

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

DIVISION OF CORPORATION FINANCE

April 12, 2018

Meenu Chhabra Chief Executive Officer Proteostasis Therapeutics, Inc. 200 Technology Square, 4th Floor Cambridge, Massachusetts 02139

Re: Proteostasis Therapeutics, Inc. Registration Statement on Form S-3 Filed April 6, 2018 File No. 333-224180

Dear Ms. Chhabra:

We have limited our review of your registration statement to those issues we have addressed in our comment.

Please respond to this letter by amending your registration statement and providing the requested information. If you do not believe our comment applies to your facts and circumstances or do not believe an amendment is appropriate, please tell us why in your response.

After reviewing any amendment to your registration statement and the information you provide in response to this comment, we may have additional comments.

Registration Statement on Form S-3 filed April 6, 2018

Incorporation of Documents by Reference, page 23

 Please amend your registration statement to incorporate by reference the description of your common stock contained in a registration statement filed under the Securities Exchange of 1934, as amended. Refer to Item 12(a)(3) of Form S-3. In addition, we note that Part III of your annual report on Form 10-K for the fiscal year ended December 31, 2017 incorporates by reference portions of your definitive proxy statement which has not been filed yet. Please be advised that we cannot accelerate the effective date of your registration statement until you have amended the Form 10-K to include Part III information or filed the definitive proxy statement. For guidance, please refer to Question 123.01 of our Securities Act Forms Compliance and Disclosure Interpretations. Meenu Chhabra Proteostasis Therapeutics, Inc. April 12, 2018 Page 2

We remind you that the company and its management are responsible for the accuracy and adequacy of their disclosures, notwithstanding any review, comments, action or absence of action by the staff.

Refer to Rules 460 and 461 regarding requests for acceleration. Please allow adequate time for us to review any amendment prior to the requested effective date of the registration statement.

Please contact Irene Paik at 202-551-6553 or Suzanne Hayes at 202-551-3675 with any questions.

Division of Corporation Finance Office of Healthcare & Insurance

cc: John M. Mutkoski, Esq. - Goodwin Procter LLP