
UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, DC 20549

SCHEDULE 13D
Under the Securities Exchange Act of 1934

(Amendment No. 10)

Neoleukin Therapeutics, Inc. (f/k/a Aquinox Pharmaceuticals, Inc.)

(Name of Issuer)

Common Stock, par value \$0.000001 per share

(Title of Class of Securities)

64049K104

(CUSIP number)

Alexandra A. Toohey
Chief Financial Officer
Baker Bros. Advisors LP
860 Washington Street, 3rd Floor
New York, NY 10014
(212) 339-5690

(Name, address and telephone number of person authorized to receive notices and communications)

August 8, 2019

(Date of event which requires filing of this statement)

If the filing person has previously filed a statement on Schedule 13G to report the acquisition that is the subject of this Schedule 13D, and is filing this schedule because of Rule 13d-1(e), 13d-1(f) or 13d-1(g), check the following box.

(Continued on the following pages)

Note: Schedules filed in paper format shall include a signed original and five copies of the schedule, including all exhibits. See Rule 13d-7 for other parties to whom copies are to be sent.

*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 disclosures provided in a prior cover page.

The information required on 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).

1.	NAMES OF REPORTING PERSONS Baker Bros. Advisors LP		
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input type="checkbox"/>		
3.	SEC USE ONLY		
4.	SOURCE OF FUNDS* OO		
5.	CHECK BOX IF DISCLOSURE OF LEGAL PROCEEDINGS IS REQUIRED PURSUANT TO ITEM 2(d) or 2(e) <input type="checkbox"/>		
6.	CITIZENSHIP OR PLACE OF ORGANIZATION Delaware		
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7.	SOLE VOTING POWER 11,359,679 (1)	
	8.	SHARED VOTING POWER: 0	
	9.	SOLE DISPOSITIVE POWER: 11,359,679 (1)	
	10.	SHARED DISPOSITIVE POWER: 0	
11.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON: 11,359,679 (1)		
12.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES (See Instructions) <input type="checkbox"/>		
13.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) 40.3% (1)(2)		
14.	TYPE OF REPORTING PERSON (See Instructions) IA, PN		

- (1) Includes 27,000 shares of the common stock ("Common Stock") of Neoleukin Therapeutics, Inc. (f/k/a Aquinox Pharmaceuticals, Inc.) (the "Issuer") underlying options directly held by Dr. Kelvin M. Neu, a full-time employee of Baker Bros. Advisors LP (the "Adviser") and 27,000 shares of Common Stock underlying options directly held by Dr. Richard S. Levy, a former Senior Advisor of the Adviser.
- (2) Based on 23,537,368 shares of Common Stock outstanding as of August 1, 2019, as reported in the Issuer's Form 10-Q filed with the Securities and Exchange Commission ("SEC") on August 1, 2019, plus 4,589,787 shares of Common Stock issued to former Neoleukin Therapeutics, Inc. shareholders as reported in the Issuer's Form 8-K filed with the SEC on August 12, 2019.

1.	NAMES OF REPORTING PERSONS Baker Bros. Advisors (GP) LLC		
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input type="checkbox"/>		
3.	SEC USE ONLY		
4.	SOURCE OF FUNDS* OO		
5.	CHECK BOX IF DISCLOSURE OF LEGAL PROCEEDINGS IS REQUIRED PURSUANT TO ITEM 2(d) or 2(e) <input type="checkbox"/>		
6.	CITIZENSHIP OR PLACE OF ORGANIZATION Delaware		
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7.	SOLE VOTING POWER 11,359,679 (1)	
	8.	SHARED VOTING POWER: 0	
	9.	SOLE DISPOSITIVE POWER: 11,359,679 (1)	
	10.	SHARED DISPOSITIVE POWER: 0	
11.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON: 11,359,679 (1)		
12.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES (See Instructions) <input type="checkbox"/>		
13.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) 40.3% (1)(2)		
14.	TYPE OF REPORTING PERSON (See Instructions) HC, OO		

- (1) Includes 27,000 shares of Common Stock of the Issuer underlying options directly held by Dr. Neu, a full-time employee of the Adviser and 27,000 shares of Common Stock underlying options directly held by Dr. Levy, a former Senior Advisor of the Adviser.
- (2) Based on 23,537,368 shares of Common Stock outstanding as of August 1, 2019, as reported in the Issuer's Form 10-Q filed with the SEC on August 1, 2019, plus 4,589,787 shares of Common Stock issued to former Neoleukin Therapeutics, Inc. shareholders as reported in the Issuer's Form 8-K filed with the SEC on August 12, 2019.

1.	NAMES OF REPORTING PERSONS Julian C. Baker		
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input type="checkbox"/>		
3.	SEC USE ONLY		
4.	SOURCE OF FUNDS* OO		
5.	CHECK BOX IF DISCLOSURE OF LEGAL PROCEEDINGS IS REQUIRED PURSUANT TO ITEM 2(d) or 2(e) <input type="checkbox"/>		
6.	CITIZENSHIP OR PLACE OF ORGANIZATION United States		
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7.	SOLE VOTING POWER: 11,361,939 (1)	
	8.	SHARED VOTING POWER: 0	
	9.	SOLE DISPOSITIVE POWER: 11,361,939 (1)	
	10.	SHARED DISPOSITIVE POWER: 0	
11.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON: 11,361,939 (1)		
12.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES (See Instructions) <input type="checkbox"/>		
13.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) 40.3% (1)(2)		
14.	TYPE OF REPORTING PERSON (See Instructions) IN, HC		

- (1) Includes 27,000 shares of Common Stock of the Issuer underlying options directly held by Dr. Neu, a full-time employee of the Adviser and 27,000 shares of Common Stock underlying options directly held by Dr. Levy, a former Senior Advisor of the Adviser.
- (2) Based on 23,537,368 shares of Common Stock outstanding as of August 1, 2019, as reported in the Issuer's Form 10-Q filed with the SEC on August 1, 2019, plus 4,589,787 shares of Common Stock issued to former Neoleukin Therapeutics, Inc. shareholders as reported in the Issuer's Form 8-K filed with the SEC on August 12, 2019.

1.	NAMES OF REPORTING PERSONS Felix J. Baker		
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input type="checkbox"/>		
3.	SEC USE ONLY		
4.	SOURCE OF FUNDS (See Instructions) OO		
5.	CHECK BOX IF DISCLOSURE OF LEGAL PROCEEDINGS IS REQUIRED PURSUANT TO ITEM 2(d) or 2(e) <input type="checkbox"/>		
6.	CITIZENSHIP OR PLACE OF ORGANIZATION United States		
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7.	SOLE VOTING POWER: 11,361,939 (1)	
	8.	SHARED VOTING POWER: 0	
	9.	SOLE DISPOSITIVE POWER: 11,361,939 (1)	
	10.	SHARED DISPOSITIVE POWER: 0	
11.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON: 11,361,939 (1)		
12.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES (See Instructions) <input type="checkbox"/>		
13.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) 40.3% (1)(2)		
14.	TYPE OF REPORTING PERSON (See Instructions) IN, HC		

(1) Includes 27,000 shares of Common Stock of the Issuer underlying options directly held by Dr. Neu, a full-time employee of the Adviser and 27,000 shares of Common Stock underlying options directly held by Dr. Levy, a former Senior Advisor of the Adviser.

(2) Based on 23,537,368 shares of common stock outstanding as of August 1, 2019, as reported in the Issuer's Form 10-Q filed with the SEC on August 1, 2019, plus 4,589,787 shares of Common Stock issued to former Neoleukin Therapeutics, Inc. shareholders as reported in the Issuer's Form 8-K filed with the SEC on August 12, 2019.

Amendment No. 10 to Schedule 13D

This Amendment No. 10 to Schedule 13D amends and supplements the previously filed Schedules 13D filed by Baker Bros. Advisors LP (the “Adviser”), Baker Bros. Advisors (GP) LLC (the “Adviser GP”), Julian C. Baker and Felix J. Baker. Except as supplemented herein, such statements, as heretofore amended and supplemented, remain in full force and effect.

The Adviser GP is the sole general partner of the Adviser. Pursuant to the management agreements, as amended, among the Adviser, Baker Brothers Life Sciences, L.P. (“Life Sciences”) and 667, L.P. (“667”), and together with Life Sciences, the “Funds”) and their respective general partners, the Funds respective general partners relinquished to the Adviser all discretion and authority with respect to the investment and voting power of the securities held by the Funds, and thus the Adviser has complete and unlimited discretion and authority with respect to the Funds’ investments and voting power over investments.

ITEM 1. Security and Issuer

Item 1 of this Schedule 13D is hereby amended and restated in its entirety as follows:

Upon the consummation of the transaction on August 8, 2019, among Aquinox Pharmaceuticals, Inc., Neoleukin Therapeutics, Inc., and Apollo Sub, Inc. (“the Merger Sub”), the Merger Sub merged with and into Neoleukin Therapeutics, Inc. (the “Merger”) with Neoleukin Therapeutics, Inc. surviving the Merger as a wholly-owned subsidiary of Aquinox Pharmaceuticals, Inc. On August 9, 2019, Aquinox Pharmaceuticals, Inc. changed its name to Neoleukin Therapeutics, Inc. The class of equity security to which this statement on Schedule 13D relates is the common stock, par value \$0.000001 per share (the “Common Stock”) of Neoleukin Therapeutics, Inc. (f/k/a Aquinox Pharmaceuticals, Inc.), a corporation organized under the laws of the state of Delaware (the “Issuer”). The address of the principal executive offices of the Issuer is 401 Terry Avenue North, Seattle, Washington 98109. Information given in response to each item shall be deemed incorporated by reference in all other items, as applicable.

Item 4. Purpose of the Transaction.

Item 4 of Schedule 13D is supplemented and superseded, as the case may be, as follows:

On August 8, 2019, pursuant to the close of the Merger, the former holders of Neoleukin Therapeutics, Inc.’s capital stock were issued 4,589,787 shares of Aquinox Pharmaceuticals, Inc. common stock representing approximately 19.5% of Aquinox Pharmaceuticals, Inc.’s issued and outstanding shares of common stock (calculated prior to the issuance of those new shares of common stock) which resulted in the decreases in percentage of beneficial ownership of the Reporting Persons reflected on the cover pages of this Amendment No. 10 and in Item 5 below.

Effective upon the closing of the Merger, Dr. Kelvin M. Neu, a full-time employee of the Adviser, resigned his role on the Issuer’s Board of Directors (the “Board”) and M. Cantey Boyd, an employee of the Adviser, joined the Board.

Ms. Boyd serves on the Board as representatives of the Funds. The policy of the Funds and the Adviser does not permit employees of the Adviser to receive compensation for serving as directors of the Issuer. Therefore, Ms. Boyd will have no pecuniary interest in any options to purchase common stock ("Common Stock") of the Issuer ("Stock Options"), Common Stock, or Common Stock received from the exercise of Stock Options received as directors' compensation. The Funds are instead entitled to the pecuniary interest in the Stock Options, Common Stock and Common Stock received from the exercise of Stock Options received as directors' compensation that she may receive in the future.

The Adviser has voting and investment power over any Stock Options, Common Stock and Common Stock underlying such Stock Options and Common Stock received from the exercise of Stock Options by Dr. Neu and Dr. Levy received as directors' compensation during their period of employment for the Adviser. The Adviser GP, and Felix J. Baker and Julian C. Baker as managing members of the Adviser GP, may be deemed to have the power to vote or direct the vote of and the power to dispose or direct the disposition of any of the Stock Options, Common Stock, Common Stock received from the exercise of Stock Options and Common Stock underlying such Stock Options granted to Dr. Neu and Dr. Levy as directors compensation that they hold or may have received during their period of employment with the Adviser.

The Funds hold securities of the Issuer for investment purposes. The Reporting Persons or their affiliates may purchase or dispose of additional securities of the Issuer or purchase securities in varying amounts and at varying times depending upon the Reporting Persons' continuing assessments of pertinent factors, including the availability of shares of Common Stock or other securities for purchase at particular price levels, the business prospects of the Issuer, other business investment opportunities, economic conditions, stock market conditions, money market conditions, the attitudes and actions of the Board and management of the Issuer, the availability and nature of opportunities to dispose of Common Stock and other plans and requirements of the particular entities. The Reporting Persons may discuss items of mutual interest with the Issuer, which could include items in subparagraphs (a) through (j) of Item 4 of Schedule 13D.

Depending upon their assessments of the above factors, the Reporting Persons or their affiliates may change their present intentions as stated above and may purchase or dispose of additional securities of the Issuer, including shares of Common Stock (by means of open market purchases, privately negotiated purchases, exercise of some or all of the Stock Options, or otherwise) or may, dispose of some or all of the securities of the Issuer, including shares of Common Stock, under their control.

Except as otherwise disclosed herein, at the present time, the Reporting Persons do not have any plans or proposals with respect to any extraordinary corporate transaction involving the Issuer, including, without limitation, those matters described in subparagraphs (a) through (j) of Item 4 of Schedule 13D.

Item 5. Interest in Securities of the Issuer.

Item 5 of this Schedule 13D is hereby amended and restated in its entirety as follows:

(a) and (b) Items 7 through 11 and 13 of each of the cover pages of this Amendment No. 10 are incorporated herein by reference. Set forth below is the aggregate number and percentage of shares of Common Stock directly held, as of the date hereof, by each of the following based upon 23,537,368 shares of Common Stock outstanding as of August 1, 2019, as reported in the Issuer's Form 10-Q filed with the SEC on August 1, 2019, plus 4,589,787 shares of Common Stock issued to former Neoleukin Therapeutics, Inc. shareholders as reported in the Issuer's Form 8-K filed on August 12, 2019. Such percentage figures were calculated in accordance with Rule 13d-3 under the Securities Exchange Act of 1934, as amended.

Holder	Number of Shares of Common Stock we own or have to right to acquire within 60 days	Percent of Class Outstanding
667, L.P.	1,200,520	4.3%
Baker Brothers Life Sciences, L.P.	10,105,159	35.9%
Total	11,305,679	40.2%

As a result of their previous service on the Board, Dr. Neu and Dr. Levy each hold 12,000 Stock Options with an exercise price of \$13.74 per share expiring on May 7, 2027 and 15,000 Stock Options with an exercise price of \$13.10 expiring on May 6, 2028.

The Adviser GP, Felix J. Baker and Julian C. Baker, as managing members of the Adviser GP, and the Adviser may be deemed to be beneficial owners of securities of the Issuer directly held by the Funds.

(c) Except as disclosed in Amendment No. 9 to this Schedule 13D filed on August 7, 2019, none of the Reporting Persons or their affiliates has effected any other transactions in securities of the Issuer during the past 60 days.

(d) Certain securities of the Issuer are held directly by 667, a limited partnership the sole general partner of which is Baker Biotech Capital, L.P., a limited partnership the sole general partner of which is Baker Biotech Capital (GP), LLC. Julian C. Baker and Felix J. Baker are the managing members of Baker Biotech Capital (GP), LLC.

Certain securities of the Issuer are held directly by Life Sciences, a limited partnership the sole general partner of which is Baker Brothers Life Sciences Capital, L.P., a limited partnership the sole general partner of which is Baker Brothers Life Sciences Capital (GP), LLC. Julian C. Baker and Felix J. Baker are the managing members of Baker Brothers Life Sciences Capital (GP), LLC.

(e) Not applicable.

SIGNATURE

After reasonable inquiry and to the best of my knowledge and belief, I certify that the information set forth in this statement is true, complete and correct.

August 13, 2019

BAKER BROS. ADVISORS LP

By: Baker Bros. Advisors (GP) LLC, its general partner

By: /s/ Scott L. Lessing

Name: Scott L. Lessing

Title: President

BAKER BROS. ADVISORS (GP) LLC

By: /s/ Scott L. Lessing

Name: Scott L. Lessing

Title: President

/s/ Julian C. Baker

Julian C. Baker

/s/ Felix J. Baker

Felix J. Baker
