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December 21, 2010

Via EDGAR

SECURITIES AND EXCHANGE COMMISSION
Division of Corporation Finance
100 F Street, N.E.
Washington, DC 20549
Attention: Michael Rosenthal, Esq.

Re: Idera Pharmaceuticals, Inc.
Form 10-K for the Fiscal Year Ended December 31, 2009
Filed March 10, 2010
Proxy Statement on Schedule 14A
Filed April 29, 2010
File No. 001-31918

Dear Mr. Rosenthal:

This letter serves to confirm that Idera Pharmaceuticals, Inc. intends to respond to the comments of the staff of the Securities Exchange Commission set forth in the letter to Sudhir Agrawal, dated December 14, 2010, from Jeffrey P. Riedler, Assistant Director (the "Letter") by Thursday, January 6, 2011.

Please do not hesitate to telephone the undersigned at 617-526-6633 if you have any questions regarding this letter.

Very truly yours,

Rosemary G. Reilly, Esq.

cc: Sudhir Agrawal, D. Phil.
Louis J. Arcudi, III
Stuart M. Falber, Esq.

Wilmer Cutler Pickering Hale and Dorr LLP, 60 State Street, Boston, Massachusetts 02109

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