SALARIUS PHARMACEUTICALS, INC. 2450 Holcombe Blvd., Suite X Houston, Texas 77021

June 21, 2022

VIA EDGAR

Division of Corporation Finance U.S. Securities and Exchange Commission 100 F Street, N.E. Washington, D.C. 20549

Re: Salarius Pharmaceuticals, Inc.

Registration Statement on Form S-3 (File No. 333-265535)

Request for Acceleration of Effective Date

Ladies and Gentlemen:

Pursuant to Rule 461 of the General Rules and Regulations under the Securities Act of 1933, as amended, Salarius Pharmaceuticals, Inc., a Delaware corporation, hereby requests that the Securities and Exchange Commission accelerate the effective date of the above-referenced Registration Statement on Form S-3 (File No. 333-265535) and declare the Registration Statement effective as of Thursday, June 23, 2022, at 4:00 p.m., Eastern time, or as soon as practicable thereafter.

Please contact the undersigned at (832) 834-6992, or Nicholas Griffin of Hogan Lovells US LLP at (713) 632-1488 with any questions. Also, please notify Mr. Griffin when this request for acceleration has been granted.

Very truly yours,

SALARIUS PHARMACEUTICALS, INC.

By: /s/ Mark J. Rosenblum
Name: Mark J. Rosenblum
Title: Chief Financial Officer

cc: Nicholas Griffin, Hogan Lovells US LLP