

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

**FORM S-8
REGISTRATION STATEMENT**
UNDER
THE SECURITIES ACT OF 1933

ALEXION PHARMACEUTICALS, INC.

(Exact name of registrant as specified in its charter)

Delaware

(State or other jurisdiction of
incorporation or organization)

13-3648318

(I.R.S Employer
Identification No.)

352 Knotter Drive, Cheshire, CT

(Address of Principal Executive Offices)

6410

(Zip Code)

**Alexion Pharmaceuticals, Inc. 2015 Employee Stock Purchase Plan
Alexion Pharmaceuticals, Inc. Amended and Restated 2004 Incentive Plan**
(Full title of the plan)

John B. Moriarty, Jr., Esq.
Executive Vice President, General Counsel
Alexion Pharmaceuticals, Inc.

352 Knotter Drive

Cheshire, Connecticut 06410

(Name and address of agent for service)

(203) 272-2596

(Telephone number, including area code, of agent for service)

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.

Large accelerated filer

Non-accelerated filer (Do not check if a smaller reporting company)

Accelerated filer

Smaller reporting company

CALCULATION OF REGISTRATION FEE

Title of Each Class of Securities to be Registered	Amount to be Registered (1)	Proposed Maximum Offering Price Per Share	Proposed Maximum Aggregate Offering Price	Amount of Registration Fee
2015 Employee Stock Purchase Plan Common Stock, \$0.0001 par value per share	1,000,000 shares (2)	\$153.40 (3)	\$153,400,000 (3)	\$17,826.00
Amended and Restated 2004 Incentive Plan Common Stock, \$0.0001 par value per share	5,792,438 shares (4)	\$117.60 (5)	\$681,190,709 (5)	\$79,155.00
Amended and Restated 2004 Incentive Plan Common Stock, \$0.0001 par value per share	10,800,000 shares (6)	\$180.47 (7)	\$1,949,076,000 (7)	\$226,483.00
TOTALS	17,592,438 shares		\$2,783,666,709	\$323,464.00

(1) Pursuant to Rule 416(a) under the Securities Act of 1933, as amended (the “Securities Act”) this Registration Statement also covers an indeterminate number of additional shares of common stock of Alexion Pharmaceuticals, Inc. (the “Registrant”), par value \$0.0001 per share (the “Common Stock”), that may issued to prevent dilution from stock splits, stock dividends and similar transactions.

(2) Represents shares of Common Stock reserved for issuance pursuant to future awards under the Registrant’s 2015 Employee Stock Purchase Plan (the “ESPP”).

(3) Estimated solely for the purpose of calculating the registration fee pursuant to Rule 457 under the Securities Act, based upon a 15% discount from the average of the high and low prices of the Common Stock as reported by the Nasdaq Global Select Market on June 29, 2015 of \$183.55 and \$177.38, respectively. Pursuant to the ESPP, the purchase price of the shares of Common Stock reserved for issuance thereunder will be 85% of the lower of the fair market value of the Common Stock on (i) date an option is granted under the ESPP, which will be the first day of the applicable offering period or (ii) the exercise date, which will the last day of the applicable offering period.

(4) Represents shares of Common Stock reserved for issuance upon the exercise of unexercised options to purchase shares of Common stock (the “Options”) previously issued under the Registrant’s Amended and Restated 2004 Incentive Plan (the “2004 Plan”).

(5) Estimated solely for the purpose of calculating the registration fee pursuant to Rule 457 under the Securities Act, based upon the weighted average exercise price of the Options of \$117.60.

(6) Represents shares of Common Stock reserved for issuance pursuant to future awards under the 2004 Plan.

(7) Estimated solely for the purpose of calculating the registration fee pursuant to Rule 457 under the Securities Act, based upon the average of the high and low prices of the Common Stock as reported by the Nasdaq Global Select Market on June 29, 2015 of \$183.55 and \$177.38, respectively.

EXPLANATORY NOTE

This Registration Statement on Form S-8 (this “Registration Statement”) registers 1,000,000 shares of common stock, par value \$0.0001 per share (the “Common Stock”) of Alexion Pharmaceuticals, Inc. (the “Registrant”) that may be issued and sold pursuant to the Registrant’s 2015 Employee Stock Purchase Plan (the “ESPP”). At the Registrant’s Annual Meeting of Stockholders held on May 12, 2010 and Annual Meeting of Stockholders held on May 6, 2013, the Registrant’s stockholders approved amendments to Registrant’s Amended and Restated 2004 Incentive Plan (the “2004 Plan”) to increase the number of shares of Common Stock that may be issued pursuant to awards under the 2004 Plan. In addition to the registration of 10,800,000 shares of Common Stock currently reserved for issuance pursuant to future awards under the 2004 Plan, this Registration Statement registers an additional 5,792,438 shares of Common Stock issuable upon the exercise of options to purchase shares of Common stock that were previously granted by the Registrant, but that the Registrant has not previously registered.

PART I

INFORMATION REQUIRED IN THE SECTION 10(a) PROSPECTUS

As permitted by Rule 428 under the Securities Act of 1933, as amended (the “Securities Act”), this Registration Statement omits the information specified in Part I of Form S-8. The documents containing the information specified in Part I will be delivered to the participants of the ESPP and the 2004 Plan, as applicable, as required by Rule 428(b).

PART II

INFORMATION REQUIRED IN THE REGISTRATION STATEMENT

Item 3. Incorporation of Documents by Reference.

We incorporate by reference herein the following documents filed by the Registrant with the Securities and Exchange Commission (the “SEC”):

- (a) the Registrant’s Annual Report on Form 10-K for the fiscal year ended December 31, 2014 filed with the SEC pursuant to the Securities Exchange Act of 1934, as amended (the “Exchange Act”), on February 6, 2015;
- (b) the Registrant’s Quarterly Report on Form 10-Q, filed with the SEC on April 24, 2015;
- (c) the Registrant’s Current Reports on Form 8-K filed on January 7, 2015, January 29, 2015, March 16, 2015, March 26, 2015, April 7, 2015, May 6, 2015, May 12, 2015 and June 23, 2015; and
- (d) the description of the Common Stock, which is contained in the Registrant’s registration statement on Form 8-A filed by the Registrant with the SEC under Section 12 of the Exchange Act on February 21, 1997, including any amendments or reports filed for the purpose of updating such description.

All documents subsequently filed by the Registrant pursuant to Sections 13(a), 13(c), 14 and 15(d) of the Exchange Act, prior to the filing of a post-effective amendment to this Registration Statement that indicates that all securities offered have been sold or which deregisters all securities then remaining unsold, shall be deemed to be incorporated herein by reference from the date of filing of such documents. Any statement contained herein or in a document incorporated or deemed to be incorporated by reference herein shall be deemed to be modified or superseded for purposes of this Registration Statement to the extent that a statement contained herein or in any subsequently filed document which also is incorporated or is deemed to be incorporated by reference herein modifies or supersedes such earlier statement. Any statement so modified or superseded shall not be deemed, except as so modified or superseded, to constitute part of this Registration Statement.

Item 4. Description of Securities.

Not applicable.

Item 5. Interests of Named Experts and Counsel.

Not applicable.

Item 6. Indemnification of Directors and Officers.

The Registrant is incorporated under the laws of the State of Delaware. Section 145 of the Delaware General Corporation Law (the “DGCL”), empowers a Delaware corporation to indemnify any person who was or is a party or is threatened to be made a party to any threatened, pending or completed action, suit or proceeding, whether civil, criminal, administrative or investigative (other than an action by or in the right of such corporation) by reason of the fact that such person is or was a director, officer, employee or agent of such corporation, or is or was serving at the request of such corporation as a director, officer, employee or agent of another corporation or enterprise. A corporation may, in advance of the final disposition of any civil, criminal, administrative or investigative action, suit or proceeding, pay the expenses (including attorneys’ fees) incurred by any officer, director, employee or agent in defending such action, provided that the director or officer undertakes to repay such amount if it shall ultimately be determined that he is not entitled to be indemnified by the corporation. A corporation may indemnify such person against expenses (including attorneys’ fees), judgments, fines and amounts paid in settlement actually and reasonably incurred by such person in connection with such action, suit or proceeding if he acted in good faith and in a manner he reasonably believed to be in or not opposed to the best interests of the corporation, and, with respect to any criminal action or proceeding, had no reasonable cause to believe his conduct was unlawful.

A Delaware corporation may indemnify officers and directors in an action by or in the right of the corporation to procure a judgment in its favor under the same conditions, except that no indemnification is permitted without judicial approval if the officer or director is adjudged to be liable to the corporation. Where an officer or director is successful on the merits or otherwise in the defense of any action referred to above, the corporation must indemnify him against the expenses (including attorneys fees) which he actually and reasonably incurred in connection therewith. The indemnification provided is not deemed to be exclusive of any other rights to which an officer or director may be entitled under any corporation’s by-law, agreement, vote or otherwise.

In accordance with Section 145 of the DGCL, Section EIGHTH of the Registrant’s Certificate of Incorporation, as amended (the “Charter”), provides that the Registrant shall indemnify each person who is or was a director, officer, employee or agent of the Registrant (including the heirs, executors, administrators or estate of such person) or is or was serving at the Registrant’s request as a director, officer, employee or agent of another corporation, partnership, joint venture, trust or other enterprise, to the fullest extent permitted. The indemnification provided by the Charter shall not be deemed exclusive of any other rights to which any of those seeking indemnification or advancement of expenses may be entitled under any by-law, agreement, vote of shareholders or disinterested directors or otherwise, both as to action in his official capacity and as to action in another capacity while holding such office, and shall continue as to a person who has ceased to be a director, officer, employee or agent and shall inure to the benefit of the heirs, executors and administrators of such a person. Expenses (including attorneys’ fees) incurred in defending a civil, criminal, administrative or investigative action, suit or proceeding shall be paid by the Registrant in advance of the final disposition of such action, suit or proceeding upon receipt of an undertaking by or on behalf of the indemnified person to repay such amount if it shall ultimately be determined that he is not entitled to be indemnified by the Registrant. Section NINTH of the Charter provides that the Registrant’s directors shall not be personally liable to the Registrant or the Registrant’s stockholders for monetary damages for breach of fiduciary duty as a director, except for liability (i) for any breach of the director’s duty of loyalty to the Registrant or its stockholders, (ii) for acts or omissions not in good faith or which involve intentional misconduct or a knowing violation of law, (iii) under Section 174 of the DGCL, or (iv) for any transaction from which the director derived an improper personal benefit.

Insofar as the indemnification for liabilities arising under the Securities Act may be permitted to the Registrant’s directors, officers or controlling persons pursuant to the foregoing provisions, we have been informed that in the opinion of the SEC such indemnification is against public policy as expressed in the Securities Act and is, therefore, unenforceable.

Item 7. Exemption From Registration Claimed.

Not applicable.

Item 8. Exhibits.

For the list of exhibits, see the Exhibit Index to this Registration Statement which is incorporated by reference into this Item.

Item 9. Undertakings.

(a) The undersigned Registrant hereby undertakes:

(1) To file, during any period in which offers or sales are being made, a post-effective amendment to this Registration Statement:

(i) To include any prospectus required by Section 10(a)(3) of the Securities Act;

(ii) To reflect in the prospectus any facts or events arising after the effective date of the Registration Statement (or the most recent post-effective amendment thereof) which, individually or in the aggregate, represent a fundamental change in the information set forth in the Registration Statement. Notwithstanding the foregoing, any increase or decrease in volume of securities offered (if the total dollar value of securities offered would not exceed that which was registered) and any deviation from the low or high end of the estimated maximum offering range may be reflected in the form of a prospectus filed with the SEC pursuant to Rule 424(b) if, in the aggregate, the changes in volume and price represent no more than 20 percent change in the maximum aggregate offering price set forth in the "Calculation of Registration Fee" table in the effective Registration Statement;

(iii) To include any material information with respect to the plan of distribution not previously disclosed in the Registration Statement or any material change to such information in the Registration Statement;

provided, however, that paragraphs (a)(1)(i) and (a)(1)(ii) above shall not apply if the information required to be included in a post-effective amendment by those paragraphs is contained in reports filed with or furnished to the Commission by the Registrant pursuant to Section 13 or 15(d) of the Exchange Act that are incorporated by reference in the Registration Statement.

(2) That, for the purpose of determining any liability under the Securities Act, each such post-effective amendment shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial *bona fide* offering thereof.

(3) To remove from registration by means of a post-effective amendment any of the securities being registered which remain unsold at the termination of the offering.

(b) The undersigned Registrant hereby undertakes that, for purposes of determining any liability under the Securities Act, each filing of the Registrant's annual report pursuant to Section 13(a) or 15(d) of the Exchange Act (and, where applicable, each filing of an employee benefit plan's annual report pursuant to Section 15(d) of the Exchange Act) that is incorporated by reference in the Registration Statement shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial *bona fide* offering thereof.

(c) Insofar as indemnification for liabilities arising under the Securities Act may be permitted to directors, officers and controlling persons of the Registrant pursuant to the foregoing provisions, or otherwise, the Registrant has been advised that in the opinion of the SEC such indemnification is against public policy as expressed in the Securities Act and is, therefore, unenforceable. In the event that a claim for indemnification against such liabilities (other than the payment by the Registrant of expenses incurred or paid by a director, officer or controlling person of the Registrant in the successful defense of any action, suit or proceeding) is asserted by such director, officer or controlling person in connection with the securities being registered, the Registrant will, unless in the opinion of its counsel the matter has been settled by controlling precedent, submit to a court of appropriate jurisdiction the question whether such indemnification by it is against public policy as expressed in the Securities Act and will be governed by the final adjudication of such issue.

SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, the Registrant certifies that it has reasonable grounds to believe that it meets all of the requirements for filing on Form S-8 and has duly caused this Registration Statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the Town of Cheshire, State of Connecticut, on this 30th day of June, 2015.

ALEXION PHARMACEUTICALS, INC.

By: _____ /s/ David Hallal
David Hallal
Chairman and Chief Executive Officer
Dated: June 30, 2015

By: _____ /s/ Vikas Sinha
Vikas Sinha, M.B.A., C.A.
Executive Vice President and Chief Financial Officer
Dated: June 30, 2015

POWER OF ATTORNEY

Each person whose signature appears below constitutes and appoints David Hallal and Vikas Sinha, and each of them acting individually, his or her true and lawful attorney-in-fact and agent with full power of substitution and resubstitution, for him or her and in his or her name, place and stead, in any and all capacities, to sign any and all amendments (including post-effective amendments) to this Registration Statement on Form S-8 to be filed by Alexion Pharmaceuticals, Inc., and to file the same, with all exhibits thereto, and other documents in connection therewith, with the Securities and Exchange Commission, granting unto said attorneys-in-fact and agents full power and authority to be done in and about the premises, as fully to all intents and purposes as he or she might or could do in person, hereby ratifying and confirming all that said attorneys-in-fact and agents, or their substitutes, may lawfully do or cause to be done by virtue hereof.

* * * *

Pursuant to the requirements of the Securities Act of 1933, as amended, this Registration Statement has been signed by the following persons in the capacities and on the dates indicated:

<u>/s/ David Hallal</u> David Hallal	Chief Executive Officer and Director (principal executive officer)	June 30, 2015
<u>/s/ Vikas Sinha</u> Vikas Sinha, M.B.A., C.A., C.P.A.	Executive Vice President and Chief Financial Officer (principal financial officer)	June 30, 2015
<u>/s/ Scott Phillips</u> Scott Phillips, C.P.A.	Senior Vice President, Corporate Controller and Chief Accounting Officer (principal accounting officer)	June 30, 2015
<u>/s/ Leonard Bell</u> Leonard Bell, M.D.	Chairman of the Board of Directors	June 30, 2015
<u>/s/ David R. Brennan</u> David R. Brennan	Director	June 30, 2015
<u>/s/ M. Michele Burns</u> M. Michele Burns	Director	June 30, 2015
<u>/s/ Christopher J. Coughlin</u> Christopher J. Coughlin	Director	June 30, 2015
<u>/s/ John T. Mollen</u> John T. Mollen	Director	June 30, 2015
<u>/s/ R. Douglas Norby</u> R. Douglas Norby	Director	June 30, 2015
<u>/s/ Alvin S. Parven</u> Alvin S. Parven	Director	June 30, 2015
<u>/s/ Andreas Rummelt</u> Andreas Rummelt, Ph.D.	Director	June 30, 2015
<u>/s/ Ann Veneman</u> Ann Veneman	Director	June 30, 2015

EXHIBIT INDEX

Exhibit

- 4.1 Certificate of Incorporation (previously filed as Exhibit 3.1 to the registration statement on Form S-3 filed on September 2, 2005 (File No. 333-128085) and incorporated herein by reference).
- 4.2 Certificate of Amendment of the Certificate of Incorporation (previously filed as Exhibit 3.2 to the Annual Report on Form 10-K filed on February 2, 2012 (File No. 000-27756) and incorporated herein by reference).
- 4.3 Amended and Restated By-laws (previously filed as Exhibit 3.1 to the quarterly report on Form 10-Q filed on October 25, 2013 (File No. 000-27756) and incorporated herein by reference).
- 4.4 Specimen Common Stock Certificate (previously filed as Exhibit 4.1 to the registration statement on Form S-1 (File No. 333-00202) and incorporated herein by reference).
- 4.5* Alexion Pharmaceuticals, Inc. 2015 Employee Stock Purchase Plan.
- 4.6 Alexion Pharmaceuticals, Inc. Amended and Restated 2004 Incentive Plan (previously filed as Exhibit 10.14 to the Annual Report on Form 10-K filed on February 10, 2014 (File No. 000-27756) and incorporated herein by reference).
- 5.1* Opinion of Ropes & Gray LLP.
- 23.1* Consent of PricewaterhouseCoopers LLP.
- 23.2* Consent of Ropes & Gray LLP (included in the opinion filed as Exhibit 5.1).
- 24.1* Powers of Attorney (included on the signature page in Part II).

* Filed herewith.

ALEXION PHARMACEUTICALS, INC.
2015 EMPLOYEE STOCK PURCHASE PLAN

Section 1. Defined Terms

Exhibit A, which is incorporated by reference, defines the terms used in the Plan and sets forth certain operational rules related to those terms.

Section 2. Purpose of Plan

The Plan is intended to enable Eligible Employees of the Company and its Designated Subsidiaries to use payroll deductions to purchase shares of Stock, and thereby acquire an interest in the future of the Company. The Plan is intended to qualify as an “employee stock purchase plan” under Section 423 and to be exempt from the application and requirements of Section 409A of the Code, and is to be construed accordingly.

Section 3. Options to Purchase Stock

Subject to adjustment pursuant to Section 16 of this Plan, the maximum aggregate number of shares of Stock available for purchase pursuant to the exercise of Options granted under the Plan to Eligible Employees will be 1,000,000 shares. The shares of Stock to be delivered upon exercise of Options under the Plan may be either shares of authorized but unissued Stock, treasury Stock, or Stock acquired in an open-market transaction, all as the Board may determine. If any Option granted under the Plan expires or terminates for any reason without having been exercised in full or ceases for any reason to be exercisable in whole or in part, the unpurchased shares of Stock subject to such Option will again be available for purchase pursuant to the exercise of Options under the Plan. If, on an Exercise Date, the total number of shares of Stock that would otherwise be subject to Options granted under the Plan exceeds the number of shares then available under the Plan (after deduction of all shares for which Options have been exercised or are then outstanding), the Administrator shall make a pro rata allocation of the shares remaining available for the Option grants in as uniform a manner as shall be practicable and as it shall determine to be equitable. In such event, the Administrator shall give written notice to each Participant of such reduction of the number of Options affected thereby and shall similarly reduce the rate of payroll deductions, if necessary.

Section 4. Eligibility

Subject to Section 13 and Section 18, and any exceptions and limitations set forth in Section 6 or as permitted under Section 423, or as may be provided elsewhere in the Plan or any sub-plan contemplated by Section 18, each Employee who (a) has been continuously employed by the Company or a Designated Subsidiary as of the first day of any Option Period, (b)

customarily works twenty (20) hours or more per week, (c) is employed by the Company or a Designated Subsidiary, and (d) satisfies the requirements set forth in the Plan will be an “**Eligible Employee.**” Notwithstanding the above, an Employee who is a citizen or resident of a foreign jurisdiction (without regard to whether such Employee is also a citizen of the United States or resident alien in the United States) shall not be an Eligible Employee with respect to the Plan if the grant of an Option to such Employee is prohibited under the laws of the Employee’s foreign jurisdiction or compliance with the laws of the foreign jurisdiction would cause the Plan or an Option to violate the requirements of Section 423. In no event, however, may an Employee be granted an Option under the Plan if, immediately after the Option is granted, the Employee would own (or pursuant to Section 424(d) of the Code would be deemed to own) stock possessing five percent (5%) or more of the total combined voting power or value of all classes of stock of the Company or of any Parent or Subsidiary as may exist from time to time. The Administrator may, for Option Periods that have not yet commenced, establish additional eligibility requirements not inconsistent with Section 423.

Section 5. Option Periods

The Plan will generally be implemented by a series of “**Option Periods.**” Unless otherwise determined by the Administrator, the Option Periods will be the six-month periods commencing January 1 and ending June 30 and commencing July 1 and ending December 31 of each year. Each June 30 and December 31 will be an “**Exercise Date.**” The Administrator may change the Exercise Date and the commencement date, ending date and duration of the Option Periods to the extent permitted by Section 423.

Section 6. Option Grant

Subject to the limitations set forth in Section 4 and Section 10 and the Maximum Share Limit, on the first day of an Option Period, each Participant automatically will be granted an Option to purchase shares of Stock on the Exercise Date; *provided, however,* that no Participant will be granted an Option under the Plan that permits the Participant’s right to purchase shares of Stock under the Plan and under all other employee stock purchase plans of the Company and its Parent and Subsidiaries, if any, to accrue at a rate that exceeds \$25,000 in Fair Market Value (or such other maximum as may be prescribed from time to time by the Code) for each calendar year during which any Option granted to such Participant is outstanding at any time, as determined in accordance with Section 423(b)(8) of the Code.

Section 7. Method of Participation

To participate in an Option Period, an Eligible Employee must execute and deliver to the Administrator a payroll deduction and participation authorization form in accordance with the procedures prescribed by and in a form acceptable to the Administrator and, in so doing, the

Eligible Employee will thereby become a Participant as of the first day of such Option Period. Such an Eligible Employee will remain a Participant with respect to subsequent Option Periods until his or her participation in the Plan is terminated as provided herein. Such payroll deduction and participation authorization must be delivered no later than fifteen (15) business days prior to the first day of an Option Period, or such other time as specified by the Administrator.

A Participant's authorization will remain in effect for subsequent Option Periods unless the Participant files a new authorization within fifteen (15) business days prior to the first day of an Option Period (or such other time as specified by the Administrator) or the Participant's Option is cancelled pursuant to Section 13 or Section 14. During an Option Period, payroll deduction authorizations may not be increased or decreased, except that a Participant may terminate his or her payroll deduction authorization by canceling his or her Option in accordance with Section 13.

Except as otherwise determined by the Administrator, each payroll deduction authorization will request payroll deductions in an amount either

(a) expressed as a whole percentage, between one percent (1%) and fifteen percent (15%) of the Participant's total base compensation per payroll period, determined as of the first day of an Option Period, including base pay or base salary; or

(b) a whole U.S. dollar amount between \$10 and \$12,500, or other applicable currency amount, but not to exceed fifteen percent (15%) of the Participant's total annual base compensation determined as of the first day of an Option Period.

If the Administrator determines that another limit shall be imposed on maximum payroll deductions hereunder or that eligible compensation shall be defined in a different manner, determinations shall be made in a manner that satisfies the requirements of Treasury Regulation Section 1.423-2(f)(2).

All payroll deductions made pursuant to this Section 7 will be credited to the Participant's Account. Amounts credited to a Participant's Account will not be required to be set aside in trust or otherwise segregated from the Company's general assets.

Section 8. Method of Payment

A Participant must pay for shares of Stock purchased upon the exercise of an Option with accumulated payroll deductions credited to the Participant's Account.

Section 9. Purchase Price

The Purchase Price of shares of Stock issued pursuant to the exercise of an Option on each Exercise Date will be eighty-five percent (85%) (or such greater percentage specified by the Administrator to the extent permitted under Section 423) of one of the following, as selected by the Administrator prior to the commencement of the relevant Option Period:

- (a) the Fair Market Value of a share of Stock on the date on which the Option was granted pursuant to Section 6 (*i.e.*, the first day of the Option Period);
- (b) the Fair Market Value of a share of Stock on the date on which the Option is deemed exercised pursuant to Section 10 (*i.e.*, the Exercise Date); or
- (c) the lesser of (a) and (b).

Section 10. Exercise of Options

Subject to the limitations set forth in Section 6 and this Section 10, with respect to each Option Period, on the applicable Exercise Date, each Participant will be deemed to have exercised his or her Option and total accumulated payroll deductions in the Participant's Account will be used to purchase full and fractional shares of Stock at the applicable Purchase Price that can be purchased with such Account balance at the applicable Purchase Price; *provided, however*, that no more than 350 shares of Stock may be purchased by a Participant on any Exercise Date, or such lesser number as the Administrator may prescribe in accordance with Section 423 (the "**Maximum Share Limit**"). As soon as practicable thereafter, shares of Stock so purchased will be placed, in book-entry form, into a record keeping account in the name of the Participant. Shares of Stock will be uncertificated; *provided, however*, that the Administrator shall have the discretion to establish procedures regarding the provision of stock certificates in the event such certificates are requested by a Participant. Prior to the commencement of an Option Period, the Administrator shall determine whether any payroll deductions accumulated in a Participant's Account that are not sufficient to purchase a full share will be retained in the Participant's Account for the subsequent Option Period, subject to earlier withdrawal by the Participant as provided in Section 13, or returned to the Participant or his or her legal representative, as applicable, without interest, as soon as administratively practicable after the Exercise Date or earlier withdrawal, as applicable.

Any amount of payroll deductions in a Participant's Account that are not used for the purchase of shares of Stock, whether because of the Participant's withdrawal from participation in an Option Period or for any other reason, will be returned to the Participant or his or her legal representative, as applicable, without interest, as soon as administratively practicable after such withdrawal or other event, as applicable.

If the Participant's accumulated payroll deductions on the Exercise Date would otherwise enable the Participant to purchase shares of Stock in excess of the Maximum Share Limit or the maximum Fair Market Value set forth in Section 6, the excess of the amount of the accumulated payroll deductions over the aggregate Purchase Price of the shares of Stock actually purchased will be returned to the Participant, without interest, as soon as administratively practicable after such Exercise Date.

Notwithstanding any provision of the Plan to the contrary, no Option may be exercised after 27 months from its grant date.

Section 11. Interest

No interest will be payable on any amount held in the Account of any Participant.

Section 12. Taxes

Payroll deductions will be made on an after-tax basis. The Administrator will have the right, as a condition to the exercise of an Option, to make such provision as it deems necessary to satisfy its obligations to withhold federal, state, local income or other taxes incurred by reason of the purchase or disposition of shares of Stock under the Plan. In the Administrator's discretion and subject to applicable law, such tax obligations may be paid in whole or in part by delivery of shares of Stock to the Company, including shares of Stock purchased under the Plan, valued at Fair Market Value, but not in excess of the minimum statutory amounts required to be withheld.

Section 13. Cancellation and Withdrawal

A Participant who holds an Option under the Plan may cancel all (but not less than all) of his or her Option and terminate his or her payroll deduction authorization by revoking such authorization by written notice delivered to the Administrator, which, to be effective with respect to an upcoming Exercise Date, must be delivered not later than fifteen (15) business days prior to such Exercise Date (or such other time as specified by the Administrator). Upon such termination and cancellation, the balance in the Participant's Account will be returned to the Participant, without interest, as soon as administratively practicable thereafter.

A Participant who makes a hardship withdrawal from a 401(k) Plan will be deemed to have terminated his or her payroll deduction authorization for subsequent payroll dates relating to the then current Option Period as of the date of such hardship withdrawal and amounts accumulated in the Participant's Account as of such date will be returned to the Participant, without interest, as soon as administratively practicable thereafter. An Employee who has made a hardship withdrawal from a 401(k) Plan will not be permitted to participate in Option Periods

commencing after the date of his or her hardship withdrawal until the first Option Period that begins at least six (6) months after the date of his or her hardship withdrawal.

Section 14. Termination of Employment; Death of Participant

Upon the termination of a Participant's employment with the Company (or a Designated Subsidiary, as applicable) for any reason or the death of a Participant during an Option Period prior to an Exercise Date or in the event the Participant ceases to qualify as an Eligible Employee, the Participant will cease to be a Participant, any Option held by him or her under the Plan will be deemed canceled, the balance in the Participant's Account will be returned to the Participant (or his or her estate or designated beneficiary in the event of the Participant's death), without interest, as soon as administratively practicable thereafter, and the Participant will have no further rights under the Plan.

Section 15. Equal Rights; Participant's Rights Not Transferable

All Participants granted Options under the Plan will have the same rights and privileges consistent with the requirements set forth in Section 423 except for Participants in certain sub-plans of non-U.S. Designated Subsidiaries, as described in Section 18. Any Option granted under the Plan will be exercisable during the Participant's lifetime only by him or her and may not be sold, pledged, assigned, or transferred in any manner. In the event any Participant violates or attempts to violate the terms of this Section 15, as determined by the Administrator in its sole discretion, any Options held by him or her may be terminated by the Company and, upon the return to the Participant of the balance of his or her Account, without interest, all of the Participant's rights under the Plan will terminate.

Section 16. Change in Capitalization; Merger

In the event of any change in the outstanding Stock by reason of a stock dividend, split-up, recapitalization, merger, consolidation, reorganization, or other capital change, the aggregate number and type of shares of Stock available under the Plan, the number and type of shares of Stock granted under any outstanding Options, the maximum number and type of shares of Stock purchasable under any outstanding Options, and the purchase price per share of Stock under any outstanding Option will be appropriately adjusted; provided, that no such adjustment will be made unless the Administrator is satisfied that it will not constitute a modification of the rights granted under the Plan or otherwise disqualify the Plan as an employee stock purchase plan under the provisions of Section 423.

In the event of a sale of all or substantially all of the Stock or a sale of all or substantially all of the assets of the Company, or a merger or similar transaction in which the Company is not the surviving corporation or that results in the acquisition of the Company by another person, the

Administrator may, in its discretion, (a) if the Company is merged with or acquired by another corporation, provide that each outstanding Option will be assumed or exchanged for a substitute Option granted by the acquiror or successor corporation or by a parent or subsidiary of the acquiror or successor corporation, (b) cancel each outstanding Option and return the balances in Participants' Accounts to the Participants, and/or (c) pursuant to Section 18, terminate the Option Period on or before the date of the proposed sale, merger or similar transaction.

Section 17. Administration of Plan

The Plan will be administered by the Administrator, which will have the right to determine any questions which may arise regarding the interpretation and application of the provisions of the Plan and to make, administer, and interpret such rules and regulations as it deems necessary or advisable. All determinations and decisions by the Administrator regarding the interpretation or application of the Plan will be final and binding on all Participants.

The Administrator may specify the manner in which Employees are to provide notices and payroll deduction authorizations. Notwithstanding any requirement of "written notice" herein, the Administrator may permit Employees to provide notices and payroll deduction authorizations electronically.

Section 18. Sub-Plans; Amendment and Termination of Plan

The Board reserves the right at any time or times to amend the Plan to any extent and in any manner it may deem advisable, by action of the Board; *provided*, that any amendment that would be treated as the adoption of a new plan for purposes of Section 423 will have no force or effect unless approved by the shareholders of the Company within 12 months before or after its adoption.

The Plan may be suspended or terminated at any time by the Company, by action of the Board. In connection therewith, the Board may provide, in its sole discretion, either that outstanding Options will be exercisable either at the Exercise Date for the applicable Option Period or on such earlier date as the Board may specify (in which case such earlier date will be treated as the Exercise Date for the applicable Option Period), or that the balance of each Participant's Account will be returned to the Participant, without interest.

Notwithstanding the foregoing or any provision of the Plan to the contrary, the Administrator may, in its sole discretion, amend the terms of the Plan, or an Option, in order to reflect the impact of local law outside of the United States as applied to one or more Eligible Employees of a Non-U.S. Designated Subsidiary and may, where appropriate, establish one or more sub-plans to reflect such amended provisions; *provided, however*, in no event shall any sub-plan (a) be considered part of the Plan for purposes of Section 423 of the Code or (b) cause

the Plan (other than the sub-plan) to fail to satisfy the requirements of Section 423 of the Code. In the event of any inconsistency between a sub-plan and the Plan document, the terms of the sub-plan shall govern with respect to any Eligible Employees of a Non-U.S. Designated Subsidiary. For the avoidance of doubt, shares of Stock purchased under a sub-plan shall reduce the maximum aggregate number of shares available for purchase pursuant to Section 3.

Section 19. Recycling of Shares.

In the event of the expiration, withdrawal, termination or other cancellation of an Option under the Plan, the number of Shares of Stock that were subject to the Option but not delivered shall again be available for issuance under the Plan.

Section 20. Approvals

Notwithstanding anything herein to the contrary, the obligation of the Company to issue and deliver shares of Stock under the Plan will be subject to the approval required of any governmental authority in connection with the authorization, issuance, sale or transfer of said shares of Stock and to any requirements of any national securities exchange applicable thereto.

Section 21. Participants' Rights as Shareholders and Employees

A Participant will have no rights or privileges as a shareholder of the Company and will not receive any dividends in respect of any shares of Stock covered by an Option granted hereunder until such Option has been exercised, full payment has been made for such shares of Stock, and the shares of Stock have been issued to the Participant.

Nothing contained in the provisions of the Plan will be construed as giving to any Employee the right to be retained in the employ of the Company or any Designated Subsidiary or as interfering with the right of the Company or any Designated Subsidiary to discharge, promote, demote or otherwise re-assign any Employee from one position to another within the Company any Designated Subsidiary or non-U.S. Designated Subsidiary at any time.

Section 22. Governing Law

The Plan will be governed by and interpreted consistently with the laws of the State of Delaware, except as may be necessary to comply with applicable requirements of federal law. For purposes of litigating any dispute that arises under the Plan, such litigation shall be conducted only in the courts of New Haven County, Connecticut, or the federal courts for the United States for the District of Connecticut, and no other courts.

Section 23. Notices.

Any notice or document required to be filed with the Administrator under or with respect to the Plan will be properly filed if delivered or mailed by registered mail, postage prepaid (or in such other form acceptable to the Administrator), to the Administrator at the Administrator's principal executive offices. The Administrator may, by advance written notice to affected persons, revise any notice procedure applicable to it from time to time. Any notice required under the Plan may be waived by the person entitled to notice.

Section 24. Effective Date and Term

Subject to the approval by the Company's shareholders at the Company's 2015 annual meeting, the Plan will become effective on May 6, 2015 (the "**Effective Date**") and no rights will be granted hereunder after the earliest to occur of (a) the Plan's termination by the Company, (b) the issuance of all shares of Stock available for issuance under the Plan or (c) May 6, 2025.

EXHIBIT A
Definition of Terms

The following terms, when used in the Plan, will have the meanings and be subject to the provisions set forth below:

“401(k) Plan”: A savings plan qualifying under Section 401(k) of the Code that is sponsored by the Company or one of its Subsidiaries for the benefit of its employees.

“Account”: A payroll deduction account maintained in the Participant’s name on the books of the Company or a Designated Subsidiary.

“Administrator”: The Compensation Committee of the Board and its delegates, except that the Compensation Committee may delegate its authority under the Plan to a sub-committee comprised of one or more of its members, to members of the Board, or to officers or employees of the Company to the extent permitted by applicable law. In each case references herein to the Administrator refer, as applicable, to such persons or groups so delegated to the extent of such delegation.

“Board”: The Board of Directors of the Company.

“Code”: The U.S. Internal Revenue Code of 1986 as from time to time amended and in effect, or any successor statute as from time to time in effect.

“Company”: Alexion Pharmaceuticals, Inc.

“Designated Subsidiary”: A Subsidiary of the Company that has been designated by the Board or the Compensation Committee of the Board from time to time as eligible to participate in the Plan. Exhibit B sets forth the Designated Subsidiaries as of the Effective Date.

“Effective Date”: The date set forth in Section 24 of the Plan.

“Eligible Employee”: Any Employee who meets the eligibility requirements set forth in Section 4 of the Plan or any other service provider who is eligible to participate under the specific rules of a sub-plan, as described in Section 18, regardless of whether he or she meets the eligibility requirements under Section 4 of this Plan.

“Employee”: Any person who is employed by the Company or a Designated Subsidiary. For the avoidance of doubt independent consultants and independent contractors are not “Employees” for purposes of the Plan. Notwithstanding any other provision of the Plan, individuals who are not treated as common law employees by the Company or a Designated Subsidiary on their payroll records are excluded from Plan participation even if a court or

administrative agency determines that such individuals are common law employees and not independent contractors. No employee of the Company or any Designated Subsidiary shall be eligible to participate in the Plan if the Administrator determines that such participation could be in violation of any local law and that it is permissible to exclude such employees from participation in the Plan under Section 423.

“Exercise Date”: The date set forth in Section 5 of the Plan or otherwise designated by the Administrator with respect to a particular Option Period on which a Participant will be deemed to have exercised the Option granted to him or her for such Option Period.

“Fair Market Value”:

(a) If the Stock is readily traded on an established U.S. national exchange or trading system (including the Nasdaq Global Market), the closing price of the Stock as reported by the principal exchange on which such Stock is traded; *provided, however*, that if such day is not a trading day in the U.S. Fair Market Value will mean the reported closing price of the Stock for the immediately preceding day that is a trading day.

(b) If the Stock is not traded on an established U.S. national exchange or trading system, the average of the bid and ask prices for such Stock where the bid and ask prices are quoted.

(c) If the Stock cannot be valued pursuant to clauses (a) or (b), the value as determined in good faith by the Board in its sole discretion.

“Maximum Share Limit”: The meaning set forth in Section 10 of the Plan.

“Non-U.S. Designated Subsidiary”: A Subsidiary of the Company incorporated outside of the United States that has been designated by the Board or the Compensation Committee of the Board from time to time as eligible to participate in the Plan. Exhibit C sets forth the Non-U.S. Designated Subsidiaries as of the Effective Date.

“Option”: An option granted pursuant to the Plan entitling the holder to acquire shares of Stock upon payment of the Purchase Price per share of Stock.

“Option Period”: An offering period established in accordance with Section 5 of the Plan.

“Parent”: A “parent corporation” as defined in Section 424(e) of the Code.

“Participant”: An Eligible Employee who elects to enroll in the Plan.

“Plan”: The Alexion Pharmaceuticals, Inc. 2014 Employee Stock Purchase Plan, as from time to time amended and in effect.

“Purchase Price”: The price per share of Stock with respect to an Option Period determined in accordance with Section 9 of the Plan.

“Section 423”: Section 423 of the Code and the regulations thereunder.

“Stock”: Common stock of the Company, par value \$0.0001 per share.

“Subsidiary”: A “subsidiary corporation” as defined in Section 424(f) of the Code.

EXHIBIT B
Designated Subsidiaries

B-1

EXHIBIT C
Non-U.S. Designated Subsidiaries

Alexion Pharma Canada Corp.

Alexion Services Latin America, Inc.

C-1

June 30, 2015

Alexion Pharmaceuticals, Inc.
352 Knotter Drive
Cheshire, Connecticut 06410
Attn: John B. Moriarty, Jr.

Re: Registration Statement on Form S-8

Ladies and Gentlemen:

This opinion is furnished to you in connection with a registration statement on Form S-8 (the "Registration Statement"), filed by Alexion Pharmaceuticals, Inc., a Delaware corporation (the "Company") with the Securities and Exchange Commission under the Securities Act of 1933, as amended (the "Act"), for the registration of 17,592,438 shares of Common Stock, \$0.001 par value (the "Shares"). Of such Shares, 1,000,000 are issuable under the Company's 2015 Employee Stock Purchase Plan (the "ESPP"), and 16,592,438 are issuable under the Company's Amended and Restated 2004 Incentive Plan (the "2004 Plan" and, together with the ESPP, the "Plans").

We are familiar with the actions taken by the Company in connection with the adoption of the Plans. For purposes of our opinion, we have examined and relied upon such documents, records, certificates and other instruments as we have deemed necessary. The opinions expressed below are limited to the Delaware General Corporation Law.

Based on the foregoing, we are of the opinion that the Shares have been duly authorized and, when the Shares have been issued and sold in accordance with the terms of the ESPP or 2004 Plan, as applicable, the Shares will be validly issued, fully paid and nonassessable.

We hereby consent to your filing this opinion as an exhibit to the Registration Statement and to the use of our name therein. Our consent shall not be deemed an admission that we are experts whose consent is required under Section 7 of the Act or the rules and regulations thereunder.

Very truly yours,
/s/ Ropes & Gray LLP
Ropes & Gray LLP

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We hereby consent to the incorporation by reference in the Registration Statement on Form S-8 of our report dated February 6, 2015 relating to the financial statements and the effectiveness of internal control over financial reporting, which appears in Alexion Pharmaceuticals, Inc.'s Annual Report on Form 10-K for the year ended December 31, 2014.

/s/ PricewaterhouseCoopers LLP

PricewaterhouseCoopers LLP
Hartford, Connecticut
June 30, 2015