Filed by Flex Pharma, Inc. pursuant to Rule 425 under the Securities Act of 1933 and deemed filed pursuant to Rule 14a-6(b) under the Securities Exchange Act of 1934

Form S-4 File No.: 333-229666

Subject Company: Salarius Pharmaceuticals, LLC

SEC File No.: 001-36812



May 24, 2019

Dear Shareholder:

We have previously sent to you proxy materials for the important Special Meeting of Stockholders of Flex Pharma, Inc., to be held on June 14, 2019. Your Board of Directors unanimously recommends that shareholders vote FOR the proposals 1, 2, 3 and 4 relating to the proposed merger of our wholly owned subsidiary with Salarius Pharmaceuticals, LLC.

If the merger is not completed, your Board of Directors likely would decide to dissolve, liquidate or wind-up Flex Pharma. We believe the merger provides significantly more potential value to our shareholders than dissolving, liquidating or winding-up Flex Pharma.

Please vote FOR PROPOSALS 1, 2, 3, and 4, ALL of which are needed to support the merger, by telephone, *via* the Internet, or by signing, dating and returning the enclosed proxy card in the postage-paid envelope provided. A vote against any proposal puts the merger at risk.

Very truly yours,

/s/ William McVicar

William McVicar, Ph.D.

President and Chief Executive Officer

REMEMBER:

You can vote your shares by telephone, or *via* the Internet. Please follow the easy instructions on the enclosed proxy card.

If you have any questions, or need assistance in voting your shares, please call our proxy solicitor,

INNISFREE M&A INCORPORATED, TOLL-FREE at 1 (888) 750-5834.

Forward-Looking Statements

Certain statements in this communication regarding the proposed transaction (including statements relating to satisfaction of the conditions to consummation of the proposed transaction and value creation) constitute "forward-looking statements" within the meaning of Section 27A of the Securities Act and Section 21E of the Securities Exchange Act. These forward-looking statements are usually identified by the use of words such as "believes," "expects," "will," "would," and variations of such words or similar expressions. Flex intends these forward-looking statements to be covered by the safe harbor provisions for forward-looking statements contained in Section 27A of the Securities Act and Section 21E of the Securities Exchange Act of 1934. These forward-looking statements reflect Flex's current views about its plans, intentions, expectations, strategies and prospects, which are based on the information currently available to it and on assumptions it has made. Although Flex believes that its plans, intentions, expectations, strategies and prospects as reflected in or suggested by those forward-looking statements are reasonable, it can give no assurance that the plans, intentions, expectations or strategies will be attained or achieved. Furthermore, actual results may differ materially from those described in the forwardlooking statements and will be affected by a variety of risks and uncertainties that are beyond its control. Risks and uncertainties for Flex Pharma, Salarius and of the combined company include, but are not limited to: inability to complete the proposed transaction; costs and potential litigation associated with the proposed transaction; failure or delay in obtaining required approvals by Nasdaq or any other governmental or quasi-governmental entity necessary to consummate the proposed transaction; failure to obtain the necessary stockholder approvals or to satisfy other conditions to the closing of the proposed transaction; a superior proposal being submitted to Flex Pharma; the ability of the proposed transaction to increase stockholder value; an inability or delay in obtaining required regulatory approvals for product candidates; risks inherent in drug development in general; uncertainties in obtaining successful clinical results for product candidates and unexpected costs that may result therefrom; failure to realize any value of certain product candidates; risk that the market for the combined company's products may not be as large as expected; uncertainties of cash flows, expenses and inability to meet working capital needs; risks associated with the possible failure to realize certain benefits of the proposed transaction; failure to maintain the combined company's management team or board of directors; and other risks and uncertainties detailed in the risk factors section of Flex Pharma's registration statement on Form S-4 (File No. 333-229666), Form 10-K and Forms 10-Q filed with the SEC, as well as other filings Flex Pharma makes with the SEC from time-to-time. Many of these factors that will determine actual results are beyond Flex Pharma's, Salarius' or the combined company's ability to control or predict. Flex Pharma disclaims any obligation to update information contained in these forward-looking statements, whether as a result of new information, future events or otherwise, except as required by law.

Additional Information and Where to Find It

This communication may be deemed to be solicitation material in respect of the proposed transaction. In connection with the proposed transaction, Flex Pharma filed with the Securities and Exchange Commission (SEC) a registration statement on Form S-4 (File No. 333-229666) containing a proxy statement/prospectus/information statement, which was declared effective by the SEC on April 29, 2019. On April 30, 2019, Flex Pharma filed a definitive proxy statement/prospectus/information statement with the SEC. On or around May 3, 2019, Flex Pharma began mailing the definitive proxy statement/prospectus/information statement to Flex Pharma stockholders of record as of the close of business on April 17, 2019 and members of Salarius. FLEX PHARMA URGES INVESTORS AND EQUITYHOLDERS OF FLEX PHARMA AND SALARIUS TO READ THE DEFINITIVE PROXY STATEMENT/PROSPECTUS/INFORMATION STATEMENT REGARDING THE PROPOSED TRANSACTION, AS WELL AS OTHER DOCUMENTS FILED OR THAT WILL BE FILED WITH THE SEC, BECAUSE THEY CONTAIN OR WILL CONTAIN IMPORTANT INFORMATION ABOUT FLEX PHARMA, SALARIUS AND THE PROPOSED TRANSACTION. This communication is not a substitute for the registration statement, definitive proxy statement/prospectus/information statement or any other documents that Flex Pharma has filed or may file with the SEC or send to Flex Pharma or Salarius equityholders in connection with the proposed transaction.

You may obtain free copies of the registration statement, definitive proxy statement/prospectus/information statement and all other documents filed or that will be filed with the SEC regarding the proposed transaction at the website maintained by the SEC, www.sec.gov. Once they are filed, copies of the registration statement and definitive proxy statement/prospectus/information statement will be available free of charge on Flex Pharma's website at www.flex-pharma.com or by contacting John McCabe at jmccabe@flex-pharma.com.

Participants in Solicitation

Flex Pharma, Salarius and their respective directors or managers and executive officers may be deemed to be participants in the solicitation of proxies from the holders of Flex Pharma common stock in connection with the proposed transaction. Information about Flex Pharma's directors and executive officers is set forth in Flex Pharma's Annual Report on Form 10-K for the period ended December 31, 2018, which was filed with the SEC on March 6, 2019, and amended on April 16, 2019. Other information regarding the interests of such individuals, as well as information regarding Salarius' managers and executive officers and other persons who may be deemed participants in the proposed transaction, is set forth in the definitive proxy statement/prospectus/information statement. You may obtain free copies of these documents as described in the preceding paragraph.

Non-Solicitation

This communication shall not constitute an offer to sell or the solicitation of an offer to sell or the solicitation of an offer to buy any securities, nor shall there be any sale of securities in any jurisdiction in which such offer, solicitation or sale would be unlawful prior to registration or qualification under the securities laws of any such jurisdiction. No public offer of securities in connection with the merger shall be made except by means of a prospectus meeting the requirements of Section 10 of the Securities Act of 1933, as amended.