

**UNITED STATES  
SECURITIES AND EXCHANGE COMMISSION  
Washington, D.C. 20549**

**FORM 10-K/A  
AMENDMENT NO. 1**

(Mark One)

**ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

**For the Fiscal Year Ended December 31, 2007**

**OR**

**TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

**Commission File Number: 001-31918**

**IDERA PHARMACEUTICALS, INC.**

**(Exact name of Registrant as specified in its certificate of incorporation)**

**Delaware  
(State or other jurisdiction  
of incorporation or organization)**

**04-3072298  
(I.R.S. Employer  
Identification No.)**

**167 Sidney Street  
Cambridge, Massachusetts  
(Address of principal executive offices)**

**02139  
(Zip Code)**

**(617) 679-5500  
(Registrant's telephone number, including area code)  
Securities registered pursuant to Section 12(b) of the Act:**

<b>Title of Class:</b>	<b>Name of Each Exchange on Which Registered</b>
<b>Common Stock, \$.001 par value (Including Associated Preferred Stock Purchase Rights)</b>	<b>NASDAQ Global Market</b>

**Securities registered pursuant to Section 12(g) of the Act: None**

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. Yes  No

Indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or 15(d) of the Securities Act. Yes  No

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to the filing requirements for the past 90 days. Yes  No

Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K is not contained herein, and will not be contained, to the best of the registrant's knowledge, in definitive proxy or information statements incorporated by reference in Part III of this Form 10-K or any amendment to this Form 10-K.

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, or a smaller reporting company. See the definitions of "large accelerated filer," "accelerated filer" and "smaller reporting company" in Rule 12b-2 of the Exchange Act. (Check one):

Large accelerated filer  Accelerated filer  Non-accelerated filer  Smaller Reporting Company   
(Do not check if a smaller reporting company)

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act.) Yes  No

The approximate aggregate market value of the voting stock held by non-affiliates of the registrant was \$112,169,323 based on the last sale price of the registrant's common stock as reported on the NASDAQ Global Market on June 30, 2007. As of February 29, 2008, the registrant had 21,987,744 shares of common stock outstanding.

**DOCUMENTS INCORPORATED BY REFERENCE**

Portions of the Registrant's Proxy Statement with respect to the Annual Meeting of Stockholders to be held on June 4, 2008 are incorporated by reference into Items 10, 11, 12, 13 and 14 of Part III of this Form 10-K.

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**EXPLANATORY NOTE**

Idera Pharmaceuticals, Inc. (the “Company”) is filing this Amendment No. 1 to its Annual Report on Form 10-K for the year ended December 31, 2007, as originally filed with the SEC on March 11, 2008, for the purpose of filing Exhibit 10.48 and amending and restating the Exhibit Index. The Exhibit Index is also being amended to add new officer certifications in accordance with Rule 13a-14(a) of the Exchange Act. This Amendment No. 1 on Form 10-K/A does not change the previously reported financial statements or any of the other disclosure contained in the original Form 10-K.

**Exhibit Index**

<b>Exhibit Number</b>	<b>Description</b>	<b>Filed with this Form 10-K/A</b>	<b>Form or Schedule</b>	<b>Incorporated by Reference Filing Date with SEC</b>	<b>SEC File Number</b>
3.1	Restated Certificate of Incorporation of Idera Pharmaceuticals, Inc., as amended.		10-Q	August 14, 2006	001-31918
3.2	Amended and Restated Bylaws of Idera Pharmaceuticals, Inc.		S-1	November 6, 1995	33-99024
3.3	Certificate of Ownership and Merger.		8-K	September 15, 2005	001-31918
4.1	Specimen Certificate for shares of Common Stock, \$.001 par value, of Idera Pharmaceuticals, Inc.		S-1	December 8, 1995	33-99024
4.2	Rights Agreement dated December 10, 2001 by and between Idera Pharmaceuticals, Inc. and Mellon Investor Services LLC, as rights agent.		S-2	October 10, 2003	333-109630
4.3	Amendment No. 1 to Rights Agreement dated as of August 27, 2003 between the Company and Mellon Investor Services LLC, as rights agent.		8-K	August 29, 2003	000-27352
4.4	Amendment No. 2 to Rights Agreement dated as of March 24, 2006 between the Company and Mellon Investor Services LLC, as rights agent.		8-K	March 29, 2006	001-31918
4.5	Amendment No. 3 to Rights Agreement dated January 16, 2007 between the Company and Mellon Investor Services, LLC, as rights agent		8-K	January 17, 2007	001-31918
10.1†	License Agreement dated February 21, 1990 and restated as of September 8, 1993 between Idera Pharmaceuticals, Inc. and University of Massachusetts Medical Center.		S-1	November 6, 1995	33-99024
10.2††	2005 Stock Incentive Plan, as amended		10-Q	August 14, 2006	001-31918
10.3††	1995 Stock Option Plan.		S-1	November 6, 1995	33-99024
10.4††	1995 Director Stock Option Plan.		S-1	November 6, 1995	33-99024
10.5††	1995 Employee Stock Purchase Plan.		S-1	November 6, 1995	33-99024
10.6††	Amendment No. 1 to 1995 Employee Stock Purchase Plan.		10-Q	August 14, 2006	001-31918
10.7††	Employment Agreement dated October 19, 2005 between Idera Pharmaceuticals, Inc. and Dr. Sudhir Agrawal.		10-Q	November 9, 2005	001-31918
10.8††	Non-employee Director Compensation Program Effective January 1, 2008		10-K	March 11, 2008	001-31918
10.9†	Amendment No. 1 to License Agreement, dated as of February 21, 1990 and restated as of September 8, 1993, by and between University of Massachusetts Medical Center and Idera Pharmaceuticals, Inc., dated as of November 26, 1996.		10-Q	August 14, 1997	000-27352
10.10††	Amended and Restated 1997 Stock Incentive Plan.		10-Q	May 15, 2001	000-27352



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<b>Exhibit Number</b>	<b>Description</b>	<b>Filed with this Form 10-K/A</b>	<b>Form or Schedule</b>	<b>Incorporated by Reference Filing Date with SEC</b>	<b>SEC File Number</b>
10.12	Amendment No. 1 to the Collaboration and License Agreement, dated as of May 24, 2001 by and between Isis Pharmaceuticals, Inc. and Idera Pharmaceuticals, Inc., dated as of August 14, 2002.		10-K	March 31, 2003	000-27352
10.13	Master Agreement relating to the Cross License of Certain Intellectual Property and Collaboration by and between Isis Pharmaceuticals, Inc. and Idera Pharmaceuticals, Inc., dated May 24, 2001.		10-Q	August 20, 2001	000-27352
10.14	Unit Purchase Agreement by and among Idera Pharmaceuticals, Inc. and certain persons and entities listed therein, dated April 1, 1998.		10-K	April 1, 2002	000-27352
10.15††	Letter Agreement dated May 17, 2007, Robert G. Andersen		10-Q	August 1, 2007	001-31918
10.16††	Executive Stock Option Agreement for 1,260,000 Options effective as of July 25, 2001 between Idera Pharmaceuticals, Inc. and Dr. Sudhir Agrawal.		10-Q	October 24, 2002	000-27352
10.17††	Executive Stock Option Agreement for 550,000 Options effective as of July 25, 2001 between Idera Pharmaceuticals, Inc. and Dr. Sudhir Agrawal.		10-Q	October 24, 2002	000-27352
10.18††	Executive Stock Option Agreement for 500,000 Options effective as of July 25, 2001 between Idera Pharmaceuticals, Inc. and Dr. Sudhir Agrawal.		10-Q	October 24, 2002	000-27352
10.19	Registration Rights Agreement, dated as of August 28, 2003 by and among Idera Pharmaceuticals, Inc., the Purchasers and the Agents.		S-2	October 10, 2003	333-109630
10.20	Form of Common Stock Purchase Warrant issued to purchasers of units in a private placement on August 28, 2003 and August 29, 2003.		S-2	October 10, 2003	333-109630
10.21	Form of Common Stock Purchase Warrant issued to selected dealers and placement agents on August 28, 2003 in connection with a private placement.		S-2	October 10, 2003	333-109630
10.22	Registration Rights Agreement, dated August 27, 2004 by and among Idera Pharmaceuticals, Inc., Pillar Investment Limited and Purchasers.		10-Q	November 12, 2004	001-31918
10.23	Form of Warrants issued to investors and the placement agent in connection with Idera Pharmaceuticals, Inc.'s August 27, 2004 financing.		10-Q	November 12, 2004	001-31918
10.24	Non-Employee Director Nonstatutory Stock Option Agreement Granted under 1997 Stock Incentive Plan.		10-K	March 25, 2005	001-31918
10.25	Form of Incentive Stock Option Agreement Granted Under the 2005 Stock Incentive Plan.		8-K	June 21, 2005	001-31918
10.26	Form of Nonstatutory Stock Option Agreement Granted Under the 2005 Stock Incentive Plan.		8-K	June 21, 2005	001-31918
10.27	Form of Restricted Stock Agreement Under the 2005 Stock Incentive Plan		10-Q	August 1, 2007	001-31918
10.28†	Research Collaboration and Option Agreement by and between Idera Pharmaceuticals, Inc. and Novartis International Pharmaceutical Ltd.		10-Q	August 9, 2005	001-31918
10.29†	License, Development and Commercialization Agreement by and between Idera Pharmaceuticals, Inc. and Novartis International Pharmaceutical Ltd.		10-Q	August 9, 2005	001-31918



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Exhibit Number	Description	Filed with this Form 10-K/A	Form or Schedule	Incorporated by Reference Filing Date with SEC	SEC File Number
10.30	Engagement letter, dated May 20, 2005, by and among Idera Pharmaceuticals, Inc. and Pillar Investment Limited.		10-Q	August 9, 2005	001-31918
10.31††	Consulting Agreement dated as of January 1, 2008 between Idera Pharmaceuticals, Inc. and Karr Pharma Consulting, LLC.		10-K	March 11, 2008	001-31918
10.32	Registration Rights Agreement dated as of May 20, 2005 by and among Idera Pharmaceuticals, Inc., Purchasers and Pillar Investment Limited.		10-Q	August 9, 2005	001-31918
10.33	Common Stock Purchase Warrant issued to Pillar Investment Limited in connection with the May 20, 2005 Financing.		10-Q	August 9, 2005	001-31918
10.34	Common Stock Purchase Agreement, dated March 24, 2006, by and among the Company and the Investors named therein.		8-K	March 29, 2006	001-31918
10.35	Registration Rights Agreement, dated March 24, 2006, by and among the Company and the Investors named therein.		8-K	March 29, 2006	001-31918
10.36	Amendment No. 1 to the Common Stock Purchase Agreement, dated March 24, 2006, by and among the Company and the Investors named therein.		10-Q	August 14, 2006	001-31918
10.37	Form of Warrant issued to Investors in the Company's March 24, 2006 Private Financing.		8-K	March 29, 2006	001-31918
10.38	Common Stock Purchase Agreement, dated March 24, 2006, by and between the Company and Biotech Shares Ltd.		8-K	March 29, 2006	001-31918
10.39	Amendment No. 1 to the Common Stock Purchase Agreement, dated March 24, 2006, by and among the Company and Biotech Shares Ltd.		10-Q	November 13, 2006	001-31918
10.40	Engagement Letter, dated March 24, 2006, between the Company and Youssef El Zein.		8-K	March 29, 2006	001-31918
10.41	Registration Rights Agreement, dated March 24, 2006, by and among the Company, Biotech Shares Ltd. and Youssef El Zein.		8-K	March 29, 2006	001-31918
10.42	Warrant issued to Biotech Shares Ltd. on March 24, 2006.		8-K	March 29, 2006	001-31918
10.43†	Exclusive License and Research Collaboration Agreement by and between Merck & Co., Inc. and Idera Pharmaceuticals, Inc., dated December 8, 2006.		8-K	March 6, 2007	001-31918
10.44	Amendment No. 1 to the Registration Rights Agreement dated March 24, 2006, by and among the Company and Biotech Shares Ltd.		10-Q	August 14, 2006	001-31918
10.45*	License Agreement by and between Merck KGaA and Idera Pharmaceuticals, Inc., dated December 18, 2007.		10-K	March 11, 2008	001-31918
10.46	Promissory Note dated June 12, 2007 made by Idera Pharmaceuticals, Inc. in favor of General Electric Capital Corporation.		10-Q	August 1, 2007	001-31918
10.47	Master Security Agreement dated June 12, 2007 by and between Idera Pharmaceuticals, Inc. and General Electric Capital Corporation.		10-Q	August 1, 2007	001-31918

10.48	Employment offer letter dated November 8, 2007 by and between Idera Pharmaceuticals, Inc. and Louis J. Arcudi, III	X		
23.1	Consent of Independent Registered Public Accounting Firm.	10-K	March 11, 2008	001-31918



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<b>Exhibit Number</b>	<b>Description</b>	<b>Filed with this Form 10-K/A</b>	<b>Form or Schedule</b>	<b>Incorporated by Reference Filing Date with SEC</b>	<b>SEC File Number</b>
31.1	Certification of Chief Executive Officer pursuant to Exchange Act Rules 13a-14 and 15d-14, as adopted pursuant to Section 302 of Sarbanes-Oxley Act of 2002.		10-K	March 11, 2008	001-31918
31.2	Certification of Chief Financial Officer pursuant to Exchange Act Rules 13a-14 and 15d-14, as adopted pursuant to Section 302 of Sarbanes-Oxley Act of 2002.		10-K	March 11, 2008	001-31918
31.3	Certification of Chief Executive Officer pursuant to Exchange Act Rules 13a-14 and 15d-14, as adopted pursuant to Section 302 of Sarbanes-Oxley Act of 2002.	X			
31.4	Certification of Chief Financial Officer pursuant to Exchange Act Rules 13a-14 and 15d-14, as adopted pursuant to Section 302 of Sarbanes-Oxley Act of 2002.	X			
32.1	Certification of Chief Executive Officer pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.		10-K	March 11, 2008	001-31918
32.2	Certification of Chief Financial Officer pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.		10-K	March 11, 2008	001-31918

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\* Confidential treatment requested as to certain portions, which portions are omitted and filed separately with the Commission.

† Confidential treatment granted as to certain portions, which portions are omitted and filed separately with the Commission.

†† Management contract or compensatory plan or arrangement required to be filed as an Exhibit to the Annual Report on Form 10-K.

**SIGNATURE**

Pursuant to the requirements of Section 13 or 15(d) of the Securities Exchange Act of 1934, as amended, the Registrant has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized, on this 24<sup>th</sup> day of December 2008.

Idera Pharmaceuticals, Inc.

By: /s/ Sudhir Agrawal  
Sudhir Agrawal  
*Chief Executive Officer*



November 8, 2007

Louis J. Arcudi, III  
4 Whitney Road  
Hopedale, MA 01747

Dear Lou:

It is my pleasure to extend to you this offer of employment with Idera Pharmaceuticals, Inc. (the "Company"). The purpose of this letter is to summarize the terms of your employment with the Company, should you accept our offer:

1. **Employment.** You will be employed to serve on a full time basis as Chief Financial Officer of the Company, effective December 3, 2007 (the "Effective Date") reporting solely to the Chief Executive Officer and performing such duties as are customarily assigned to a chief financial officer, plus such other duties as may from time to time be assigned to you by the Chief Executive Officer. You agree to devote your full business time, best efforts, skill, knowledge, attention and energies to the advancement of the Company's business and interests and to the performance of your duties and responsibilities as an employee of the Company.
  2. **Base Salary and Bonus.** Your base salary will be \$230,000 per year. Such base salary may be adjusted from time to time in accordance with normal business practices and in the sole discretion of the Company. You shall also be eligible to receive, at the end of each fiscal year of the Company other than the year ending December 31, 2007, an annual bonus, whether pursuant to a formal bonus or incentive plan or program of the Company or otherwise. With respect to the fiscal year ending December 31, 2008, you shall be eligible to receive a bonus equal to between 20% and 30% of your base salary on the last day of such fiscal year. Such bonus, if any, will be approved by the Board of Directors (the "Board") in its sole discretion and will be based on both individual and Company performance objectives as developed and determined by the Company in its sole discretion.
  3. **Signing Bonus.** In addition to your base salary and any annual bonus, you will be eligible to receive a signing bonus of \$50,000 payable in two installments of \$25,000 each. If you remain employed with the Company on January 31, 2008, then the first installment will be paid on that date and again subject to your continued employment with the Company, the second installment will be paid on May 30, 2008. Notwithstanding the foregoing, in the event that prior to May 30, 2008 you are terminated without cause, then the Company shall pay these bonus installments on the specified payment dates whether or not you are then an employee of the Company.
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4. **Benefit Programs.** You may participate in any and all benefit programs that the Company may establish and make available to its employees from time to time, provided you are eligible under (and subject to all provisions of) the plan documents governing those programs. Such benefits may include medical, dental and retirement plans. Any benefits made available by the Company, and the rules, terms and conditions for participation in such benefit plans, may be changed by the Company at any time and from time to time without advance notice.
5. **Severance.** In the event that the Company terminates your employment with the Company at any time without Cause, the Company shall continue to pay you your then current base salary for a period ending on the date three (3) months after the termination of your employment (the "Severance Period"), payable in accordance with and at the times contemplated by the Company's then current payroll practices. In addition, during the Severance Period, the Company will provide you with medical and dental insurance benefits to the extent you were receiving such benefits immediately prior to your termination date and to the extent that the Company is able to provide you with such benefits at a cost to the Company that is not in excess of the cost that the Company was paying for such benefits for you immediately prior to your termination. Notwithstanding the foregoing, the Company's obligations to make such payments and provide such benefits shall be contingent upon your execution of a release in a form reasonably acceptable to the Company.
- For purposes of this offer letter, Cause shall mean (i) a material breach of any material term of this offer letter, (ii) a plea of guilty or nolo contendere to, or conviction of, the commission of a felony offense, (iii) repeated unexplained or unjustified absence, or refusals to carry out the lawful directions of the Board or (iv) material breach of a fiduciary duty owed to the Company under this offer letter, provided that any action or inaction described by (i), (iii) or (iv), above, shall not be the basis of a termination of your employment with the Company for "Cause" unless the Company provided you with at least 20 days advance written notice specifying in reasonable detail the conduct in need of being cured and such conduct was not cured within the notice period or prior to termination.
6. **Equity.** Upon the commencement of your employment with the Company, you will receive pursuant and subject to the terms of the Company's 2005 Stock Incentive Plan, a non-statutory stock option award to purchase 80,000 shares of the Company's common stock at an exercise price equal to the fair market value of the Company's common stock on the date of grant. Such options shall vest over three years with the first installment vesting on the first anniversary of the grant date and the balance of the shares vesting in equal quarterly installments over the remaining two years. These options shall be evidenced by an option agreement that is consistent with the form of option agreement generally used by the Company and the terms of this offer letter. In the event that during the one year period following the Effective Date a Change of Control occurs, then the vesting of such options shall be accelerated such that on the date of the Change of Control such stock options shall automatically vest as to the first annual installment.

For purposes of this offer letter, a Change of Control shall mean the occurrence of any of the following events: (i) a change in the composition of the Board over a period of thirty-six consecutive months or less such that a majority of the members of the Board ceases to be

comprised of individuals who are Continuing Members; for such purpose, a "Continuing Member" shall mean an individual who is a member of the Board on the date of this Agreement and any successor of a Continuing Member who is elected to the Board or nominated for election by action of a majority of Continuing Members then serving on the Board; (ii) any merger or consolidation that results in the voting securities of the Company outstanding immediately prior thereto representing (either by remaining outstanding or by being converted into voting securities of the surviving or acquiring entity) less than 60% of the combined voting power of the voting securities of the Company or such surviving or acquiring entity outstanding immediately after such merger or consolidation; (iii) any sale of all or substantially all of the assets of the Company; (iv) the complete liquidation or dissolution of the Company; or (v) the acquisition of "beneficial ownership" (as defined in Rule 13d-3 under the Exchange Act) of securities of the Company representing 50% or more of the combined voting power of the Company's then outstanding securities (other than through a merger or consolidation or an acquisition of securities directly from the Company) by any "person," as such term is used in Sections 13(d) and 14(d) of the Exchange Act, other than the Company, any trustee or other fiduciary holding securities under an employee benefit plan of the Company or any corporation owned directly or indirectly by the stockholders of the Company in substantially the same proportion as their ownership of stock of the Company.

7. **Invention, Non-Disclosure and Non-Competition Agreement.** As a condition of employment, you will be required to execute the Invention, Non-Disclosure and Non-Competition Agreement enclosed herewith as Exhibit A.
8. **Company Policies and Procedures.** As an employee of the Company, you will be required to comply with all Company policies and procedures. Violations of the Company's policies may lead to immediate termination of your employment. Further, the Company's premises, including all workspaces, furniture, documents and other tangible materials, and all information technology resources of the Company (including computers, data and other electronic files, and all internet and e-mail) are subject to oversight and inspection by the Company at any time. Company employees should have no expectation of privacy with regard to any Company premises, materials, resources or information.
9. **Proof of Legal Right to Work.** For purposes of federal immigration law, you will be required to provide the Company with documentary evidence of your identity and eligibility for employment in the United States. Such documentation must be provided to the Company within three (3) business days of your date of hire, or our employment relationship with you may be terminated. You may need to obtain a work visa in order to be eligible to work in the United States. If that is the case, your employment with the Company will be conditioned upon your obtaining a work visa in a timely manner as determined by the Company.
10. **At-Will Employment.** This letter shall not be construed as an agreement, either express or implied, to employ you for any stated term, and shall in no way alter the Company's policy of employment at will, under which both you and the Company remain free to end the employment relationship, for any reason, at any time, with or without cause or notice. Although your job duties, title, compensation and benefits, as well as the Company's personnel policies and procedures, may change from time to time, the "at-will" nature of

your employment may only be changed by a written agreement signed by you and the Chief Executive Officer of the Company which expressly states the intention to modify the at-will nature of your employment. Similarly, nothing in this letter shall be construed as an agreement, either express or implied, to pay you any compensation or grant you any benefit beyond the end of your employment with the Company. This letter supersedes any prior understandings, whether written or oral, relating to the terms of your employment with the Company.

11. **Other Agreements and Governing Law.** You represent that you are not bound by any employment contract, restrictive covenant or other restriction preventing you from entering into employment with or carrying out your responsibilities for the Company, or which is in any way inconsistent with the terms of this letter. Please note that this offer letter is your formal offer of employment and supersedes any and all prior or contemporaneous agreements, discussions and/or understandings, whether written or oral, relating to the subject matter of this letter or your employment with the Company. The resolution of any disputes under this letter will be governed by Massachusetts law.

If this letter correctly sets forth the initial terms under which you will be employed by the Company, please sign the enclosed duplicate of this letter in the space provided below, along with the enclosed Invention, Non-Disclosure and Non-Competition Agreement, and return them to me. If you do not accept this offer by **November 15, 2007**, the offer will be revoked. This offer is contingent on satisfactory reference checks.

Very truly yours,

By: /s/ SUDHIR AGRAWAL

Name: Sudhir Agrawal

Title: CEO

The foregoing correctly sets forth the terms of my employment with Idera Pharmaceuticals, Inc. I am not relying on any representations other than as set forth above.

/s/ LOUIS J. ARCUDI, III

Date: 11/8/07

Name: Louis J. Arcudi, III

Exhibit A

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## INVENTION, NON-DISCLOSURE AND NON-COMPETITION AGREEMENT

IN CONSIDERATION of my being engaged as an employee of Idera Pharmaceuticals, Inc., a Delaware corporation, having an address at 167 Sidney Street, Cambridge, Massachusetts 02139 ("Idera"), and for other valuable consideration, the receipt and sufficiency of which are acknowledged, I agree as follows:

### 1. Confidential Information.

(a) I agree that all materials and information, whether or not in writing, of a private, secret or confidential nature concerning Idera's technology, business or financial affairs (collectively, "Confidential Information") is and shall be the exclusive property of Idera. I will not disclose any Confidential Information to others outside Idera or use the same for any purposes (other than in the performance of my duties as an employee of or consultant to Idera) without the prior written approval of a senior executive officer of Idera, either during or after my employment or consultancy, unless and until such Confidential Information has become public knowledge without fault by me.

(b) By way of illustration, and not limitation, Confidential Information shall include, whether tangible or electronic version: all inventions, discoveries, improvements, methods, developments, ideas, research plans and results, nucleic acid sequences, software, models, methods, notebooks (either paper copy or electronic copy), practices, systems, plans, policies, formulas, designs, products, projects and know-how which Idera owns, controls or has access to or which relate to Idera's technology or business; all information pertaining to the financial condition, business affairs or prospects of Idera; and all supplier, client or customer lists of Idera.

(c) All tangible materials, either in paper form or electronic form, containing Confidential Information or copies thereof and all tangible property of Idera in my custody or possession shall be delivered to Idera upon the earlier of (i) a request by Idera or (ii) termination of my employment or consultancy. After such delivery, I shall not retain any such materials or copies thereof or any such tangible property.

(d) I agree that my obligation not to disclose or to use information and materials of the types set forth in paragraphs (a) and (b) above, and my obligation to return materials and tangible property set forth in paragraph (c) above, also extends to such types of information, materials and tangible property of customers of Idera or suppliers to Idera or other third parties who may have disclosed or entrusted the same to Idera or to me in the course of Idera's business.

### 2. Developments.

(a) I will make full and prompt disclosure to Idera of all inventions, improvements, discoveries, methods, developments, software and works of authorship, whether or not patentable or copyrightable, which are created, made, conceived or reduced to practice by me or



under my direction or jointly with others in the course of my employment or consultancy with Idera, whether or not during normal working hours or on the premises of Idera (all of which are collectively referred to in this Agreement as "Developments").

(b) I agree to assign and do hereby assign to Idera (or any person or entity designated by Idera) all my right, title and interest in and to all Developments and all related patents, patent applications, certificates of invention, applications for certificates of invention, utility models, applications for utility models, copyrights, copyright applications and other industrial and intellectual property rights. I also hereby agree to waive and do hereby waive all claims to moral rights in all Developments.

(c) I agree to cooperate fully with Idera, both during and after my employment or consultancy with Idera, with respect to the procurement, maintenance and enforcement of copyrights, patents and other industrial and intellectual property rights (both in the United States and foreign countries) relating to Developments. Idera will reimburse you for all reasonable and necessary expenses incurred or paid you in connection with the performance of such services to procure, maintain or enforce any of Idera's property rights in relation to this subsection.

### 3. Other Agreements.

(a) I represent that my performance of all the terms of this Agreement and as an employee of or consultant to Idera does not and will not breach any agreement to refrain from competing, directly or indirectly, with the business of any previous employer or any other party nor any agreement to keep in confidence information, knowledge or data acquired by me in confidence or in trust prior to my employment or consultancy with Idera. I will not disclose to Idera or induce Idera to use any confidential or proprietary information or material belonging to any previous employer or others. I will not hereafter grant anyone any rights inconsistent with the terms of this Agreement.

(b) I represent that I am not under investigation by the FDA or other regulatory authority for debarment action, nor have I been debarred pursuant to the Generic Drug Enforcement Act of 1992 (21 U.S.C. 301 et seq.) or any analogous law or statute.

### 4. United States Government Obligations.

I acknowledge that Idera from time to time may have agreements with other persons or with the United States Government, or agencies thereof, which impose obligations or restrictions on Idera regarding inventions made during the course of work under such agreements or regarding the confidential nature of such work. I agree to be bound by all such obligations and restrictions and to take all action necessary to discharge the obligations of Idera under such agreements.

### 5. Non-Compete.



During the period of my employment by or engagement as a consultant to Idera and for a period of one (1) year following the date of termination or expiration thereof, I will not directly or indirectly:

(i) as an individual proprietor, partner, stockholder, officer, employee, director, joint venturer, investor, lender or in any other capacity whatsoever (other than as the holder of not more than one percent (1%) of the total outstanding stock of a publicly held company), engage in developing, producing, performing, marketing or selling oligonucleotide-based products, processes or services for or on behalf of any entity whose principal business is creating or developing oligonucleotide-based products or therapeutics; or

(ii) recruit, solicit or induce, or attempt to induce, any employee, agent, consultant or contractor of Idera to terminate his, her or its employment with, or otherwise cease his, her or its relationship with, Idera; or

(iii) solicit, divert or take away, or attempt to divert or to take away, the business or patronage of any of the clients, customers or accounts, or prospective clients, customers or accounts, of Idera which are contacted solicited or served by me while employed by or engaged as a consultant to Idera.

#### 6. General.

(a) This Agreement sets forth the entire agreement, and supersedes all prior agreements, whether written or oral, between me and Idera relating to the subject matter of this Agreement. This Agreement may not be modified, changed or discharged in whole or in part, except by an agreement in writing signed by me and Idera.

(b) This Agreement will be binding upon my heirs, executors and administrators and will inure to the benefit of Idera and its successors and assigns.

(c) This Agreement is governed by and will be construed as a sealed instrument under and in accordance with the laws of the Commonwealth of Massachusetts, without giving effect to conflict of laws provisions.

(d) This Agreement does not constitute a contract of employment or consultancy and does not imply that my employment or consultancy will continue for any period of time. I agree that any change or changes in my position, duties, salary or compensation after the signing of this Agreement will not affect the validity or scope of this Agreement.

(e) I understand and agree that my obligations under this Agreement shall be effective as of the date of commencement of my employment or consultancy and shall survive any expiration or termination of my employment or consultancy. I further understand and agree that this Agreement shall remain in effect and my obligations under this Agreement shall remain applicable following any change in my status from that of an employee to that of a consultant



and vice versa, without any need for me to acknowledge or sign a new agreement and without any need for additional consideration.

(f) If any term or provision of this Agreement is found by any court of competent jurisdiction to be invalid or unenforceable to any extent or in any application, such term or provision shall be interpreted so as to be valid and enforceable to the fullest extent and in the broadest application permitted by law, and all of the terms and provisions of this Agreement shall not otherwise be affected thereby.

(g) I agree that the restrictions contained in this Agreement are necessary for the protection of the business and goodwill of Idera and are reasonable for such purpose. I agree that any breach of this Agreement will cause Idera substantial and irreparable harm and, therefore, in the event of any such breach, in addition to such other remedies which may be available, Idera shall have the right to seek specific performance and other injunctive and equitable relief.

I HAVE READ ALL OF THE PROVISIONS OF THIS AGREEMENT AND I UNDERSTAND, AND AGREE TO, EACH OF SUCH PROVISIONS.

\_\_\_\_\_  
Signature of Employee

\_\_\_\_\_  
Printed Name

Date: \_\_\_\_\_

**AGREED AND ACCEPTED:  
IDERA PHARMACEUTICALS, INC.**

Signature \_\_\_\_\_  
Printed Name

By: \_\_\_\_\_  
Title: \_\_\_\_\_  
Date: \_\_\_\_\_

**WITNESS:**  
\_\_\_\_\_

**Certification of Chief Executive Officer pursuant to Exchange Act Rules 13a-14  
and 15d-14, as adopted pursuant to Section 302 of Sarbanes-Oxley Act of 2002**

I, Sudhir Agrawal, certify that:

1. I have reviewed this Amendment No. 1 on Form 10-K/A of Idera Pharmaceuticals, Inc.; and
2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report.

*/s/ Sudhir Agrawal*

\_\_\_\_\_  
Sudhir Agrawal  
Chief Executive Officer

Dated: December 24, 2008

**Certification of Chief Financial Officer pursuant to Exchange Act Rules 13a-14  
and 15d-14, as adopted pursuant to Section 302 of Sarbanes-Oxley Act of 2002**

I, Louis J. Arcudi, III, certify that:

1. I have reviewed this Amendment No. 1 on Form 10-K/A of Idera Pharmaceuticals, Inc.; and
2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report.

*/s/Louis J. Arcudi, III*

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Louis J. Arcudi, III  
Chief Financial Officer

Dated: December 24, 2008