other Warrants upon presentation hereof at the aforesaid office of the Company, together with a written notice specifying the names and denominations in which new Warrants are to be issued, signed by the Holder or its agent or attorney. Subject to compliance with Section 4(a), as to any transfer which may be involved in such division or combination, the Company shall execute and deliver a new Warrant or Warrants in exchange for the Warrant or Warrants to be divided or combined in accordance with such notice. All Warrants issued on transfers or exchanges shall be dated the initial issuance date of this Warrant and shall be identical with this Warrant except as to the number of Warrant Shares issuable pursuant thereto.

c) Warrant Register. The Company shall register this Warrant, upon records to be maintained by the Company for that purpose (the "Warrant Register"), in the name of the record Holder hereof from time to time. The Company may deem and treat the registered Holder of this Warrant as the absolute owner hereof for the purpose of any exercise hereof or any distribution to the Holder, and for all other purposes, absent actual notice to the contrary.

d) Transfer Restrictions. If, at the time of the surrender of this Warrant in connection with any transfer of this Warrant, the transfer of this Warrant shall not be either (i) registered pursuant to an effective registration statement under the Securities Act and under applicable state securities or blue sky laws or (ii) eligible for resale without volume or manner-of-sale restrictions or current public information requirements pursuant to Rule 144, the Company may require, as a condition of allowing such transfer, that the Holder or transferee of this Warrant, as the case may be, provide to the Company an opinion of counsel, the form and substance of which opinion shall be reasonably satisfactory to the Company, to the effect that the transfer of this Warrant does not require registration under the Securities Act.

e) Representation by the Holder. The Holder, by the acceptance hereof, represents and warrants that it is acquiring this Warrant and, upon any exercise hereof, will acquire the Warrant Shares issuable upon such exercise, for its own account and not with a view to or for distributing or reselling such Warrant Shares or any part thereof in violation of the Securities Act or any applicable state securities law, except pursuant to sales registered or exempted under the Securities Act.

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Section 5. Miscellaneous.

a) No Rights as Stockholder Until Exercise; No Settlement in Cash. This Warrant does not entitle the Holder to any voting rights, dividends or other rights as a stockholder of the Company prior to the exercise hereof as set forth in Section 2(d)(i), except as expressly set forth in Section 3. Without limiting any rights of a Holder to receive Warrant Shares on a "cashless exercise" pursuant to Section 2(c) or to receive cash payments pursuant to Section 2(d)(i) and Section 2(d)(iv) herein, in no event shall the Company be required to net cash settle an exercise of this Warrant.

b) Loss, Theft, Destruction or Mutilation of Warrant. The Company covenants that upon receipt by the Company of evidence reasonably satisfactory to it of the loss, theft, destruction or mutilation of this Warrant or any stock certificate relating to the Warrant Shares, and in case of loss, theft or destruction, of indemnity or security reasonably satisfactory to it (which, in the case of the Warrant, shall not include the posting of any bond), and upon surrender and cancellation of such Warrant or stock certificate, if mutilated, the Company will make and deliver a new Warrant or stock certificate of like tenor and dated as of such cancellation, in lieu of such Warrant or stock certificate.

c) Saturdays, Sundays, Holidays, etc. If the last or appointed day for the taking of any action or the expiration of any right required or granted herein shall not be a Business Day, then such action may be taken or such right may be exercised on the next succeeding Business Day.

d) Authorized Shares.

The Company covenants that, during the period the Warrant is outstanding, it will reserve from its authorized and unissued Common Stock a sufficient number of shares to provide for the issuance of the Warrant Shares upon the exercise of any purchase rights under this Warrant. The Company further covenants that its issuance of this Warrant shall constitute full authority to its officers who are charged with the duty of issuing the necessary Warrant Shares upon the exercise of the purchase rights under this Warrant. The Company will take all such reasonable action as may be necessary to assure that such Warrant Shares may be issued as provided herein without violation of any applicable law or regulation, or of any requirements of the Trading Market upon which the Common Stock may be listed. The Company covenants that all Warrant Shares which may be issued upon the exercise of the purchase rights represented by this Warrant will, upon exercise of the purchase rights represented by this Warrant and payment for such Warrant Shares in accordance herewith, be duly authorized, validly issued, fully paid and nonassessable and free from all taxes, liens and charges created by the Company in respect of the issue thereof (other than taxes in respect of any transfer occurring contemporaneously with such issue).

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Except and to the extent as waived or consented to by the Holder, the Company shall not by any action, including, without limitation, amending its certificate of incorporation or through any reorganization, transfer of assets, consolidation, merger, dissolution, issue or sale of securities or any other voluntary action, avoid or seek to avoid the observance or performance of any of the terms of this Warrant, but will at all times in good faith assist in the carrying out of all such terms and in the taking of all such actions as may be necessary or appropriate to protect the rights of Holder as set forth in this Warrant against impairment. Without limiting the generality of the foregoing, the Company will (i) not increase the par value of any Warrant Shares above the amount payable therefor upon such exercise immediately prior to such increase in par value, (ii) take all such action as may be necessary or appropriate in order that the Company may validly and legally issue fully paid and nonassessable Warrant Shares upon the exercise of this Warrant and (iii) use commercially reasonable efforts to obtain all such authorizations, exemptions or consents from any public regulatory body having jurisdiction thereof, as may be, necessary to enable the Company to perform its obligations under this Warrant.

Before taking any action which would result in an adjustment in the number of Warrant Shares for which this Warrant is exercisable or in the Exercise Price, the Company shall obtain all such authorizations or exemptions thereof, or consents thereto, as may be necessary from any public regulatory body or bodies having jurisdiction thereof.

e) Governing Law. All questions concerning the construction, validity, enforcement and interpretation of this Warrant 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 Warrant (whether brought against a party hereto or their respective affiliates, directors, officers, shareholders, partners, members, employees or agents) shall be commenced exclusively in the state and federal courts sitting in the City of New York. Each party hereby irrevocably submits to the exclusive jurisdiction of the state and federal courts sitting in the City of New York, Borough of Manhattan for the adjudication of any dispute hereunder or in connection herewith or with any transaction contemplated hereby or discussed herein, 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 Warrant 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, suit or proceeding to enforce any provisions of this Warrant, the prevailing party in such action, suit or proceeding shall be reimbursed by the other party for their reasonable attorneys' fees and other costs and expenses incurred with the investigation, preparation and prosecution of such action or proceeding.

f) Restrictions. The Holder acknowledges that the Warrant Shares acquired upon the exercise of this Warrant, if not registered, and the Holder does not utilize cashless exercise, will have restrictions upon resale imposed by state and federal securities laws.

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g) Nonwaiver and Expenses. No course of dealing or any delay or failure to exercise any right hereunder on the part of Holder shall operate as a waiver of such right or otherwise prejudice the Holder's rights, powers or remedies. Without limiting any other provision of this Warrant, if the Company willfully and knowingly fails to comply with any provision of this Warrant, which results in any material damages to the Holder, the Company shall pay to the Holder such amounts as shall be sufficient to cover any costs and expenses including, but not limited to, reasonable attorneys' fees, including those of appellate proceedings, incurred by the Holder in collecting any amounts due pursuant hereto or in otherwise enforcing any of its rights, powers or remedies hereunder.

h) Notices. Any and all notices or other communications or deliveries to be provided by the Holders hereunder including, without limitation, any Notice of Exercise, shall be in writing and delivered personally, by e-mail, or sent by a nationally recognized overnight courier service, addressed to the Company, at 315 Montgomery Street, 10th Floor, San Francisco, CA 94104, Attention: Chief Executive Officer, email address: mb@gtbiopharma.com, or such other email address or address as the Company may specify for such purposes by notice to the Holders. Any and all notices or other communications or deliveries to be provided by the Company hereunder shall be in writing and delivered personally, by e-mail, or sent by a nationally recognized overnight courier service addressed to each Holder at the e-mail address or address of such Holder appearing on the books of the Company. Any notice or other communication or deliveries hereunder shall be deemed given and effective on the earliest of (i) the time of transmission, if such notice or communication is delivered via e-mail at the e-mail address set forth in this Section prior to 5:30 p.m. (New York City time) on any date, (ii) the next Trading Day after the time of transmission, if such notice or communication is delivered via e-mail at the e-mail address set forth in this Section on a day that is not a Trading Day or later than 5:30 p.m. (New York City time) on any Trading Day, (iii) the second Trading Day following the date of mailing, if sent by U.S. nationally recognized overnight courier service, or (iv) upon actual receipt by the party to whom such notice is required to be given. To the extent that any notice provided hereunder constitutes, or contains, material, non-public information regarding the Company or any Subsidiaries, as determined by the Company in consultation with Company Counsel, the Company shall simultaneously file such notice with the Commission pursuant to a Current Report on Form 8-K.

i) Limitation of Liability. No provision hereof, in the absence of any affirmative action by the Holder to exercise this Warrant to purchase Warrant Shares, and no enumeration herein of the rights or privileges of the Holder, shall give rise to any liability of the Holder for the purchase price of any Common Stock or as a stockholder of the Company, whether such liability is asserted by the Company or by creditors of the Company.

j) Remedies. The Holder, in addition to being entitled to exercise all rights granted by law, including recovery of damages, will be entitled to specific performance of its rights under this Warrant. The Company agrees that monetary damages would not be adequate compensation for any loss incurred by reason of a breach by it of the provisions of this Warrant and hereby agrees to waive and not to assert the defense in any action for specific performance that a remedy at law would be adequate.

k) Successors and Assigns. Subject to applicable securities laws, this Warrant and the rights and obligations evidenced hereby shall inure to the benefit of and be binding upon the successors and permitted assigns of the Company and the successors and permitted assigns of Holder. The provisions of this Warrant are intended to be for the benefit of any Holder from time to time of this Warrant and shall be enforceable by the Holder or holder of Warrant Shares.

l) Amendment. This Warrant may be modified or amended or the provisions hereof waived with the written consent of the Company and the Holder.

m) Severability. Wherever possible, each provision of this Warrant shall be interpreted in such manner as to be effective and valid under applicable law, but if any provision of this Warrant shall be prohibited by or invalid under applicable law, such provision shall be ineffective to the extent of such prohibition or invalidity, without invalidating the remainder of such provisions or the remaining provisions of this Warrant.

n) Headings. The headings used in this Warrant are for the convenience of reference only and shall not, for any purpose, be deemed a part of this Warrant.

(Signature Page Follows)

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IN WITNESS WHEREOF, the Company has caused this Warrant to be executed by its officer thereunto duly authorized as of the date first above indicated.

GT BIOPHARMA, INC.

By: _____
Name: _____
Title: _____

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NOTICE OF EXERCISE

TO: GT BIOPHARMA, INC.

(1) The undersigned hereby elects to purchase _____ Warrant Shares of the Company pursuant to the terms of the attached Warrant (only if exercised in full), and tenders herewith payment of the exercise price in full, together with all applicable transfer taxes, if any.

(2) Payment shall take the form of (check applicable box):

[] in lawful money of the United States; or

[] if permitted the cancellation of such number of Warrant Shares as is necessary, in accordance with the formula set forth in subsection 2(c), to exercise this Warrant with respect to the maximum number of Warrant Shares purchasable pursuant to the cashless exercise procedure set forth in subsection 2(c).

(3) Please issue said Warrant Shares in the name of the undersigned or in such other name as is specified below:

The Warrant Shares shall be delivered to the following DWAC Account Number:

(4) Accredited Investor. The undersigned is an "accredited investor" as defined in Regulation D promulgated under the Securities Act of 1933, as amended.

[SIGNATURE OF HOLDER]

Name of Investing Entity: _____

Signature of Authorized Signatory of Investing Entity: _____

Name of Authorized Signatory: _____

Title of Authorized Signatory: _____

Date: _____

EXHIBIT B

ASSIGNMENT FORM

(To assign the foregoing Warrant, execute this form and supply required information. Do not use this form to purchase shares.)

FOR VALUE RECEIVED, the foregoing Warrant and all rights evidenced thereby are hereby assigned to

Name: _____
(Please Print)

Address: _____
(Please Print)

Phone Number: _____

Email Address: _____

Dated: _____, _____

Holder's Signature: _____

Holder's Address: _____



March 6, 2025

GT Biopharma, Inc.
505 Montgomery Street, 10th Floor
San Francisco, California 94111

Ladies and Gentlemen:

We have acted as counsel to GT Biopharma, Inc., a Delaware corporation (the “**Company**”), in connection with the Registration Statement on Form S-3 (including all amendments and supplements thereto, the “**Registration Statement**”), filed by the Company under the Securities Act of 1933, as amended (the “**Securities Act**”) on or about the date hereof. The Company has provided us with a prospectus (the “**Prospectus**”) which forms part of the Registration Statement. The Registration Statement, including the Prospectus, covers the registration for resale of up to 625,283 shares of common stock, \$0.001 par value (the “**Common Stock**”), of the Company (the “**Inducement Warrant Shares**”), consisting of (i) up to 302,069 shares of Common Stock, issuable upon the exercise of Series A Inducement Warrants (the “**Series A Inducement Warrants**”), (ii) up to 302,069 shares of Common Stock issuable upon the exercise of Series B Inducement Warrants (the “**Series B Inducement Warrants**” and together with the Series A Inducement Warrants, the “**Inducement Warrants**”), and (iii) up to 21,145 shares of Common Stock issuable upon the exercise of Placement Agent Common Stock Purchase Warrants (the “**Inducement Placement Agent Warrants**,” and together with the Inducement Warrants, the “**2025 Inducement Warrants**”). The Inducement Warrants were issued by the Company pursuant to those certain warrant exercise inducement offer letter agreements, dated as of February 25, 2025, by and between the Company and certain holders of existing warrants to purchase the Company’s Common Stock (each an “**Inducement Letter**” and together, the “**Inducement Letters**”). The Inducement Placement Agent Warrants were issued by the Company pursuant an engagement agreement, dated February 13, 2025, between the Company and H.C. Wainwright & Co., LLC (the “**HCW Engagement Letter**”).

In connection with this opinion, we have examined and relied upon the Registration Statement, the Prospectus, the Inducement Letters, the HCW Engagement Letter, the 2025 Inducement Warrants, the Company’s certificate of incorporation and bylaws, each as currently in effect, and such other records, documents, opinions, certificates, memoranda and instruments as in our judgment are necessary or appropriate to enable us to render the opinion expressed below.

15260 Ventura Boulevard, 20th Floor * Sherman Oaks, California 91403
office > 818.444.4500 * fax > 818.444.4520

1316 3rd Street Promenade, Suite 107 * Santa Monica, California 90401
office > 310.746.9800 * fax > 310.395.5292

GT Biopharma, Inc.
March 6, 2025
Page 2

We have assumed the genuineness of all signatures, the authenticity of all documents submitted to us as originals, the conformity to originals of all documents submitted to us as copies, the accuracy, completeness and authenticity of certificates of public officials and the due authorization, execution and delivery of all documents by all persons other than the Company where authorization, execution and delivery are prerequisites to the effectiveness thereof. As to any factual matters, we have made no independent investigation of such facts and have relied, to the extent that we deem such reliance proper, upon certificates of public officials and officers or other representatives of the Company.

Our opinion herein is expressed solely with respect to the General Corporation Law of the State of Delaware. Our opinion is based on these laws as in effect on the date hereof. We express no opinion as to whether the laws of any other jurisdiction are applicable to the subject matter hereof and express no opinion and provide no assurance as to compliance with any federal or state law, rule or regulation relating to securities or to the sale or issuance thereof.

With respect to the Inducement Warrant Shares, we express no opinion to the extent that future issuances of securities of the Company, adjustments to outstanding securities of the Company or other matters cause the 2025 Inducement Warrants to be exercisable for more shares of Common Stock than the number available for issuance by the Company. Further, we have assumed that the exercise price of the 2025 Inducement Warrants will not be adjusted to an amount below the par value per share of the Common Stock.

On the basis of the foregoing and in reliance thereon, and subject to the qualifications herein stated, we are of the opinion that upon the valid exercise of the 2025 Inducement Warrants in accordance with their terms, and in accordance with and in the manner described in the Registration Statement and the Prospectus, the Inducement Warrant Shares will be validly issued, fully paid and non-assessable.

We hereby consent to the filing of this opinion as an exhibit to the Registration Statement and to the reference to our firm under the caption “**Legal Matters**” in the Prospectus which forms part of the Registration Statement. In giving our consent, we do not hereby admit that we are in the category of persons whose consent is required under Section 7 of the Securities Act or the rules and regulations thereunder. This opinion is expressed as of the date hereof, and we disclaim any undertaking to advise you of any subsequent changes in the facts stated or assumed herein or of any subsequent changes in applicable law.

Sincerely,

/s/ Stubbs Alderton & Markiles, LLP

Stubbs Alderton & Markiles, LLP

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We consent to the incorporation by reference in this Registration Statement on Form S-3 (File 333- _____) of GT Biopharma, Inc. of our report dated February 21, 2025, which includes an explanatory paragraph regarding the Company's ability to continue as a going concern, relating to the financial statements of GT Biopharma, Inc. as of December 31, 2024 and 2023 which appear in GT Biopharma, Inc.'s Annual Report on Form 10-K for the fiscal year ended December 31, 2024 filed with the Securities and Exchange Commission on February 21, 2025. We also consent to the reference to our firm under the heading "Experts" in such Registration Statement and related Prospectus.

/s/ Weinberg & Company, P.A.

March 6, 2025
Los Angeles, California

Calculation of Filing Fee Tables

Form S-3
(Form Type)

GT Biopharma, Inc.
(Exact Name of Registrant as Specified in its Charter)

Table 1: Newly Registered Securities and Carry Forward Securities

	Security Type	Security Class Title	Fee Calculation or Carry Forward Rule	Amount Registered (1)	Proposed Maximum Offering Price Per Unit ⁽²⁾	Maximum Aggregate Offering Price	Fee Rate	Amount of Registration Fee
Fees to be Paid	Equity	Common Stock, \$0.001 par value per share	457(c)	625,283	\$ 2.25	\$ 1,406,886.75	\$ 0.00015310	\$ 215.40
Fees Previously Paid	—	—	—	—	—	—	—	—
		Total Offering Amounts				\$ 1,406,886.75		\$ 215.40
		Total Fees Previously Paid						—
		Total Fee Offsets						—
		Net Fee Due						\$ 215.40

(1) Represents an aggregate of 625,283 shares of common stock of the Registrant issuable upon the exercise of outstanding Series A Inducement Warrants, Series B Inducement Warrants and Placement Agent Common Stock Purchase Warrants to purchase shares of common stock that will be offered for resale by the selling stockholders pursuant to the prospectus contained herein. Pursuant to Rule 416(a) under the Securities Act of 1933, as amended (the "Securities Act"), this registration statement also covers any additional securities that may be offered or issued in connection with any stock splits, stock dividends, recapitalizations other or similar transactions.

(2) Estimated solely for the purpose of computing the registration fee pursuant to Rule 457(c) under the Securities Act, based on the average of the high and low price per share of the Registrant's common stock as reported on The Nasdaq Capital Market on February 27, 2025.