Leap Therapeutics, Inc. 47 Thorndike Street Suite B1-1 Cambridge, MA 02141 (617) 714-0360

August 6, 2019

Via EDGAR

United States Securities and Exchange Commission Division of Corporate Finance 100 F Street, NE Washington, D.C. 20549 Attention: Donald Field

RE: Leap Therapeutics, Inc. Registration Statement on Form S-1 Filed on July 31, 2019 File No. 333-232927

Dear Mr. Field:

In accordance with Rule 461 promulgated under the Securities Act of 1933, as amended (the "<u>Securities Act</u>"), the undersigned respectfully requests that the effective date for the Registration Statement referred to above be accelerated so that it will be declared effective at 4:00 p.m., Eastern time, on August 8, 2019, or as soon thereafter as is practicable. Once the Registration Statement has been declared effective, please orally confirm that event with our counsel, Morgan, Lewis & Bockius LLP, by calling Julio E. Vega at (617) 951-8901.

Very truly yours,

LEAP THERAPEUTICS, INC.

/s/ Douglas E. Onsi

Name:Douglas E. OnsiTitle:Chief Financial Officer and General Counsel

cc: Julio E. Vega, Morgan, Lewis & Bockius LLP