UNITED STATES SECURITIES AND EXCHANGE COMMISSION

WASHINGTON, D.C. 20549

SCHEDULE 14A

Proxy Statement Pursuant to Section 14(a) of the Securities Exchange Act of 1934 (Amendment No.)

Filed by the Registrant □					
Filed	Filed by a Party other than the Registrant \Box				
Chec	Check the appropriate box:				
\boxtimes	Preliminary Proxy Statement				
	Confidential, for Use of the Commission Only (as permitted by Rule 14a-6(e)(2))				
	Definitive Proxy Statement				
	Definitive Additional Materials				
	Soliciting Material Under §240.14a-12				
	SYNLOGIC, INC. (Name of Registrant as Specified In Its Charter)				
	(Name of Person(s) Filing Proxy Statement, if other than the Registrant)				
Payn	Payment of Filing Fee (Check the appropriate box):				
\boxtimes	No fee required.				
	Fee paid previously with preliminary materials.				
	Fee computed on table in exhibit required by Item 25(b) per Exchange Act Rules 14a-6(i)(1) and 0-11.				



September , 2023

To Our Stockholders:

You are cordially invited to attend a special meeting of stockholders of Synlogic, Inc. ("*Synlogic*"). The meeting will be held on Thursday, September 21, 2023 at 9:00 a.m. ET. The meeting will be held in a virtual meeting format only. You will not be able to attend the meeting in person. You can attend online, vote your shares electronically, and submit your questions during the meeting by visiting www.virtualshareholdermeeting.com/SYBX2023SM and entering your 16-digit control number found on the Notice of Internet Availability or the proxy card that you receive. Further information about the meeting, the business to be conducted at the meeting, and information about Synlogic that you should consider when you vote your shares are described in this proxy statement.

The agenda for this special meeting includes (i) the approval of a proposed amendment to our Amended and Restated Certificate of Incorporation, as amended, to effect a reverse stock split at a ratio of not less than 1-for-5 and not greater than 1-for-15, with the exact ratio to be set within that range at the discretion of our Board of Directors (the "Reverse Split") and (ii) the approval of an adjournment of the special meeting to a later date or dates, if necessary or appropriate, to solicit additional proxies if there are insufficient votes to adopt the Reverse Split proposal. The Board of Directors recommends the approval of each of these proposals as set forth in this proxy statement. Such other business will be transacted as may properly come before the special meeting.

Under Securities and Exchange Commission rules that allow companies to furnish proxy materials to stockholders over the internet, we have elected to deliver our proxy materials to the majority of our stockholders digitally. On September , 2023, we intend to begin sending to our stockholders a Notice of Internet Availability of Proxy Materials (the "Notice") containing instructions on how to access our proxy statement for the special meeting. The Notice also provides instructions on how to vote online or by telephone, how to receive a paper copy of the proxy materials by mail and how to access the virtual meeting.

We hope you will be able to attend the special meeting. Whether you plan to attend the meeting or not, it is important that you cast your vote. You may vote over the internet as well as by telephone or by mail. When you have finished reading the proxy statement, you are urged to vote in accordance with the instructions set forth in this proxy statement. We encourage you to vote by proxy so that your shares will be represented and voted at the meeting.

Thank you for your continued support of Synlogic, Inc. We look forward to you joining us at the special meeting.

Sincerely,

Aoife Brennan
President and CEO



September , 2023

NOTICE OF SPECIAL MEETING OF STOCKHOLDERS

Time: 9:00 a.m. Eastern Time

Date: Thursday, September 21, 2023

Virtual Meeting:The special meeting will be a virtual meeting through which you can listen to the meeting, submit questions and vote online.

You may access the meeting by visiting vary visiting learned democrating com/(VVDY20232M and entering the control.)

You may access the meeting by visiting www.virtualshareholdermeeting.com/SYBX2023SM and entering the control number (included in the Notice of Internet Availability or proxy card that you receive). Stockholders attending the virtual meeting will be afforded the same rights and opportunities to participate as they would at an in-person meeting.

meeting will be afforded the same rights and opportunities to participate as they would at an in-person meeting.

(1) To approve an amendment to our Amended and Restated Certificate of Incorporation, as amended, to effect a reverse stock split at a ratio of not less than 1-for-5 and not greater than 1-for-15, with the exact ratio to be set within that range at the discretion of our Board of Directors without further approval or authorization of our stockholders and with our Board of

Directors able to elect to abandon such proposed amendment and not effect the reverse stock split authorized by

stockholders, in its sole discretion (the "Reverse Split");

(2) To approve the adjournment of the special meeting to a later date or dates, if necessary or appropriate, to solicit additional

proxies if there are insufficient votes to adopt the Reverse Split proposal; and $% \left\{ 1\right\} =\left\{ 1\right\} =\left$

(3) To transact such other business that is properly presented at the special meeting and any adjournments or postponements

thereof.

Who may vote: You may vote if you were the record owner of Synlogic, Inc. common stock at the close of business on August 18, 2023 (the

"Record Date"). A list of registered stockholders as of the close of business on the Record Date will be available at our corporate headquarters for examination by any stockholder for any purpose germane to the special meeting for a period of at least 10 days prior to the special meeting. If you wish to view this list, please contact me, as Corporate Secretary, at Synlogic, Inc., 301 Binney Street, Suite 402, Cambridge, MA 02142. Such list will also be available for examination by the

stockholders during the special meeting at www.virtualshareholdermeeting.com/SYBX2023SM.

All stockholders are cordially invited to attend the virtual special meeting. Whether you plan to attend the meeting or not, we urge you to vote by following the instructions in the Notice of Internet Availability of Proxy Materials that you previously received and submit your proxy by the internet, telephone or mail in order to ensure the presence of a quorum. You may change or revoke your proxy at any time before it is voted at the meeting.

By order of the Board of Directors,

Brendan St. Amant

Purpose:

General Counsel & Corporate Secretary

TABLE OF CONTENTS

	PAGE
Important Information About the Special Meeting and Voting	
Proposal No. 1: Approval of Reverse Stock Split	3
Proposal No. 2: Adjournment Proposal	16
Security Ownership of Certain Beneficial Owners and Management	17
Other Matters	20
Stockholder Proposals and Nominations For Director	21

PRELIMINARY COPIES FILED PURSUANT TO RULE 14a-6(a).

SYNLOGIC, INC. 301 Binney Street, Suite 402 Cambridge, MA 02142

PROXY STATEMENT FOR THE SPECIAL MEETING OF STOCKHOLDERS TO BE HELD ON SEPTEMBER 21, 2023

This proxy statement, along with the accompanying Notice of Special Meeting of Stockholders, contains information about the special meeting of stockholders of Synlogic, Inc., including any adjournments or postponements of the special meeting. We are holding the special meeting at 9:00 a.m., Eastern Time, on September 21, 2023. You will be able to attend the special meeting, vote and submit your questions during the meeting by visiting www.virtualshareholdermeeting.com/SYBX2023SM.

In this proxy statement, we refer to Synlogic, Inc. as "Synlogic," "the Company," "we", and "us."

This proxy statement relates to the solicitation of proxies by our Board of Directors, or Board, for use at the special meeting.

On or about September , 2023, we intend to begin sending to our stockholders the Important Notice Regarding the Availability of Proxy Materials containing instructions on how to access our proxy statement for our virtual-only special meeting of stockholders.

IMPORTANT NOTICE REGARDING THE AVAILABILITY OF PROXY MATERIALS FOR THE STOCKHOLDER MEETING TO BE HELD ON SEPTEMBER 21, 2023

This proxy statement, the Notice of Special Meeting of Stockholders and our form of proxy card are available for viewing, printing and downloading at www.proxyvote.com. To view these materials please have your 16-digit control number(s) available that appears on your Notice or proxy card. On this website, you can also elect to receive future distributions of our proxy statements and annual reports to stockholders by electronic delivery.

Additionally, you can find a copy of our Annual Report on Form 10-K, which includes our financial statements, for the fiscal year ended December 31, 2022 on the website of the Securities and Exchange Commission, or the SEC, at www.sec.gov, or in the "Financials" section of the "Investors & Media" section of our website at www.synlogictx.com. You may also obtain a printed copy of our Annual Report on Form 10-K, including our financial statements, free of charge, from us by sending a written request to: Attn: Investor Relations, Synlogic, Inc., 301 Binney Street, Suite 402, Cambridge, MA 02142. Exhibits will be provided upon written request and payment of an appropriate processing fee.

IMPORTANT INFORMATION ABOUT THE SPECIAL MEETING AND VOTING

Why is the Company Soliciting My Proxy?

The Board of Synlogic is soliciting your proxy to vote at the special meeting of stockholders to be held virtually via live webcast, on Thursday, September 21, 2023, at 9:00 a.m. Eastern Time and any adjournments of the meeting, which we refer to as the special meeting. The proxy statement along with the accompanying Notice of Special Meeting of Stockholders summarizes the purposes of the meeting and the information you need to know to vote at the special meeting. You will be able to participate in the special meeting, vote your shares electronically and submit your questions during the live webcast of the meeting by visiting www.virtualshareholdermeeting.com/SYBX2023SM and entering your 16-digit control number found on the enclosed voting form.

We have made available to you on the internet or have sent you this proxy statement, the Notice of Special Meeting of Stockholders and the proxy card because you owned shares of Synlogic, Inc. common stock on the Record Date. We intend to commence distribution of the Important Notice Regarding the Availability of Proxy Materials, which we refer to throughout this proxy statement as the Notice, and, if applicable, the proxy materials to stockholders on or about September , 2023.

Why does the Company need Stockholders to vote on the Reverse Split?

On December 6, 2022, we received a deficiency letter from the Listing Qualifications Department (the "Staff") of Nasdaq notifying us that because the closing bid price of our common stock was below \$1.00 for 30 consecutive days, the Company no longer met the bid price requirement under Nasdaq rules (the "Bid Price Requirement"). Additionally, following discussions with the Staff regarding the Company's anticipated compliance with the minimum stockholders' equity requirements for continued listing on The Nasdaq Global Select Market versus The Nasdaq Capital Market tier, we applied to transfer the listing of the Company's common stock to The Nasdaq Capital Market, and on June 6, 2023 received confirmation that the Staff had approved the transfer application, effective with the open of trading on June 7, 2023. The Nasdaq Capital Market operates in substantially the same manner as the Nasdaq Global Select Market and listed companies must meet certain financial requirements and comply with Nasdaq's corporate governance requirements, including the Bid Price Requirement.

Pursuant to Nasdaq Listing Rule 5810(c)(3)(A) (the "Compliance Period Rule"), we had an initial period of 180 calendar days, or until June 5, 2023, (the "Compliance Date") to regain compliance with the Bid Price Requirement. To regain compliance, the closing bid price of our common stock must meet or exceed \$1.00 per share for a minimum of 10 consecutive business days as required under the Compliance Period Rule (unless the Staff exercises its discretion to extend this ten-day period pursuant to Nasdaq Listing Rule 5810(c)(3)(H)). On June 6, 2023, we received a notice from the Listing Qualifications Department informing us that Nasdaq granted us an additional 180 calendar days, or until December 4, 2023, to regain compliance with the minimum closing bid price requirement for continued listing on The Nasdaq Capital Market under Nasdaq Marketplace Rule 5550(a)(2). If compliance cannot be demonstrated to Nasdaq's satisfaction by December 4, 2023, Nasdaq will provide written notification that our common stock will be delisted.

The Board has determined that an amendment to our Amended and Restated Certificate of Incorporation to effect the Reverse Split is necessary to the continued listing of our common stock on Nasdaq and is in the best interests of our stockholders. If approved and implemented, the Board will select a Reverse Split ratio of not less than 1-for-5 and not greater than 1-for-15, with the exact ratio and effective time of the Reverse Split to be determined by the Board at any time within three months of the date of the Special Meeting based on various factors, including the then prevailing market conditions and the existing and expected per share trading prices of our common stock. Pursuant to the law of our state of incorporation, Delaware, the Board must adopt any amendment to our Amended and Restated Certificate of Incorporation and submit the amendment to stockholders for approval. Accordingly, the Board is requesting your proxy to vote "FOR" the Reverse Split proposal and "FOR" the adjournment proposal.

In addition to bringing the per share trading price of our common stock back above \$1.00, we also believe that the Reverse Split will make our common stock more attractive to a broader range of institutional and other investors, as we have been advised that the current per share trading price of our common stock may affect its acceptability to certain institutional investors, professional investors and other members of the investing public. Many brokerage houses and institutional investors have internal policies and practices that either prohibit them from investing in low-priced stocks or tend to discourage individual brokers from recommending low-priced stocks to their customers. In addition, some of those policies and practices may function to make the processing of trades in low-priced stocks economically unattractive to brokers.

Why Did I Receive a Notice in the Mail Regarding the Internet Availability of Proxy Materials Instead of a Full Set of Proxy Materials?

As permitted by the rules of the SEC, we may furnish our proxy materials to our stockholders by providing access to such documents on the internet, rather than mailing printed copies of these materials to each stockholder. Most stockholders will not receive printed copies of the proxy materials unless they request them. We believe that this process should expedite stockholders' receipt of proxy materials, lower the costs of the special meeting and help to conserve natural resources. If you received the Notice by mail or electronically, you will not receive a printed or email copy of the proxy materials, unless you request one by following the instructions included in the Notice. Instead, the Notice instructs you as to how you may access and review all of the proxy materials and submit your proxy on the internet. If you requested a paper copy of the proxy materials, you may authorize the voting of your shares by following the instructions on the proxy card, in addition to the other methods of voting described in this proxy statement.

Why are you Holding a Virtual Special Meeting?

We believe that hosting a virtual meeting is in the best interest of our stockholders and enables increased stockholder attendance and participation. Stockholders attending the virtual meeting will be afforded the same rights and opportunities to participate as they would at an in-person meeting, including the ability to submit questions and comments and to vote.

What Happens if there are Technical Difficulties During the Special Meeting?

We will have technicians ready to assist you with any technical difficulties you may have accessing the virtual special meeting, voting at the special meeting or submitting questions at the special meeting. If you encounter any difficulties accessing the virtual special meeting during the check-in or meeting time, please call the technical support number that will be posted on the virtual stockholder meeting log in page.

Who Can Vote?

Only stockholders of record at the close of business on August 18, 2023 are entitled to vote at the special meeting. On this Record Date, there were 68,604,305 shares of our common stock outstanding and entitled to vote. Our common stock is our only class of voting stock.

If on August 18, 2023 your shares of our common stock were registered directly in your name with our transfer agent, American Stock Transfer & Trust Company, LLC, then you are a stockholder of record.

If on August 18, 2023 your shares were held, not in your name, but rather in an account at a brokerage firm, bank, dealer or other similar organization, then you are the beneficial owner of shares held in "street name" and the Notice is being forwarded to you by that organization. The organization holding your account is considered to be the stockholder of record for purposes of voting at the special meeting. As a beneficial owner, you have the right to direct your broker or other agent regarding how to vote the shares in your account. You are also invited to attend the special meeting. However, since you are not the stockholder of record, you may not vote your shares at the special meeting unless you request and obtain a valid proxy from your broker or other agent.

You do not need to attend the special virtual meeting to vote your shares. Shares represented by valid proxies, received in time for the virtual special meeting and not revoked prior to the special meeting, will be voted at the special meeting. For instructions on how to change or revoke your proxy, see "May I Change or Revoke My Proxy?" below.

How Many Votes Do I Have?

Each share of our common stock that you own entitles you to one vote.

How Do I Vote?

Whether you plan to attend the special meeting or not, we urge you to vote by proxy. All shares represented by valid proxies that we receive through this solicitation, and that are not revoked, will be voted in accordance with your instructions on the proxy card or as instructed via Internet or telephone. You may specify whether your shares should be voted for or withheld for each nominee for director, and whether your shares should be voted for, against or abstain with respect to the other proposal. If you properly submit a proxy without giving specific voting instructions, your shares will be voted in accordance with the Board's recommendations as noted below. Voting by proxy will not affect your right to attend the special meeting. If your shares are registered directly in your name through our stock transfer agent, American Stock Transfer & Trust Company, LLC, or you have stock certificates registered in your name, you may vote:

- **By Internet or by telephone.** Follow the instructions included in the Notice or, if you received printed materials, in the proxy card to vote over the internet or by telephone.
- **By mail.** If you received a proxy card by mail, you can vote by mail by completing, signing, dating and returning the proxy card as instructed on the card. If you sign the proxy card but do not specify how you want your shares voted, they will be voted in accordance with the Board's recommendations as noted below.
- At the time of the virtual special meeting. If you attend the virtual special meeting, you may vote your shares online at the time of the meeting.

Telephone and Internet voting facilities for stockholders of record will be available 24 hours a day and will close at 11:59 p.m. Eastern Time on September 20, 2023.

If your shares are held in "street name" (held in the name of a bank, broker or other holder of record), you will receive instructions from the holder of record. You must follow the instructions of the holder of record in order for your shares to be voted. Telephone and internet voting also will be offered to stockholders owning shares through certain banks and brokers. If your shares are not registered in your own name and you plan to vote your shares at the time of the virtual special meeting, you should contact your broker or agent to obtain a legal proxy or broker's proxy card and vote your shares online at the time of the meeting.

How Does the Board Recommend That I Vote on the Proposals?

The Board recommends that you vote as follows:

- "FOR" approval of an amendment to our Amended and Restated Certificate of Incorporation, as amended, to effect a reverse stock split at a ratio of not less than 1-for-5 and not greater than 1-for-15, with the exact ratio to be set within that range at the discretion of our Board of Directors without further approval or authorization of our stockholders and with our Board of Directors able to elect to abandon such proposed amendment and not effect the reverse stock split authorized by stockholders, in its sole discretion (the "Reverse Split"); and
- "FOR" the approval of an adjournment of the special meeting to a later date or dates, if necessary or appropriate, to solicit additional proxies if there are insufficient votes to adopt the Reverse Split proposal

If any other matter is presented at the special meeting, your proxy provides that your shares will be voted by the proxy holder listed in the proxy in accordance with his or her best judgment. At the time this proxy statement was first made available, we knew of no matters that needed to be acted on at the special meeting, other than those discussed in this proxy statement.

May I Change or Revoke My Proxy?

If you give us your proxy, you may change or revoke it at any time before the special meeting. You may change or revoke your proxy in any one of the following ways:

- if you received a proxy card, by signing a new proxy card with a date later than your previously delivered proxy and submitting it as instructed above:
- by re-voting by internet or by telephone as instructed above;
- by notifying Synlogic's Corporate Secretary in writing before the special meeting that you have revoked your proxy; or
- by attending the virtual special meeting and voting online at the time. Attending the virtual special meeting will not in and of itself revoke a
 previously submitted proxy. You must specifically request at the virtual special meeting that it be revoked.

Your most current vote, whether by telephone, internet or proxy card is the one that will be counted.

What if I Receive More Than One Notice or Proxy Card?

You may receive more than one Notice or proxy card if you hold shares of our common stock in more than one account, which may be in registered form or held in street name. Please vote in the manner described above under "How Do I Vote?" for each account to ensure that all of your shares are voted.

Will My Shares be Voted if I Do Not Vote?

If your shares are registered in your name or if you have stock certificates, they will not be counted if you do not vote as described above under "How Do I Vote?" If your shares are held in street name and you do not provide voting instructions to the bank, broker or other nominee that holds your shares as described above, the bank, broker or other nominee that holds your shares has the authority to vote your unvoted shares without receiving instructions from you as described in this proxy statement. Therefore, we encourage you to provide voting instructions to your bank, broker or other nominee. This ensures your shares will be voted at the special meeting and in the manner you desire. A "broker non-vote" will occur if your broker cannot vote your shares on a particular matter because it has not received instructions from you and does not have discretionary voting authority on that matter or because your broker chooses not to vote on a matter for which it does have discretionary voting authority.

What Vote is Required to Approve Each Proposal and How are Votes Counted?

Proposal 1: Approve the Reverse Stock Split

Assuming that a quorum is present at the special meeting, the affirmative vote of a majority of the votes cast by the stockholders entitled to vote on the Reverse Split proposal is required for the proposal to pass. Assuming that a quorum is present, broker non-votes (if any), abstentions, and shares of common stock that are not present in person or by proxy at the special meeting would have no effect on the Reverse Split Proposal. The Reverse Split proposal is a "routine" matter and therefore a broker may vote on this matter without instructions from the beneficial owner as long as instructions are not given.

Proposal 2: Approve Adjournment of Special Meeting

The affirmative vote of a majority of shares present in person or represented by proxy at the meeting and entitled to vote thereon at the special meeting is required to approve the adjournment of the special meeting to a later date or dates, if necessary or appropriate, to solicit additional proxies if there are insufficient votes to adopt the Reverse Split proposal. Abstentions will be treated as votes against this proposal. Brokerage firms have authority to vote customers' unvoted shares held by the firms in street name on this proposal. Broker non-votes (if any) for such shares (if deemed present or represented by proxy at the special meeting pursuant to Delaware law) will be treated as votes against this proposal.

Is Voting Confidential?

We will keep all the proxies, ballots and voting tabulations private. We only let our Inspector of Elections examine these documents. Management will not know how you voted on a specific proposal unless it is necessary to meet legal requirements. We will, however, forward to management any written comments you make on the proxy card or otherwise provide.

Where Can I Find the Voting Results of the Special Meeting?

The preliminary voting results will be announced at the special meeting, and we will publish preliminary results, or final results if available, in a Current Report on Form 8-K within four business days of the special meeting. If final results are unavailable at the time we file the Form 8-K, then we will file an amended report on Form 8-K to disclose the final voting results within four business days after the final voting results are known.

What Are the Costs of Soliciting these Proxies?

We will pay all of the costs of soliciting these proxies. Our directors and employees may solicit proxies in person or by telephone, fax or email. We will pay these employees and directors no additional compensation for these services. We will ask banks, brokers and other institutions, nominees and fiduciaries to forward these proxy materials to their principals and to obtain authority to execute proxies. We will then reimburse them for their expenses.

What Constitutes a Quorum for the Special Meeting?

The presence, in person or by proxy, of the holders of a majority of the voting power of all outstanding shares of our common stock entitled to vote at the special meeting is necessary to constitute a quorum at the special meeting. Votes of stockholders of record who are present at the special meeting in person or by proxy, abstentions, and broker non-votes are counted for purposes of determining whether a quorum exists.

Attending the Special Meeting

We will host the special meeting at 9:00 a.m. Eastern Time on Thursday, September 21, 2023. You will be able to participate in the special meeting, vote your shares electronically and submit your questions during the live webcast of the meeting by visiting www.virtualshareholdermeeting.com/SYBX2023SM and entering your 16-digit control number found on the enclosed voting form. You need not attend the special meeting in order to vote.

Householding of Disclosure Documents

SEC rules concerning the delivery of disclosure documents allow us or your broker to send a single Notice or, if applicable, a single set of our proxy materials to any household at which two or more of our stockholders reside, if we or your broker believe that the stockholders are members of the same family. This practice, referred to as "householding," benefits both you and us. It reduces the volume of duplicate information received at your

household and helps to reduce our expenses. The rule applies to our Notices, proxy statements and information statements. Once you receive notice from your broker or from us that communications to your address will be "householded," the practice will continue until you are otherwise notified or until you revoke your consent to the practice. Stockholders who participate in householding will continue to have access to and utilize separate proxy voting instructions.

If your household received a single Notice or, if applicable, a single set of proxy materials, but you would prefer to receive your own copy, please contact our Corporate Secretary at Synlogic, Inc., 301 Binney Street, Suite 402, Cambridge MA 02142.

If you do not wish to participate in "householding" and would like to receive your own Notice or, if applicable, set of Synlogic's proxy materials in the future, follow the instructions described below.

Conversely, if you share an address with another Synlogic stockholder and together both of you would like to receive only a single Notice or, if applicable, set of proxy materials, follow these instructions:

- If your Synlogic shares are registered in your own name, please contact our transfer agent, American Stock Transfer & Trust Company, LLC, and inform them of your request by calling them at 1-800-937-5449 or writing them at 6201 15th Avenue, Brooklyn, NY 11219.
- If a broker or other nominee holds your Synlogic shares, please contact the broker or other nominee directly and inform them of your request. Be sure to include your name, the name of your brokerage firm and your account number.

Electronic Delivery of Company Stockholder Communications

Most stockholders can elect to view or receive copies of future proxy materials over the internet instead of receiving paper copies in the mail.

You can choose this option and save the Company the cost of producing and mailing these documents by:

- · following the instructions provided on your Notice or proxy card; or
- following the instructions provided when you vote over the internet.

PROPOSAL NO. 1: APPROVAL OF REVERSE STOCK SPLIT

General

On August 10, 2023, the Board of Directors unanimously approved, subject to stockholder approval, a certificate of amendment to our Amended and Restated Certificate of Incorporation, as amended, to effect a reverse stock split of our outstanding common stock by combining outstanding shares of common stock into a lesser number of outstanding shares of common stock at a ratio of not less than 1-for-5 and not more than 1-for-15, with the exact ratio to be set within this range by our Board of Directors at its sole discretion (the "Reverse Stock Split"). In its sole discretion, the Board of Directors may alternatively elect to abandon such proposed certificate of amendment and not effect the Reverse Stock Split approved by stockholders. Upon the effectiveness of the certificate of amendment to our Amended and Restated Certificate of Incorporation, as amended, effecting the Reverse Stock Split, each share of our common stock will be issued for a specified number of shares in accordance with the ratio for the Reverse Stock Split selected by our Board of Directors.

If our stockholders approve the Reverse Stock Split, our Board of Directors would have the sole discretion to effect the Reverse Stock Split and to fix the specific ratio for the Reverse Stock Split, provided that the ratio would be not less than 1-for-5 and not more than 1-for-15. We believe that enabling our Board of Directors to fix the specific ratio of the Reverse Stock Split within the stated range will provide us with the flexibility to implement the split in a manner designed to maximize the anticipated benefits to us and our stockholders, as described below. The determination of the ratio of the Reverse Stock Split will be based on a number of factors, described further below under the heading "Criteria to be Used for Decision to Apply the Reverse Stock Split."

If our stockholders approve the Reverse Stock Split, the Reverse Stock Split would become effective upon the time specified in the certificate of amendment to our Amended and Restated Certificate of Incorporation, as amended, as filed with the Secretary of State of the State of Delaware. The exact timing of the filing of the certificate of amendment and the Reverse Stock Split will be determined by our Board of Directors based on its evaluation as to when such action will be the most advantageous to us and our stockholders. In addition, our Board of Directors reserves the right, notwithstanding stockholder approval and without further action by our stockholders, to abandon the certificate of amendment and the Reverse Stock Split if, at any time prior to the filing of the certificate of amendment with the Secretary of State, our Board of Directors, in its sole discretion, determines that it is no longer in our best interest and the best interests of our stockholders to proceed.

The primary purpose for effecting the Reverse Stock Split is to increase the per-share trading price of our common stock to:

- maintain the listing of our common stock on the Nasdaq Stock Market ("Nasdaq") and avoid delisting of our common stock from Nasdaq in the future on the basis of the Bid Price Rule (as defined below);
- broaden the pool of investors that may be interested in investing in our company by attracting new investors who would prefer not to invest in shares that trade at lower share prices; and
- make our common stock a more attractive investment to institutional investors.

In evaluating whether to effect the Reverse Stock Split, our Board of Directors has and will continue to consider negative factors associated with reverse stock splits. These factors include the negative perception of reverse stock splits held by many investors, analysts, and other stock market participants and the fact that the stock price of some companies that have effected reverse stock splits has subsequently declined back to pre-reverse stock split levels. In recommending the Reverse Stock Split, our Board of Directors determined that the potential benefits significantly outweighed these potential negative factors.

Criteria to be Used for Decision to Apply the Reverse Stock Split

If our stockholders approve the Reverse Stock Split, our Board of Directors will be authorized to proceed with the Reverse Stock Split. The exact ratio of the Reverse Stock Split, within the 1-for-5 to 1-for-15 range,

would be determined by our Board of Directors and publicly announced by us prior to the effective time of the Reverse Stock Split. In determining whether to proceed with the Reverse Stock Split and setting the appropriate ratio for the Reverse Stock Split, our Board of Directors will consider, among other things, factors such as:

- · Nasdaq's minimum price per share requirements;
- the historical trading prices and trading volume of our common stock;
- the then-prevailing and expected trading prices and trading volume of our common stock and the anticipated impact of the Reverse Stock Split on the trading market for our common stock;
- the anticipated impact of a particular ratio on our ability to reduce administrative and transactional costs;
- · business developments affecting us; and
- prevailing general market and economic conditions.

Reasons for the Reverse Stock Split

Our Board of Directors is seeking authority to effect the Reverse Stock Split with the primary intent of increasing the price of our common stock to meet the price criteria for continued listing on Nasdaq. Our common stock is publicly traded and listed on the Nasdaq Capital Market under the symbol "SYBX." Our Board of Directors believes that, in addition to increasing the price of our common stock to meet the price criteria for continued listing on the Nasdaq Capital Market, the Reverse Stock Split would also make our common stock more attractive to a broader range of institutional and other investors. Accordingly, for these and other reasons discussed below, we believe that effecting the Reverse Stock Split is in the Company's and the stockholders' best interests.

On December 6, 2022, we received a deficiency letter from the Listing Qualifications Department (the "Staff") of Nasdaq notifying us that because the closing bid price of our common stock was below \$1.00 for 30 consecutive days, the Company no longer met the bid price requirement under Nasdaq rules (the "Bid Price Requirement"). Additionally, following discussions with the Staff regarding the Company's anticipated compliance with the minimum stockholders' equity requirements for continued listing on The Nasdaq Global Select Market versus The Nasdaq Capital Market tier, we applied to transfer the listing of the Company's common stock to The Nasdaq Capital Market, and on June 6, 2023 received confirmation that the Staff had approved the transfer application, effective with the open of trading on June 7, 2023. The Nasdaq Capital Market operates in substantially the same manner as the Nasdaq Global Select Market and listed companies must meet certain financial requirements and comply with Nasdaq's corporate governance requirements, including the Bid Price Requirement.

Pursuant to Nasdaq Listing Rule 5810(c)(3)(A) (the "Compliance Period Rule"), we had an initial period of 180 calendar days, or until June 5, 2023, (the "Compliance Date") to regain compliance with the Bid Price Requirement. To regain compliance, the closing bid price of our common stock must meet or exceed \$1.00 per share for a minimum of 10 consecutive business days as required under the Compliance Period Rule (unless the Staff exercises its discretion to extend this ten-day period pursuant to Nasdaq Listing Rule 5810(c)(3)(H)). On June 6, 2023, we received a notice from the Listing Qualifications Department informing us that Nasdaq granted us an additional 180 calendar days, or until December 4, 2023, to regain compliance with the minimum closing bid price requirement for continued listing on The Nasdaq Capital Market under Nasdaq Marketplace Rule 5550(a)(2). If compliance cannot be demonstrated to Nasdaq's satisfaction by December 4, 2023, Nasdaq will provide written notification that our common stock will be delisted.

In the event we are delisted from Nasdaq, the only established trading market for our common stock would be eliminated, and we would be forced to list our shares on the OTC Markets or another quotation medium, depending on our ability to meet the specific listing requirements of those quotation systems. As a result, an investor would likely find it more difficult to trade or obtain accurate price quotations for our shares. Delisting

would likely also reduce the visibility, liquidity, and value of our common stock, reduce institutional investor interest in our company, and may increase the volatility of our common stock. Delisting could also cause a loss of confidence of potential industry partners, lenders, and employees, which could further harm our business and our future prospects. We believe that effecting the Reverse Stock Split may help us avoid delisting from Nasdaq and any resulting consequences.

In addition, our Board of Directors believes that the increase in the market price of our common stock that will result from the Reverse Stock Split could encourage investor interest and improve the marketability of our common stock to a broader range of investors, and thus enhance our liquidity. Because of the trading volatility often associated with low-priced stocks, many brokerage firms and institutional investors have internal policies and practices that either prohibit them from investing in low-priced stocks or tend to discourage individual brokers from recommending low-priced stocks to their customers. Additionally, because brokers' commissions on low-priced stocks generally represent a higher percentage of the stock price than commissions on higher-priced stocks, the current share price of our common stock may result in an investor paying transaction costs that represent a higher percentage of total share value than would be the case if our share price were higher. Our Board of Directors believes that the higher share price that may result from the Reverse Stock Split could enable institutional investors and brokerage firms with such policies and practices to invest in our common stock.

The Reverse Stock Split may not result in a permanent increase in the market price of our common stock, which will continue to be dependent on many factors, including general economic, market and industry conditions and other factors detailed from time to time in the reports we file with the SEC.

Certain Risks Associated with the Reverse Stock Split

There can be no assurance that the total market capitalization of our common stock after the implementation of the Reverse Stock Split will be equal to or greater than the total market capitalization before the Reverse Stock Split. Also, we cannot assure you that the Reverse Stock Split will lead to a sustained increase in the trading price of our common stock. The trading price of our common stock may change due to a variety of other factors, including our ability to successfully accomplish our business goals, market conditions, and the market perception of our business. You should also keep in mind that the implementation of the Reverse Stock Split does not have an effect on the actual or intrinsic value of our business or a stockholder's proportional ownership in our company (subject to the treatment of fractional shares). However, should the overall value of our common stock decline after the proposed Reverse Stock Split, then the actual or intrinsic value of the shares of our common stock held by you will also proportionately decrease as a result of the overall decline in value.

While our Board of Directors has proposed the Reverse Stock Split to bring the price of our common stock back above \$1.00 per share to meet the requirements for the continued listing of our common stock on Nasdaq, there is no guarantee that the price of our common stock will not decrease in the future, or that our common stock will remain in compliance with Nasdaq listing standards. Additionally, there can be no guarantee that the closing bid price of our common stock will remain at or above \$1.00 for 10 consecutive trading days, whether following the Reverse Stock Split or otherwise, which is required to cure our current Nasdaq listing standard deficiency.

Further, the liquidity of our common stock may be harmed by the Reverse Stock Split given the reduced number of shares that would be outstanding after the Reverse Stock Split, particularly if the expected increase in stock price as a result of the Reverse Stock Split is not sustained. For instance, the Reverse Stock Split may increase the number of stockholders who own odd lots (less than 100 shares) of our common stock, creating the potential for such stockholders to experience an increase in the cost of selling their shares and greater difficulty effecting sales. If we effect the Reverse Stock Split, the resulting per-share stock price may nevertheless fail to attract institutional investors and may not satisfy the investing guidelines of such investors and, consequently, the trading liquidity of our common stock may not improve.

Effect of the Reverse Stock Split

If our stockholders approve the Reverse Stock Split and our Board of Directors elects to effect the Reverse Stock Split, we would adjust and proportionately decrease the number of shares of our common stock reserved for issuance upon exercise of, and adjust and proportionately increase the exercise price of, all options and warrants and other rights to acquire our common stock. In addition, as of the effective time of the Reverse Stock Split, we would adjust and proportionately decrease the total number of shares of our common stock that may be the subject of the future grants under our stock plans.

The Reverse Stock Split would be effected simultaneously for all outstanding shares of our common stock. The Reverse Stock Split would affect all of our stockholders uniformly and would not change any stockholder's percentage ownership interest in our company, except to the extent that the Reverse Stock Split results in any of our stockholders owning fractional shares. We will not issue any fractional shares as a result of the Reverse Stock Split, and in lieu thereof any stockholders that would otherwise be entitled to receive a fractional share will be entitled to a cash payment. The Reverse Stock Split would not change the terms of our common stock. The Reverse Stock Split is not intended as, and would not have the effect of, a "going private transaction" covered by Rule 13e-3 under the Exchange Act. Following the Reverse Stock Split, we would continue to be subject to the periodic reporting requirements of the Exchange Act.

After the effective time of the Reverse Stock Split, our common stock will have a new Committee on Uniform Securities Identification Procedures ("CUSIP") number, which is a number used to identify our equity securities, and stock certificates with the older CUSIP numbers will need to be exchanged for stock certificates with the new CUSIP numbers by following the procedures described below.

Our directors and executive officers have no substantial interests, directly or indirectly, in the matters set forth in the Reverse Stock Split, except to the extent of their ownership in shares of our common stock and securities exercisable for our common stock, which shares and securities would be subject to the same proportionate adjustment in accordance with the terms of the Reverse Stock Split as all other outstanding shares of our common stock and securities exercisable for our common stock.

Authorized Shares of Common Stock

We are currently authorized under our Amended and Restated Certificate of Incorporation, as amended, to issue up to a total of 255,000,000 shares of capital stock, comprised of 250,000,000 shares of common stock and 5,000,000 shares of preferred stock. While the Reverse Stock Split would decrease the number of outstanding shares of our common stock, it would not change the number of authorized shares under our Amended and Restated Certificate of Incorporation, as amended. Consequently, the Reverse Stock Split would have the effect of increasing the number of shares of common stock available for issuance under our Amended and Restated Certificate of Incorporation, as amended. Our Board of Directors believes that such an increase is in our and our stockholders' best interests as it would provide us with greater flexibility to issue shares of common stock in connection with possible future financings as under our equity incentive plans and for other general corporate purposes.

By increasing the number of authorized but unissued shares of common stock, the Reverse Stock Split could, under certain circumstances, have an anti-takeover effect, although this is not the intent of our Board of Directors. For example, our Board of Directors might be able to delay or impede a takeover or transfer of control of our company by causing such additional authorized but unissued shares to be issued to holders who might side with our Board of Directors in opposing a takeover bid that the Board of Directors determines is not in the best interests of our company or our stockholders. The Reverse Stock Split could therefore have the effect of discouraging unsolicited takeover attempts. By potentially discouraging initiation of any such unsolicited takeover attempts the Reverse Stock Split could limit the opportunity for our stockholders to dispose of their shares at the higher price generally available in takeover attempts or that may be available under a merger proposal. The Reverse Stock Split could have the effect of permitting our current management, including our

current Board of Directors, to retain its position, and place it in a better position to resist changes that stockholders may wish to make if they are dissatisfied with the conduct of our business. However, our Board of Directors is not aware of any attempt to take control of our company and the Board of Directors did not authorize the Reverse Stock Split with the intent that it be utilized as a type of anti-takeover device.

Procedure for Effecting a Reverse Stock Split and Exchange of Stock Certificates

If stockholders approve the Reverse Stock Split, and if our Board of Directors determines to effect the Reverse Stock Split (with the ratio to be determined in the discretion of the board within the parameters described), we will file with the Secretary of State of the State of Delaware a certificate of amendment to our Amended and Restated Certificate of Incorporation, as amended, in the form attached hereto as Appendix A (the "Certificate of Amendment"), reflecting such reverse stock split ratio determined by the Board of Directors. The Reverse Stock Split will become effective at the time and on the date of filing of, or at such later time as is specified in, the Certificate of Amendment, which we refer to as the "effective time" and the "effective date," respectively. The effective time of the Certificate of Amendment shall be determined in the discretion of our Board of Directors and in accordance with applicable law. Beginning at the effective time, each certificate representing shares of common stock will be deemed for all corporate purposes to evidence ownership of the number of whole shares into which the shares previously represented by the certificate were combined pursuant to the Reverse Stock Split.

Our Board of Directors has approved the amendment to our Amended and Restated Certificate of Incorporation, as amended. The ratio of the Reverse Stock Split, within the parameters described, and the implementation and timing of such Reverse Stock Split shall be determined in the discretion of our Board of Directors.

If the Reverse Stock Split is implemented, our transfer agent will advise registered stockholders of the procedures to be followed to exchange certificates in a letter of transmittal to be sent to stockholders. No written confirmations will be issued to a stockholder until the stockholder has surrendered the stockholder's outstanding certificate(s), together with the properly completed and executed letter of transmittal, to our transfer agent. Any old shares submitted for transfer, whether pursuant to a sale, other disposition or otherwise, will automatically be exchanged for new shares. Our common stock will also receive a new CUSIP number.

Certain of our registered stockholders hold some or all of their shares electronically in book-entry form with our transfer agent. These stockholders do not hold physical certificates evidencing their ownership of our common stock. However, they are provided with a statement reflecting the number of shares of our common stock registered in their accounts. If a stockholder holds shares of common stock in book-entry form with our transfer agent, no action needs to be taken to receive post-Reverse Stock Split shares or payment in lieu of fractional shares, if applicable. If a stockholder is entitled to post-Reverse Stock Split shares, a transaction statement will automatically be sent to the stockholder's address of record indicating the number of shares of our common stock held following the Reverse Stock Split.

Upon the Reverse Stock Split, we intend to treat stockholders holding our common stock in "street name," through a broker, bank or other nominee, in the same manner as registered stockholders whose shares are registered in their names. Brokers, banks or other nominees will be instructed to effect a reverse stock split for their beneficial holders holding our common stock in "street name." However, these brokers, banks or other nominees may have different procedures than registered stockholders for processing a reverse stock split. If you hold your shares with a broker, bank or other nominee and if you have any questions in this regard, we encourage you to contact your nominee.

Fractional Shares

We will not issue fractional shares in connection with the Reverse Stock Split. Instead, stockholders who otherwise would be entitled to receive fractional shares because they hold a number of shares not evenly divisible

by the Reverse Stock Split ratio would be entitled to receive a cash payment in lieu thereof at a price equal to the fraction of a share to which the stockholder would otherwise be entitled multiplied by the closing price of our common stock as reported on Nasdaq on the effective date of the Reverse Stock Split.

No Appraisal Rights

No action is proposed herein for which the laws of the State of Delaware, or our Amended and Restated Certificate of Incorporation, as amended, or our Amended and Restated Bylaws, provide a right to our stockholders to dissent and obtain an appraisal of, or payment for, such stockholders' capital stock.

Accounting Matters

The Reverse Stock Split would not affect the per-share par value of our common stock, which would remain at \$0.001 par value per share, while the number of outstanding shares of common stock would decrease in accordance with the Reverse Stock Split ratio. As a result, as of the effective time of the Reverse Stock Split, the stated capital attributable to common stock on our balance sheet would decrease, and the additional paid-in capital account on our balance sheet would increase by an offsetting amount. Following the Reverse Stock Split, the reported per-share net income or loss would be higher because there would be fewer shares of common stock outstanding, and we would adjust historical per share amounts set forth in our future financial statements.

Reservation of Right to Abandon the Amendment to our Restated Certificate of Incorporation, As Amended

Our Board of Directors reserves the right to abandon the amendment to our Amended and Restated Certificate of Incorporation, as amended, described in this proposal without further action by our stockholders at any time before the effective time, even if stockholders approve such amendment at the special meeting. By voting in favor of the amendment to our Amended and Restated Certificate of Incorporation, as amended, stockholders are also expressly authorizing the Board of Directors to determine not to proceed with and abandon the Reverse Stock Split if it should so decide.

Material U.S. Federal Income Tax Consequences of the Reverse Stock Split

The following discussion summarizes the material U.S. federal income tax consequences of the proposed Reverse Stock Split to us and to U.S. Holders (as defined below). This discussion is based on the Internal Revenue Code of 1986, as amended, which we refer to as the Code, U.S. Treasury Regulations promulgated thereunder, judicial decisions, and published rulings and administrative pronouncements of the U.S. Internal Revenue Service, which we refer to as the IRS, in each case in effect as of the date of this proxy statement. These authorities may change or be subject to differing interpretations. Any such change or differing interpretation may be applied retroactively in a manner that could adversely affect a U.S. Holder. We have not sought and will not seek any rulings from the IRS regarding the matters discussed below, and there can be no assurance that the IRS or a court will not take a contrary position to that discussed below regarding the tax consequences of the proposed Reverse Stock Split.

For purposes of this discussion, a "U.S. Holder" is a beneficial owner of our common stock that, for U.S. federal income tax purposes, is or is treated as (i) an individual who is a citizen or resident of the United States; (ii) a corporation (or any other entity or arrangement treated as a corporation) created or organized under the laws of the United States, any state thereof, or the District of Columbia; (iii) an estate, the income of which is subject to U.S. federal income tax regardless of its source; or (iv) a trust if (1) its administration is subject to the primary supervision of a court within the United States and all of its substantial decisions are subject to the control of one or more "United States persons" (within the meaning of Section 7701(a)(30) of the Code), or (2) it has a valid election in effect under applicable U.S. Treasury regulations to be treated as a United States person.

This discussion is limited to U.S. Holders who hold our common stock as a "capital asset" within the meaning of Section 1221 of the Code (generally, property held for investment). This discussion does not address all U.S. federal income tax consequences relevant to the particular circumstances of a U.S. Holder, including the impact of the Medicare contribution tax on net investment income. In addition, it does not address consequences relevant to U.S. Holders that are subject to special rules, including, without limitation, financial institutions, insurance companies, real estate investment trusts, regulated investment companies, grantor trusts, tax-exempt organizations, dealers or traders in securities, commodities or currencies, stockholders who hold our common stock as part of a position in a straddle or as part of a hedging, conversion or integrated transaction for U.S. federal income tax purposes, persons whose functional currency is not the U.S. dollar, persons who acquired their common stock pursuant to the exercise of employee stock options or otherwise as compensation, or U.S. Holders who acqually or constructively own 10% or more of our voting stock.

If a partnership (or other entity treated as a partnership for U.S. federal income tax purposes) is the beneficial owner of our common stock, the U.S. federal income tax treatment of a partner in the partnership will generally depend on the status of the partner and the activities of the partnership. Accordingly, partnerships (and other entities treated as partnerships for U.S. federal income tax purposes) holding our common stock and the partners in such entities should consult their own tax advisors regarding the U.S. federal income tax consequences of the proposed Reverse Stock Split to them.

In addition, the following discussion does not address the U.S. federal estate and gift tax, alternative minimum tax, or state, local, and non-U.S. tax law consequences of the proposed Reverse Stock Split. Furthermore, the following discussion does not address any tax consequences of transactions effectuated before, after, or at the same time as the proposed Reverse Stock Split, whether or not they are in connection with the proposed Reverse Stock Split. This discussion should not be considered as tax or investment advice, and the tax consequences of the proposed Reverse Stock Split may not be the same for all stockholders.

Each stockholder should consult his, her or its own tax advisors concerning the particular U.S. federal tax consequences of the proposed Reverse Stock Split, as well as the consequences arising under the laws of any other taxing jurisdiction, including any state, local or foreign tax consequences.

Tax Consequences to the Company.

The proposed Reverse Stock Split is intended to be treated as a "recapitalization" pursuant to Section 368(a)(1)(E) of the Code. As a result, we should not recognize taxable income, gain, or loss in connection with the proposed Reverse Stock Split.

Tax Consequences to U.S. Holders.

A U.S. Holder generally should not recognize gain or loss upon the proposed Reverse Stock Split for U.S. federal income tax purposes, except with respect to cash received in lieu of a fractional share of our common stock, as discussed below. A U.S. Holder's aggregate adjusted tax basis in the shares of our common stock received pursuant to the proposed Reverse Stock Split should equal the aggregate adjusted tax basis of the shares of our common stock exchanged therefor (reduced by the amount of such basis that is allocated to any fractional share of our common stock). The U.S. Holder's holding period in the shares of our common stock received pursuant to the proposed Reverse Stock Split should include the holding period in the shares of our common stock exchanged therefor. U.S. Treasury Regulations provide detailed rules for allocating the tax basis and holding period of shares of common stock surrendered in a recapitalization to shares received in the recapitalization. U.S. Holders of shares of our common stock acquired on different dates and at different prices should consult their tax advisors regarding the allocation of the tax basis and holding period of such shares.

A U.S. Holder that, pursuant to the proposed Reverse Stock Split, receives cash in lieu of a fractional share of our common stock should recognize capital gain or loss in an amount equal to the difference, if any, between the amount of cash received and the portion of the U.S. Holder's aggregate adjusted tax basis in the shares of our

common stock surrendered that is allocated to such fractional share. Such capital gain or loss will be short-term if the pre-Reverse Stock Split shares were held for one year or less at the effective time of the Reverse Stock Split and long-term if held for more than one year.

A U.S. Holder of our common stock may be subject to information reporting and backup withholding on cash paid in lieu of a fractional share in connection with the proposed Reverse Stock Split. A U.S. Holder of our common stock will be subject to backup withholding if such U.S. Holder is not otherwise exempt and such U.S. Holder does not provide its taxpayer identification number in the manner required or otherwise fails to comply with applicable backup withholding tax rules. Backup withholding is not an additional tax. Any amounts withheld under the backup withholding rules may be refunded or allowed as a credit against a U.S. Holder's federal income tax liability, if any, provided the required information is timely furnished to the IRS. U.S. Holders of our common stock should consult their own tax advisors regarding their qualification for an exemption from backup withholding and the procedures for obtaining such an exemption.

The U.S. federal income tax discussion set forth above does not discuss all aspects of U.S. federal income taxation that may be relevant to a particular stockholder in light of such stockholder's circumstances and income tax situation. Accordingly, we urge you to consult with your own tax advisor with respect to all of the potential U.S. federal, state, local, and foreign tax consequences to you of the proposed Reverse Stock Split.

In order to approve this proposal, assuming that a quorum is present at the special meeting, the affirmative vote of a majority of the votes cast by the stockholders entitled to vote on the Reverse Stock Split proposal is required for the proposal to pass.

OUR BOARD OF DIRECTORS RECOMMENDS THAT STOCKHOLDERS VOTE TO APPROVE OF THE REVERSE STOCK SPLIT, AND PROXIES SOLICITED BY THE BOARD WILL BE VOTED IN FAVOR OF SUCH APPROVAL UNLESS A STOCKHOLDER INDICATES OTHERWISE ON THE PROXY.

PROPOSAL NO. 2: ADJOURNMENT PROPOSAL

If at the special meeting, the number of votes represented by shares of the common stock, present or represented and voting in favor of the Reverse Split proposal is insufficient to approve the Reverse Split proposal or establish a quorum, our management may move to adjourn the special meeting in order to enable our Board of Directors to continue to solicit additional proxies in favor of the Reverse Split proposal.

In this proposal, we are asking our stockholders to authorize the holder of any proxy solicited by our Board of Directors to vote in favor of adjourning, postponing or continuing the special meeting and any later adjournments. If our stockholders approve the adjournment proposal, we could adjourn, postpone or continue the special meeting, and any adjourned session of the special meeting, to use the additional time to solicit additional proxies in favor of the Reverse Split proposal, including the solicitation of proxies from stockholders that have previously voted against the proposals. Among other things, approval of the adjournment proposal could mean that, even if proxies representing a sufficient number of votes against the Reverse Split proposal have been received, we could adjourn, postpone or continue the special meeting without a vote on the Reverse Split proposal and seek to convince the holders of those shares to change their votes to votes in favor of the approval of the Reverse Split proposal.

The affirmative vote of a majority of shares present in person or represented by proxy at the meeting and entitled to vote thereon at the special meeting is required to approve the adjournment of the special meeting to a later date or dates, if necessary or appropriate, to solicit additional proxies if there are insufficient votes to adopt the Reverse Split proposal.

THE BOARD OF DIRECTORS RECOMMENDS A VOTE TO APPROVE THE ADJOURNMENT OF THE SPECIAL MEETING TO A LATER DATE OR DATES, IF NECESSARY OR APPROPRIATE, TO SOLICIT ADDITIONAL PROXIES IF THERE ARE INSUFFICIENT VOTES TO ADOPT THE REVERSE SPLIT PROPOSAL, AND PROXIES SOLICITED BY THE BOARD WILL BE VOTED IN FAVOR OF SUCH APPROVAL UNLESS A STOCKHOLDER INDICATES OTHERWISE ON THE PROXY.

SECURITY OWNERSHIP OF CERTAIN BENEFICIAL OWNERS AND MANAGEMENT

The following table sets forth certain information with respect to the beneficial ownership of our common stock as of August 18, 2023 for (a) each of our executive officers, (b) each of our directors, (c) all of our current directors and executive officers as a group and (d) each stockholder known by us to own beneficially more than 5% of our common stock. Beneficial ownership is determined in accordance with the rules of the SEC and includes voting or investment power with respect to the securities. We deem shares of common stock that may be acquired by an individual or group within 60 days of August 18, 2023 pursuant to the exercise of options to be outstanding for the purpose of computing the percentage ownership of such individual or group, but are not deemed to be outstanding for the purpose of computing the percentage ownership of any other person shown in the table. Except as indicated in footnotes to this table, we believe that the stockholders named in this table have sole voting and investment power with respect to all shares of common stock shown to be beneficially owned by them based on information provided to us by these stockholders. Percentage of ownership is based on 68,604,305 shares of common stock outstanding on August 18, 2023.

		Shares Beneficially Owned (1)	
	Number	Percent	
Name and Address of Beneficial Owner**			
Directors and Named Executive Officers:			
Peter Barrett, Ph.D. (2)	3,049,858	4.42%	
Aoife Brennan, MB, BCh, BAO, MMSc (3)	1,386,956	1.99%	
Antoine Awad (4)	401,758	*	
Michael Jensen (5)	162,980	*	
Nick Leschly ⁽⁶⁾	139,117	*	
Patricia Hurter, Ph.D. (7)	155,966	*	
Richard P. Shea (8)	104,500	*	
Edward Mathers (9)	97,000	*	
Michael Burgess, MB, CHB, Ph.D. (10)	87,000	*	
Michael Heffernan (11)	62,000	*	
Lisa Kelly-Croswell (12)	62,000	*	
All directors and current executive officers as a group (11 persons) (13)	5,709,135	8.01%	
Five Percent Stockholders:			
FMR LLC (14)	10,133,439	14.77%	
245 Summer Street			
Boston, MA 02210			
Ginkgo Bioworks, Inc. (15)	8,888,888	12.49%	
27 Drydock Avenue, 8th Floor			
Boston, MA 02210			
OrbiMed Advisors LLC (16)	6,029,995	8.79%	
601 Lexington Avenue, 54th Floor			
New York, NY 10022			
John A. Kryzanowski ⁽¹⁷⁾	4,439,690	6.47%	
c/o Shartsis Friese LLP			
One Maritime Plaza, 18th Floor			
San Francisco, CA 94111			
New Enterprise Associates 14, L.P. (18)	4,229,410	6.16%	
1954 Greenspring Drive, Suite 600			
Timonium, MD 21093			

^{*} Represents beneficial ownership of less than 1% of the outstanding shares of our common stock.

^{**} Addresses are given for beneficial owners of more than 5% of the outstanding common stock only.

- (1) Includes shares issuable upon the exercise of options to purchase shares of common stock within 60 days following August 18, 2023.
- (2) Consists of 2,651,963 shares of our common stock owned by Atlas Venture Fund IX, L.P. ("Atlas IX") and 397,895 shares of our common stock issuable upon the exercise of options exercisable within 60 days following August 18, 2023. Atlas Venture Associates IX, L.P. ("AVA IX LP"), is the general partner of Atlas IX, and Atlas Venture Associates IX, LLC ("AVA IX LLC"), is the general partner of AVA IX LP. Dr. Barrett disclaims Section 16 beneficial ownership of the securities held by Atlas IX, except to the extent of his pecuniary interest therein, if any.
- (3) Consists of 256,301 shares of our common stock held by Dr. Brennan and 1,130,655 shares of our common stock issuable upon the exercise of options exercisable within 60 days following August 18, 2023.
- (4) Consists of 74,732 shares of our common stock held by Mr. Awad and 327,026 shares of our common stock issuable upon the exercise of options exercisable within 60 days following August 18, 2023.
- (5) Consists of 46,947 shares of our common stock held by Mr. Jensen and 116,033 shares of our common stock issuable upon the exercise of options exercisable within 60 days following August 18, 2023.
- (6) Consists of 23,150 shares of our common stock held by Mr. Leschly and 115,967 shares of our common stock issuable upon the exercise of options exercisable within 60 days following August 18, 2023.
- (7) Consists of 155,966 shares of our common stock issuable upon the exercise of options held by Dr. Hurter exercisable within 60 days following August 18, 2023.
- (8) Consists of 7,500 shares of our common stock held by Mr. Shea and 97,000 shares of our common stock issuable upon the exercise of options exercisable within 60 days following August 18, 2023.
- (9) Consists of 97,000 shares of our common stock issuable upon the exercise of options held by Mr. Mathers exercisable within 60 days following August 18, 2023.
- (10) Consists of 87,000 shares of our common stock issuable upon the exercise of options held by Dr. Burgess exercisable within 60 days following August 18, 2023.
- (11) Consists of 62,000 shares of our common stock held by Mr. Heffernan issuable upon the exercise of options exercisable within 60 days following August 18, 2023.
- (12) Consists of 62,000 shares of our common stock held by Ms. Kelly-Croswell issuable upon the exercise of options exercisable within 60 days following August 18, 2023.
- (13) See footnotes 2 through 12.
- (14) This information is based solely on a Schedule 13F filed with the Securities and Exchange Commission on or about August 11, 2023. Consists of 10,133,439 shares held by Fidelity Management & Research Company, LLC ("FMR LLC"). Members of the Johnson family including Abigail P. Johnson, are the predominant owners, directly or through trusts, of series B voting common shares of FMR LLC, representing 49% of the voting power of FMR LLC. The Johnson family group and all other Series B shareholders have entered into a shareholders' voting agreement under which all Series B voting common shares will be voted in accordance with the majority vote of Series B voting common shares. FMR Co., Inc. is wholly owned by Fidelity Management & Research Company is wholly owned by FMR LLC. The address of FMR LLC is 245 Summer Street, Boston, Massachusetts 02210.
- (15) This information is based solely on a Schedule 13G filed with the Securities and Exchange Commission on or about June 21, 2019. Shares reported as beneficially owned by Ginkgo Bioworks, Inc. ("Ginkgo") include (i) 6,340,771 shares of common stock held by Ginkgo and (ii) a warrant to purchase 2,548,117 shares of common stock held by Ginkgo.
- (16) Consists of 4,363,295 shares of our common stock held of record by OrbiMed Capital GP VI LLC ("GP VI") and 1,666,700 shares of our common stock held of record by OrbiMed Genesis GP LLC ("OrbiMed Genesis"). GP VI is the general partner of OrbiMed Private Investments VI, LP ("OPI VI"), pursuant to the terms of the limited partnership agreement of OPI VI. OrbiMed Advisors LLC is the managing member of GP VI, pursuant to the terms of the limited liability company agreement of GP VI. Pursuant to these agreements and relationships, OrbiMed Advisors LLC and GP VI have discretionary investment management authority with respect to the assets of OPI VI. Such authority includes the power of GP VI to vote and otherwise dispose of securities purchased by OPI VI. The number of Shares attributable to OPI VI is 4,363,295. OrbiMed Advisors and GP VI may each be considered to hold indirectly 4,363,295 Shares. OrbiMed Genesis is the general partner of Genesis, pursuant to the terms of the limited partnership

agreement of Genesis. OrbiMed Advisors LLC is the managing member of OrbiMed Genesis, pursuant to the terms of the limited liability company agreement of OrbiMed Genesis. Pursuant to these agreements and relationships, OrbiMed Advisors LLC and OrbiMed Genesis have discretionary investment management authority with respect to the assets of Genesis. Such authority includes the power to vote and otherwise dispose of securities held by Genesis. The number of outstanding Shares of the Issuer attributable to Genesis is 1,666,700. OrbiMed Advisors and OrbiMed Genesis may each be considered to hold indirectly 1,666,700 Shares.

- (17) This information is based solely on a Schedule 13G/A filed with the Securities and Exchange Commission on or about January 20, 2023. Consists of 4,439,690 shares of our common stock held of record by John A. Kryzanowski.
- (18) This information is based solely on a Schedule 13D filed with the Securities and Exchange Commission on or about February 1, 2018. Consists of 4,229,410 shares held by New Enterprise Associates 14, L.P. ("NEA 14"). NEA Partners 14, L.P. ("NEA Partners 14") is the sole general partner of NEA 14. NEA 14 GP, LTD ("NEA 14 LTD") is the sole general partner of NEA Partners 14. The individual Directors (the "Directors") of NEA 14 LTD are M. James Barrett, Peter J. Barris, Forest Baskett, Anthony A. Florence, Jr., Patrick J. Kerins, David M. Mott, Scott D. Sandell, Peter Sonsini and Ravi Viswanathan. The Directors share voting and dispositive power with regard to shares held directly by NEA 14. Edward Mathers is a partner at NEA.

OTHER MATTERS

The Board knows of no other business which will be presented to the special meeting. If any other business is properly brought before the special meeting, proxies will be voted in accordance with the judgment of the persons named therein.

STOCKHOLDER COMMUNICATIONS

Stockholders wishing to communicate with the board of directors or with an individual member of the Board of Directors may do so by writing to the Board of Directors or to the particular member of the Board of Directors, care of the Corporate Secretary by mail to our principal executive offices, Attention: Corporate Secretary. The envelope should indicate that it contains a stockholder communication. All such stockholder communications will be forwarded to the director or directors to whom the communications are addressed.

Cambridge, MA

September , 2023

APPENDIX A

CERTIFICATE OF AMENDMENT TO THE AMENDED AND RESTATED CERTIFICATE OF INCORPORATION OF SYNLOGIC, INC.

Synlogic, Inc. (the "Corporation"), a corporation organized and existing under the laws of the State of Delaware, does hereby certify as follows:

FIRST: That the name of the Corporation is Synlogic, Inc.

SECOND: That the Board of Directors of the Corporation duly adopted resolutions approving the following amendment of the Amended and Restated Certificate of Incorporation, declaring said amendment to be advisable and providing for such consideration of such amendment at the Corporation's special meeting of the stockholders.

THIRD: On September 21, 2023 the Corporation's special meeting of the stockholders was duly called and held, upon notice in accordance with Section 222 of the General Corporation Law of the State of Delaware ("DGCL"), at which meeting the necessary number of shares as required by statute were voted in favor of the amendment.

FOURTH: ARTICLE IV of the Amended and Restated Certificate of Incorporation of the Corporation is hereby amended to add the following Section D to read in its entirety as follows:

"C. Immediately upon the filing of this Certificate of Amendment of Amended and Restated Certificate of Incorporation with the Secretary of State of the State of Delaware each one (1) share of Common Stock outstanding immediately prior to such filing shall be automatically reclassified into of one share of Common Stock. The aforementioned reclassification shall be referred to collectively as the "Reverse Split."

The Reverse Split shall occur without any further action on the part of the Corporation or stockholders of the Corporation and whether or not certificates representing such stockholders' shares prior to the Reverse Split are surrendered for cancellation. No fractional interest in a share of Common Stock shall be deliverable upon the Reverse Split. All shares of Common Stock (including fractions thereof) issuable upon the Reverse Split held by a holder prior to the Reverse Split shall be aggregated for purposes of determining whether the Reverse Split would result in the issuance of any fractional share. Any fractional share resulting from such aggregation upon the Reverse Split shall be rounded down to the nearest whole number. Each holder who would otherwise be entitled to a fraction of a share of Common Stock upon the Reverse Split (after aggregating all fractions of a share to which such stockholder would otherwise be entitled) shall, in lieu thereof, be entitled to receive a cash payment in an amount equal to the fraction to which the stockholder would otherwise be entitled multiplied by the closing price of the Corporation's Common Stock as reported on The Nasdaq Capital Market on the trading day immediately preceding the filing of this Certificate of Amendment of Amended and Restated Certificate of Incorporation with the Secretary of State of the State of Delaware. The Corporation shall not be obliged to issue certificates evidencing the shares of Common Stock outstanding as a result of the Reverse Split unless and until the certificates evidencing the shares held by a holder prior to the Reverse Split are either delivered to the Corporation or its transfer agent, or the holder notifies the Corporation or its transfer agent that such certificates have been lost, stolen or destroyed and executes an agreement satisfactory to the Corporation to indemnify the Corporation from any loss incurred by it in connection with such certificates."

FIFTH: That this Certificate of Amendment to the Amended and Restated Certificate of Incorporation herein certified has been duly adopted in accordance with the provisions of Section 242 of the DGCL.

SIXTH: That this Certificate of Amendment to the Amended and Restated Certificate of Incorporation shall be effective at Eastern Time 2023.

IN WITNESS WHEREOF, this Certificate of Amendment to the Restated Certificate of Incorporation has been executed by a duly authorized officer of this Corporation on this day of , 2023.
SYNLOGIC, INC.
By:
Aoife Brennan President and Chief Executive Officer
President and Chief Executive Officer

SYNLOGIC, INC. 301 BINNEY ST, SUITE 402 CAMBRIDGE, MA 02142



VOTE BY INTERNET

Before The Meeting - Go to www.proxyvote.com or scan the QR Barcode above Use the Internet to transmit your voting instructions and for electronic delivery of information up until 11:59 p.m. Eastern Time on September 20, 2023. Have your proxy card in hand when you access the web site and follow the instructions to obtain your records and to create an electronic voting instruction form.

During The Meeting - Go to www.virtualshareholdermeeting.com/SYBX2023SM

You may attend the meeting via the Internet and vote during the meeting. Have the information that is printed in the box marked by the arrow available and follow the instructions.

VOTE BY PHONE - 1-800-690-6903
Use any touch-tone telephone to transmit your voting instructions up until 11:59 p.m.
Eastern Time on September 20, 2023. Have your proxy card in hand when you call and then follow the instructions.

VOTE BY MAIL.
Mark, sign and date your proxy card and return it in the postage-paid envelope we have provided or return it to Vote Processing, c/o Broadridge, 51 Mercedes Way, Edgewood, NY 11717.

VOTE,	MARK BLOCKS BELOW IN BLUE OR BLACK INK AS FOLLOWS:			
-	V22572-572860 KEEP THIS PC THIS PROXY CARD IS VALID ONLY WHEN SIGNED AND DATED. DETACH AND			
SYNLO	GIC, INC.			
				Ċ
The	Board of Directors recommends you vote FOR the following proposals:	For	Against	Abstain
1.	An amendment to our Amended and Restated Certificate of Incorporation, as amended, to effect a reverse stock split at a ratio of not less than 1-for-5 and not greater than 1-for-15, with the exact ratio to be set within the range at the discretion of our Board of Directors (the "Reverse Split Proposal"); and	0	0	0
2.	The adjournment of the Special Meeting to a later date or dates, if necessary or appropriate, to solicit additional proxies if there are insufficient votes to adopt the Reverse Split Proposal.	0	0	0
NO	TE: Such other business as may properly come before the meeting or any adjournment thereof.			
Ple	ase sign exactly as your name(s) appear(s) hereon. When signing as attorney, executor,			
adr per	ninistrator, or other fiduciary, please give full title as such. Joint owners should each sign sonally. All holders must sign. If a corporation or partnership, please sign in full corporate partnership name by authorized officer.			
Sig	nature [PLEASE SIGN WITHIN BOX] Date Signature (Joint Owners) Date			

Important Notice Regarding the Availability of Proxy Materials:

The Notice and Proxy Statement are available at www.proxyvote.com.

V22573-572860

SYNLOGIC, INC. Special Meeting of Stockholders September 21, 2023 9:00 AM, EDT This proxy is solicited by the Board of Directors

The stockholder(s) hereby appoint(s) Aoife Brennan and Michael Jensen, or either of them, as proxies, each with the power to appoint (his/her) substitute, and hereby authorize(s) them to represent and to vote, as designated on the reverse side of this ballot, all of the shares of Common Stock of SYNLOGIC, INC. that the stockholder(s) is/are entitled to vote at the Special Meeting of Stockholders to be held at 9:00 AM, EDT on September 21, 2023, via live audio webcast at www.virtualshareholdermeeting.com/SYBX2023SM, and any adjournment or postponement thereof.

This proxy, when properly executed, will be voted in the manner directed herein. If no such direction is made, this proxy will be voted in accordance with the Board of Directors' recommendations.

Continued and to be signed on reverse side