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

FORM S-8
REGISTRATION STATEMENT
Under
The Securities Act of 1933

Artelo Biosciences, Inc.

(Exact name of registrant as specified in its charter)

Nevada

(State or other jurisdiction of
incorporation or organization)

33-1220924

(I.R.S. Employer
Identification Number)

**505 Lomas Santa Fe, Suite 160
Solana Beach, CA 92075**

(Address of Principal Executive Offices, including zip code)

Artelo Biosciences, Inc. 2018 Equity Incentive Plan

(Full title of the plan)

Gregory D. Gorgas

Chief Executive Officer and President

505 Lomas Santa Fe, Suite 160

Solana Beach, CA 92075

Telephone: (858) 925-7049

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

Copies to:

Martin J. Waters

Wilson Sonsini Goodrich & Rosati, P.C.

12235 El Camino Real

San Diego, CA 92130

Telephone: (858) 350-2300

Facsimile: (858) 350-2399

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

Large accelerated filer	<input type="checkbox"/>	Accelerated filer	<input type="checkbox"/>
Non-accelerated filer	<input checked="" type="checkbox"/>	Smaller reporting company	<input checked="" type="checkbox"/>
		Emerging growth company	<input type="checkbox"/>

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.

EXPLANATORY NOTE

REGISTRATION OF ADDITIONAL SECURITIES PURSUANT TO GENERAL INSTRUCTION E

This Registration Statement on Form S-8 (the “Registration Statement”) is being filed to register an additional 478,344 shares of common stock of Artelo Biosciences, Inc. (the “Registrant”) reserved for issuance pursuant to future awards under the Registrant’s 2018 Equity Incentive Plan, as amended (the “2018 Plan”).

These additional shares of common stock are securities of the same class as other securities for which previous Registration Statements on Form S-8 were filed by the Registrant with the Securities and Exchange Commission (the “SEC”) on January 15, 2020 (File No. 333-235916), June 25, 2020 (File No. 333-239434), December 16, 2020 (File No. 333-251387), April 7, 2022 (File No. 333-264183), and April 21, 2023 (File No. 333-271391) (collectively, the “Previous Registration Statements”). In accordance with General Instruction E of Form S-8, the contents of the Previous Registration Statements, including periodic reports filed after the Previous Registration Statements to maintain current information about the Registrant, are incorporated by reference into this Registration Statement.

PART II

INFORMATION REQUIRED IN REGISTRATION STATEMENT

Item 3. Incorporation of Documents by Reference.

The Registrant hereby incorporates by reference into this Registration Statement the following documents previously filed with the SEC:

- (1) The Registrant's Annual Report on [Form 10-K](#) (File No. 001-38951) for the fiscal year ended December 31, 2023 filed with the SEC on March 25, 2024;
- (2) The Registrant's Current Report on [Form 8-K](#) filed with the SEC on March 4, 2024;
- (3) All other reports filed with the SEC pursuant to Sections 13(a) or 15(d) of the Securities Exchange Act of 1934, as amended (the "Exchange Act") since the end of the fiscal year covered by the Registrant's Annual Report referred to in (1) above (other than the portions of these documents not deemed to be filed); and
- (4) The description of the Registrant's capital stock contained in the Registrant's Annual Report on Form 10-K filed with the SEC on March 25, 2024, pursuant to Section 12(b) of the Exchange Act, including any amendment or report filed for the purpose of updating such description.

All documents filed by the Registrant pursuant to Sections 13(a), 13(c), 14 and 15(d) of the Exchange Act on or after the date of this Registration Statement and prior to the filing of a post-effective amendment to this Registration Statement that indicates that all securities offered have been sold or that deregisters all securities then remaining unsold shall be deemed to be incorporated by reference in this Registration Statement and to be part hereof from the date of filing of such documents; *provided, however*, that documents or information deemed to have been furnished and not filed in accordance with the rules of the SEC shall not be deemed incorporated by reference into this Registration Statement. Any statement contained in a document incorporated or deemed to be incorporated by reference herein shall be deemed to be modified or superseded for purposes of this Registration Statement to the extent that a statement contained herein or in any subsequently filed document which also is deemed to be incorporated by reference herein modifies or supersedes such statement. Any such statement so modified or superseded shall not be deemed, except as so modified or superseded, to constitute a part of this Registration Statement.

Item 8. Exhibits.

Exhibit Number	Description
4.1	Specimen Common Stock Certificate of the Registrant (which is incorporated herein by reference to Exhibit 4.1 to the Registrant's Registration Statement on Form S-8 (Registration No. 333-251387) filed with the SEC on December 16, 2020).
4.2+	Artelo Biosciences, Inc. 2018 Equity Incentive Plan, as amended and Forms of Award Agreements thereunder (which is incorporated herein by reference to Exhibit 99.1 to the Registrant's Registration Statement on Form S-8 (Registration No. 333-251387) filed with the SEC on December 16, 2020).
5.1*	Opinion of Fennemore Craig, P.C.
23.1*	Consent of MaloneBailey, LLP, Independent Registered Public Accounting Firm.
23.2*	Consent of Fennemore Craig, P.C. (contained in Exhibit 5.1 hereto).
24.1*	Power of Attorney (contained on the signature page hereto).
107*	Filing Fee Table

+ Indicates management contract or compensatory plan, contract or arrangement.

* Filed herewith

SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, the registrant certifies that it has reasonable grounds to believe that it meets all of the requirements for filing on Form S-8 and has duly caused this registration statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of San Diego, State of California, on March 28, 2024.

ARTELO BIOSCIENCES, INC.

By: /s/ Gregory D. Gorgas

Name: Gregory D. Gorgas

Title: President & Chief Executive Officer

Power of Attorney

KNOW ALL PERSONS BY THESE PRESENTS, that each person whose signature appears below hereby constitutes and appoints Gregory D. Gorgas, as his or her true and lawful attorney-in-fact and agent with full power of substitution and resubstitution, for such person in any and all capacities, to sign any and all amendments to this Registration Statement (including post-effective amendments) on Form S-8, and to file the same, with all exhibits thereto and other documents in connection therewith, with the Securities and Exchange Commission, granting unto said attorney-in-fact, proxy, and agent full power and authority to do and perform each and every act and thing requisite and necessary to be done in connection therewith, as fully for all intents and purposes as such person might or could do in person, hereby ratifying and confirming all that any said attorney-in-fact, proxy and agent, or his substitute, may lawfully do or cause to be done by virtue hereof.

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 indicated:

<u>Name</u>	<u>Title</u>	<u>Date</u>
<u>/s/ Gregory D. Gorgas</u> Gregory D. Gorgas	President, Chief Executive Officer, Chief Financial Officer, Treasurer, and Director (Principal Executive Officer, Principal Financial Officer and Principal Accounting Officer)	March 28, 2024
<u>/s/ Connie Matsui</u> Connie Matsui	Director, Chair of the Board	March 28, 2024
<u>/s/ Steven Kelly</u> Steven Kelly	Director	March 28, 2024
<u>/s/ Douglas Blayney</u> Douglas Blayney	Director	March 28, 2024
<u>/s/ R. Martin Emanuele</u> R. Martin Emanuele	Director	March 28, 2024
<u>/s/ Tamara A. (Seymour) Favorito</u> Tamara A. (Seymour) Favorito	Director	March 28, 2024
<u>/s/ Gregory R. Reyes</u> Gregory R. Reyes	Director	March 28, 2024

FENNEMORE.

March 28, 2024

Artelo Biosciences, Inc.
505 Lomas Santa Fe, Suite 160
Solano Beach, CA 92075

Re: Registration Statement on Form S-8

Ladies and Gentlemen:

You have requested our opinion with respect to certain matters in connection with the registration under the Securities Act of 1933, as amended (the "Act"), by Artelo Biosciences, Inc., a Nevada corporation (the "Company"), by means of a registration statement on Form S-8 (as it may be amended and supplemented, the "Registration Statement"), filed with the Securities and Exchange Commission (the "Commission"), of an additional 478,344 shares (the "Incentive Shares") of common stock, par value \$0.001 per share of the Company (the "Common Stock"), that will be issued pursuant to the Artelo Biosciences, Inc. 2018 Equity Incentive Plan, as amended (the "Plan").

In connection with this opinion, we have examined and relied upon (i) the Registration Statement, (ii) the Plan and (iii) the Company's Articles of Incorporation and Bylaws, each as amended and currently in effect, and the originals or copies certified to our satisfaction of such other documents, records, certificates, memoranda and other instruments as in our judgment are necessary or appropriate to enable us to render the opinion expressed below.

We have examined originals or copies of such other corporate records, certificates of corporate officers and public officials and other agreements and documents as we have deemed necessary or advisable for purposes of this opinion letter. We have relied upon the certificates of all public officials and corporate officers with respect to the accuracy of all factual matters contained therein. With respect to the Incentive Shares, we have assumed that at the time of issuance, the Company has sufficient authorized, but unissued shares available to allow for such issuance.

On the basis of the foregoing, and in reliance thereon, we are of the opinion that when Incentive Shares are issued pursuant to the Plan or pursuant to stock options or other instruments that have been issued pursuant to the Plan, such Incentive Shares will be validly issued, fully paid and nonassessable.

FENNEMORE.

March 28, 2024

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Our opinion is limited to the laws of the State of Nevada. We express no opinion as to the effect of the law of any other jurisdiction. Our opinion is rendered as of the date hereof, and we assume no obligation to advise you of changes in law or fact (or the effect thereof on the opinions expressed herein) that hereafter may come to our attention.

We hereby consent to the inclusion of this opinion as Exhibit 5.1 to the Registration Statement and to the references to our firm therein and in the Prospectus and in any Prospectus Supplement under the caption "Legal Matters." In giving our consent, we do not 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.

Very truly yours,

/s/ Fennemore Craig, P.C.

Fennemore Craig, P.C.

CETE/cdol

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We consent to the incorporation by reference in this Registration Statement on Form S-8 of our report dated March 24, 2024 with respect to the audited consolidated financial statements of Artelo Biosciences, Inc. (the "Company") for the year ended December 31, 2023.

/s/ MaloneBailey, LLP
www.malonebailey.com
Houston, Texas
March 24, 2024

Calculation of Filing Fee Tables

Form S-8
(Form Type)

Artelo Biosciences, Inc.
(Exact name of registrant as specified in its charter)

Table 1 – Newly Registered Securities							
Security Type	Security Class Title	Fee Calculation Rule	Amount Registered ⁽¹⁾	Proposed Maximum Offering Price Per Unit	Maximum Aggregate Offering Price	Fee Rate	Amount of Registration Fee
Equity	Common Stock, par value \$0.001 per share, reserved for issuance under the Registrant's 2018 Equity Incentive Plan, as amended	Rule 457(c) and Rule 457(h)	478,344	\$1.45 ⁽²⁾	\$693,599	\$147.60 per \$1,000,000	\$103.00
Total Offering Amounts					\$693,599		\$103.00
Total Fee Offsets⁽³⁾							–
Net Fee Due							\$103.00

- (1) Pursuant to Rule 416(a) of the Securities Act of 1933, as amended (the “Securities Act”), this registration statement (the “Registration Statement”) shall also cover any additional shares of the Registrant’s Common Stock that become issuable under the Registrant's 2018 Equity Incentive Plan, as amended (the “2018 Plan”) by reason of any stock dividend, stock split, recapitalization or other similar transaction effected without receipt of consideration or conversion of the Registrant’s Common Stock that increases the number of outstanding shares of Common Stock.
- (2) Pursuant to Rule 457(c) and 457(h) under the Securities Act, and solely for the purpose of calculating the registration fee, the proposed maximum offering price per share is \$1.45, which is the average of the high and low prices of shares of Common Stock on The Nasdaq Capital Market (“Nasdaq”) on March 26, 2024 (such date being within five business days of the date that this Registration Statement was filed with the U.S. Securities and Exchange Commission).
- (3) The Registrant does not have any fee offsets.