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

# **CURRENT REPORT**

Pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934

Date of Report (Date of earliest event reported):

March 19, 2010

# Lexicon Pharmaceuticals, Inc.

(Exact name of registrant as specified in its charter)

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

000-30111 (Commission File Number) 76-0474169 (I.R.S. Employer Identification Number)

8800 Technology Forest Place The Woodlands, Texas 77381 (Address of principal executive offices and Zip Code)

(281) 863-3000 (Registrant's telephone number, including area code)

Check the appropriate box below if the Form 8-	K filing is intended to	o simultaneously satisfy	the filing obligations of	the registrant
under any of the following provisions:				

	Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)
	Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)
	Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))
	Pre-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))

### Item 1.01 Entry into a Material Definitive Agreement

On March 19, 2010, Lexicon Pharmaceuticals, Inc. (the "Company") completed the sale of 96,521,739 shares of the Company's common stock, par value \$0.001 per share (the "Common Stock"), including 8,804,348 shares of Common Stock upon exercise of the underwriters' over-allotment option, under the Underwriting Agreement dated March 15, 2010 among the Company and Morgan Stanley & Co. Incorporated, J.P. Morgan Securities Inc., Cowen and Company, LLC and Thomas Weisel Partners LLC. An affiliate of Invus, L.P. ("Invus"), the Company's largest stockholder, purchased from the underwriters 29,021,739 of such shares.

On March 19, 2010, the Company also completed the sale of 59,296,749 shares of Common Stock under the Purchase Agreement dated March 15, 2010 between the Company and Invus and the sale of an additional 5,951,718 shares of Common Stock under a Purchase Agreement Supplement entered into on March 19, 2010 among the Company, Invus and its affiliate. These shares were issued to Invus and its affiliate in reliance upon the exemptions from the registration requirements under the Securities Act of 1933, as amended, pursuant to Section 4(2) thereof and Regulation D thereunder. In issuing the shares of Common Stock to Invus and its affiliate, the Company relied upon the representations and warranties of Invus and its affiliate in support of the satisfaction of the conditions contained in Section 4(2) and Regulation D.

The net proceeds to Lexicon from the public offering and concurrent private placement are approximately \$181.4 million, after deducting underwriting discounts and commissions and estimated offering expenses.

The Purchase Agreement Supplement is filed as Exhibit 10.1 to this report and is incorporated herein by reference.

The Company and Invus are also parties to a Securities Purchase Agreement, dated June 17, 2007 and amended October 7, 2009 and March 15, 2010, a Registration Rights Agreement, dated June 17, 2007, and amended March 15, 2010, and a Stockholders' Agreement dated June 17, 2007.

# Item 3.02 Unregistered Sales of Equity Securities

**Financial Statements and Exhibits** 

Item 9.01

The information set forth in Item 1.01 is incorporated herein by reference.

(d)	Exhibits		
Exhibit No.		Description	
10.1		Purchase Agreement Supplement with Invus. I. P. and Invus. C. V. dated March 19, 2010.	

# **Signatures**

Pursuant to the requirements of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned thereunto duly authorized.

# Lexicon Pharmaceuticals, Inc.

Date: March 19, 2010 By: /s/ Jeffrey L. Wade

Jeffrey L. Wade

Executive Vice President and

General Counsel

**Index to Exhibits** 

Description

Purchase Agreement Supplement with Invus, L.P. and Invus C.V. dated March 19, 2010 Exhibit No. 10.1

#### PURCHASE AGREEMENT SUPPLEMENT

March 19, 2010

Invus, L.P. c/o The Invus Group, LLC 750 Lexington Avenue (30th Floor) New York, New York 10022

Invus C.V. c/o The Invus Group, LLC 750 Lexington Avenue (30th Floor) New York, New York 10022

Lexicon Pharmaceuticals, Inc. 8800 Technology Forest Place The Woodlands, Texas 77381 Attn: President and Chief Executive Officer

Re: Purchase Agreement Supplement

#### Ladies and Gentlemen:

Reference is made to the Purchase Agreement, dated as March 15, 2010 (the "Purchase Agreement"), by and between Invus, L.P. ("Invus, L.P.") and Lexicon Pharmaceuticals, Inc. (the "Company") and to the Supplement to Transaction Agreements (the "Supplement to Transaction Agreements"), dated as of March 15, 2010, by and among Invus, L.P., Invus C.V. ("Invus C.V.", and together with Invus, L.P., the "Investors") and the Company. Capitalized terms used but not otherwise defined herein shall have the meanings ascribed to them in the Purchase Agreement. The Company has informed the Investors that the underwriters under the Underwriting Agreement, dated as of March 15, 2010, by and between the Company and the several underwriters party thereto have exercised their over-allotment option thereunder to purchase an additional 8,804,348 shares of Company Common Stock.

In connection with the Offering (as defined in the Supplement to Transaction Agreements), Invus, L.P. hereby assigns to Invus C.V. its right under Section 4.02(a) of the Stockholders' Agreement to purchase that number of shares of Company Common Stock as set forth below.

Accordingly, the Investors hereby agree to purchase from the Company the number of additional shares of Company Common Stock specified below (the "<u>Additional Invus Shares</u>") at a price per share equal to the Price to Public, for the total purchase price specified below:

Number of shares to be purchased by Invus, L.P.: 5,190,848 shares of Company Common Stock
Number of shares to be purchased by Invus C.V.: 760,870 shares of Company Common Stock

Total Purchase Price: \$6,844,475.70

The issuance, purchase and delivery of the Additional Invus Shares is being made on the basis of the same representations and warranties and on the same terms and subject to the same conditions, and is considered a part of, the sale of the Invus Shares. The closing of the sale of the Additional Invus Shares shall take place at a time and place to be mutually agreed to by the parties.

This supplement to the Purchase Agreement shall be deemed to satisfy the Company's obligations under the Stockholders' Agreement with respect to the delivery of a Notice of Issuance with respect to the Additional Invus Shares.

This supplement shall automatically terminate upon any termination of the Purchase Agreement and shall be interpreted as a part of and in accordance with the Purchase Agreement.

[Signature Pages Follow]

Sincerely,

INVUS, L.P.,

a Bermuda limited partnership

By: Invus Advisors, L.L.C., its general partner

By: /s/ Raymond Debbane Raymond Debbane

Name:

President Title:

INVUS C.V., a Netherlands limited partnership

By: Ulys, L.L.C., its general partner

/s/ Raymond Debbane Raymond Debbane By:

Name:

President Title:

# Accepted and agreed to:

# LEXICON PHARMACEUTICALS, INC., a Delaware corporation

By: /s/ Arthur T. Sands

Name: Arthur T. Sands, M.D. Ph.D.

Title: President and Chief Executive Officer