

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

SCHEDULE 13G

Under the Securities Exchange Act of 1934

(Amendment No. 6)\*

Acadia Pharmaceuticals Inc.

---

(Name of Issuer)

Common Stock, \$.0001 par value per share

---

(Title of Class of Securities)

004225108

---

(CUSIP Number)

December 31, 2010

---

(Date of Event Which Requires Filing of this Statement)

Check the appropriate box to designate the rule pursuant to which this Schedule is filed:

- Rule 13d-1(b)
- Rule 13d-1(c)
- Rule 13d-1(d)

\*The remainder of this cover page shall be filled out for a reporting person's initial filing on this form with respect to the subject class of securities, and for any subsequent amendment containing information which would alter the disclosures provided in a prior cover page.

The information required in the remainder of this cover page shall not be deemed to be "filed" for the purpose of Section 18 of the Securities Exchange Act of 1934 ("Act") or otherwise subject to the liabilities of that section of the Act but shall be subject to all other provisions of the Act (however, see the Notes).

- Item 1(a).** **Name of Issuer:** Acadia Pharmaceuticals Inc. (the “Issuer”).
- Item 1(b).** **Address of Issuer's Principal Executive Offices:** 3911 Sorrento Valley Boulevard, San Diego, CA 92121
- Item 2(a).** **Names of Persons Filing:** Oxford Bioscience Partners IV L.P. (“Oxford IV”) and mRNA Fund II L.P. (“mRNA II”) (collectively, the “Funds”); OBP Management IV L.P. (“OBP IV”), which is the sole general partner of the Funds; and Jonathan J. Fleming (“Fleming”) and Alan G. Walton (“Walton”) (together, the “General Partners”), who are the general partners of OBP IV. The persons named in this paragraph are referred to individually herein as a “Reporting Person” and collectively as the “Reporting Persons.”
- Item 2(b).** **Address of Principal Business Office or, if None, Residence:** The address of the principal business office of the Funds, OBP IV and Fleming is 222 Berkeley Street, Suite 1650, Boston, Massachusetts 02116. The address of the principal business office of Walton is 191 Post Road West, Westport, Connecticut 06880.
- Item 2(c).** **Citizenship:** The Funds and OBP IV are limited partnerships organized under the laws of the State of Delaware. Each of the General Partners is a United States citizen.
- Item 2(d).** **Title of Class of Securities:** Common Stock, \$0.0001 par value (the “Common Stock”).
- Item 2(e).** **CUSIP Number:** 004225108
- Item 3.** **If this statement is filed pursuant to §§240.13d-1(b) or 240.13d-2(b) or (c), check whether the person filing is a:**
- Not applicable.
- Item 4.** **Ownership.**
- Not applicable.
- Item 5.** **Ownership of Five Percent or Less of a Class.**
- Each Reporting Person has ceased to beneficially own five percent or more of the Issuer’s outstanding Common Stock.
- Item 6.** **Ownership of More than Five Percent on Behalf of Another Person.**
- Not Applicable.
- Item 7.** **Identification and Classification of the Subsidiary which Acquired the Security Being Reported on By the Parent Holding Company.**
- Not Applicable.

**Item 8. Identification and Classification of Members of the Group.**

Not Applicable. The Reporting Persons expressly disclaim membership in a “group” as used in Rule 13d-1(b)(ii)(J).

**Item 9. Notice of Dissolution of Group.**

Not Applicable.

**Item 10. Certification.**

Not Applicable. This statement on Schedule 13G is not filed pursuant to §240.13d-1(b) nor §240.13d-1(c).

SIGNATURE

After reasonable inquiry and to the best of its knowledge and belief, each of the undersigned certifies that the information set forth in this statement is true, complete and correct.

Date: February 7, 2011.

OXFORD BIOSCIENCE PARTNERS IV L.P.

By: OBP MANAGEMENT IV L.P.  
General Partner

By: \_\_\_\_\_ \*  
Jonathan J. Fleming  
General Partner

mRNA FUND II L.P.

By: OBP MANAGEMENT IV L.P.  
General Partner

By: \_\_\_\_\_ \*  
Jonathan J. Fleming  
General Partner

OBP MANAGEMENT IV L.P.

By: \_\_\_\_\_ \*  
Jonathan J. Fleming  
General Partner

\_\_\_\_\_  
Jonathan J. Fleming

\_\_\_\_\_  
Alan G. Walton

Raymond Charest  
As attorney-in-fact

\*By: /s/Raymond Charest\_\_\_\_\_

This Amendment No. 6 to Schedule 13G was executed by Raymond Charest on behalf of the individuals listed above pursuant to a Power of Attorney which was filed with the Securities and Exchange Commission on February 2, 2010, in connection with the filing by the Reporting Persons of Amendment No. 5 to Schedule 13G for Acadia Pharmaceuticals Inc., which Power of Attorney is incorporated herein by reference.

**EXHIBIT 1**

AGREEMENT

Pursuant to Rule 13d-1(k)(1) under the Securities Exchange Act of 1934, the undersigned hereby agree that only one statement containing the information required by Schedule 13G need be filed with respect to the ownership by each of the undersigned of shares of stock of Acadia Pharmaceuticals Inc.

This Agreement may be executed in any number of counterparts, each of which shall be deemed an original.

EXECUTED this 7th day of February, 2011.

OXFORD BIOSCIENCE PARTNERS IV L.P.

By: OBP MANAGEMENT IV L.P.  
General Partner

By: \_\_\_\_\_\*  
Jonathan J. Fleming  
General Partner

mRNA FUND II L.P.

By: OBP MANAGEMENT IV L.P.  
General Partner

By: \_\_\_\_\_\*  
Jonathan J. Fleming  
General Partner

OBP MANAGEMENT IV L.P.

By: \_\_\_\_\_\*  
Jonathan J. Fleming  
General Partner

\_\_\_\_\_\*  
Jonathan J. Fleming

\_\_\_\_\_\*  
Alan G. Walton

Raymond Charest  
As attorney-in-fact

\*By: /s/Raymond Charest

This Agreement was executed by Raymond Charest on behalf of the individuals listed above pursuant to a Power of Attorney which was filed with the Securities and Exchange Commission on February 2, 2010, in connection with the filing by the Reporting Persons of Amendment No. 5 to Schedule 13G for Acadia Pharmaceuticals Inc., which Power of Attorney is incorporated herein by reference.

