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

**SCHEDULE 13D**  
(Rule 13d-101)

INFORMATION TO BE INCLUDED IN STATEMENTS FILED PURSUANT  
TO § 240.13d-1(a) AND AMENDMENTS THERETO FILED PURSUANT TO  
§ 240.13d-2(a)

(Amendment No. 3)<sup>1</sup>

**Ayala Pharmaceuticals, Inc.**

(Name of Issuer)

Common Stock, par value \$0.001 per share  
(Title of Class of Securities)

007624307  
(CUSIP Number)

I.B.F Management Ltd.  
HaOgen Tower, 4 Oppenheimer St., Rehovot 7670104, Israel  
TEL: 972-722-514175

(Name, Address and Telephone Number of Person  
Authorized to Receive Notices and Communications)

February 5, 2024  
(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 §§ 240.13d-1(e), 240.13d-1(f) or 240.13d-1(g), check the following box .

*Note:* Schedules filed in paper format shall include a signed original and five copies of the schedule, including all exhibits. See § 240.13d-7 for other parties to whom copies are to be sent.

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<sup>1</sup> 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*).

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1	NAME OF REPORTING PERSONS Israel Biotech Fund I, L.P.	
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 Cayman Islands	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7	SOLE VOTING POWER - 0 -
	8	SHARED VOTING POWER 20,661,639 *
	9	SOLE DISPOSITIVE POWER - 0 -
	10	SHARED DISPOSITIVE POWER 20,661,639 *
11	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON 20,661,639 *	
12	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES <input type="checkbox"/>	
13	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) 40.94% **	
14	TYPE OF REPORTING PERSON PN	

\* See Item 5.

\*\* Based on 42,633,400 shares of common stock, par value \$0.001 per share (the "Common Stock") of Ayala Pharmaceuticals, Inc. (the "Issuer") issued and outstanding as of February 7, 2024, according to information received from the Issuer.

1	NAME OF REPORTING PERSONS Israel Biotech Fund II, L.P.	
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 Cayman Islands	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7	SOLE VOTING POWER - 0 -
	8	SHARED VOTING POWER 25,130,903 *
	9	SOLE DISPOSITIVE POWER - 0 -
	10	SHARED DISPOSITIVE POWER 25,130,903 *
11	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON 25,130,903 *	
12	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES <input type="checkbox"/>	
13	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) 44.79%**	
14	TYPE OF REPORTING PERSON PN	

\* See Item 5.

\*\* Based on 42,633,400 shares of Common Stock issued and outstanding as of February 7, 2024, according to information received from the Issuer.

1	NAME OF REPORTING PERSONS Israel Biotech Fund GP Partners, L.P.	
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 Cayman Islands	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7	SOLE VOTING POWER - 0 -
	8	SHARED VOTING POWER 20,661,639 *
	9	SOLE DISPOSITIVE POWER - 0 -
	10	SHARED DISPOSITIVE POWER 20,661,639 *
11	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON 20,661,639 *	
12	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES <input type="checkbox"/>	
13	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) 40.94%**	
14	TYPE OF REPORTING PERSON PN	

\* See Item 5.

\*\* Based on 42,633,400 shares of Common Stock issued and outstanding as of February 7, 2024, according to information received from the Issuer.

1	NAME OF REPORTING PERSONS Israel Biotech Fund GP Partners II, L.P.	
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 Cayman Islands	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7	SOLE VOTING POWER - 0 -
	8	SHARED VOTING POWER 25,130,903 *
	9	SOLE DISPOSITIVE POWER - 0 -
	10	SHARED DISPOSITIVE POWER 25,130,903 *
11	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON 25,130,903 *	
12	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES <input type="checkbox"/>	
13	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) 44.79%**	
14	TYPE OF REPORTING PERSON PN	

\* See Item 5.

\*\* Based on 42,633,400 shares of Common Stock issued and outstanding as of February 7, 2024, according to information received from the Issuer.

1	NAME OF REPORTING PERSONS I.B.F Management Ltd.	
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 Israel	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	7	SOLE VOTING POWER - 0 -
	8	SHARED VOTING POWER 45,792,542 *
	9	SOLE DISPOSITIVE POWER - 0 -
	10	SHARED DISPOSITIVE POWER 45,792,542 *
11	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON 45,792,542 *	
12	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (11) EXCLUDES CERTAIN SHARES <input type="checkbox"/>	
13	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW (11) 71.63%**	
14	TYPE OF REPORTING PERSON CO	

\* See Item 5.

\*\* Based on 42,633,400 shares of Common Stock issued and outstanding as of February 7, 2024, according to information received from the Issuer.

This Amendment No. 3 to Schedule 13D (this "Amendment") amends and supplements the Statement on Schedule 13D initially filed by the Reporting Persons with the Securities and Exchange Commission (the "SEC") on September 11, 2023, as amended on October 31, 2023 and November 21, 2023 (the "Statement") with respect to the shares of common stock, par value \$0.001 per share (the "Common Stock") of Ayala Pharmaceuticals, Inc. (the "Issuer"), a corporation incorporated under the laws of the State of Delaware. *Capitalized terms not defined herein shall have the meaning ascribed thereto in the Statement.*

The following amends and supplements Items 3, 4, 5, 6 and 7 of the Statement.

Item 3. Source and Amount of Funds or Other Consideration.

*Item 3 of the Statement is hereby amended and supplemented to add the following:*

See Item 4, which is incorporated herein by reference.

Item 4. Purpose of Transaction.

*Item 4 of the Statement is hereby amended and supplemented to add the following:*

*Asset Sale.* As described in the Form 8-K filed by the Issuer on February 6, 2024 (the "Form 8-K"), on February 5, 2024, the Issuer and Immunome, Inc., a Delaware corporation ("Immunome"), entered into an Asset Purchase Agreement (the "Purchase Agreement"). The Purchase Agreement provides, among other things, that on the terms and subject to the conditions set forth therein, Immunome will purchase the Acquired Assets in exchange for the Consideration (as such terms are defined in the Purchase Agreement) (the "Asset Sale").

In connection with the Purchase Agreement, certain of the Issuer's officers, directors and stockholders, including each of IBF I, IBF II, Dr. David Sidransky and Dr. Yuval Cabilly, entered into a Support Agreement with the Issuer and Immunome, dated as of February 5, 2024 (the "Immunome Support Agreement"). Pursuant to the Immunome Support Agreement, such stockholders agreed, among other things, (i) to deliver a written consent authorizing, approving and adopting the Purchase Agreement and the transactions contemplated thereby, (ii) vote against any proposal made in opposition to, or in competition with, the Purchase Agreement or the Asset Sale and (iii) vote against any acquisition proposal involving a third party. In addition, each of IBF I and IBF II agreed to deliver (and has delivered) to the Issuer duly executed (i) notices of conversion of the New Notes and the A&R Notes and (ii) notices of exercises in full of the New Notes Warrants and the A&R Notes Warrants.

Following the delivery of the aforesaid notices of conversion and notices of exercise (via net cashless exercise), the Issuer issued to IBF I and IBF II (i) 1,926,221 shares of Common Stock and 4,237,687 shares of Common Stock, respectively, with respect to the aforesaid conversion of the entire amount of principal and interest outstanding under the New Notes, (ii) 3,887,438 shares of Common Stock and 1,295,813 shares of Common Stock, respectively, with respect to the aforesaid conversion of the entire amount of principal and interest outstanding under the A&R Notes, (iii) 1,909,973 shares of Common Stock and 4,201,940 shares of Common Stock, respectively, with respect to the aforesaid exercise of the entire New Notes Warrants (reflecting the 902,527 shares and 1,985,560 shares, respectively, "withheld" in connection with the cashless exercise of such warrants, based on the daily VWAP of the shares of Common Stock of \$1.2465), and (iv) 3,819,946 shares of Common Stock and 1,273,655 shares of Common Stock, respectively, with respect to the aforesaid exercise of the entire A&R Notes Warrants (reflecting the 1,805,054 shares and 601,345 shares, respectively, "withheld" in connection with the cashless exercise of such warrants, based on the daily VWAP of the shares of Common Stock of \$1.2465).

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Item 5. Interest in Securities of the Issuer.

*Items 5(a)-(c) of the Statement are hereby amended by replacing them in their entirety with the following:*

The aggregate percentage of shares reported beneficially owned by each person named herein is based on 42,633,400 shares of Common Stock issued and outstanding as of February 7, 2024, according information received from the Issuer. Beneficial ownership below (i) is determined in accordance with the rules of the SEC, which generally provide that shares of Common Stock relating to convertible securities or warrants convertible or exercisable within 60 days are deemed outstanding for computing the percentage of the person holding such securities but are not deemed outstanding for computing the percentage of any other person, and (ii) does not account for interest and other charges on any of the convertible securities that may, at the option of Issuer, be convertible into shares of Common Stock.

(a), (b)

As of the close of business on February 6, 2024, IBF 1 beneficially owned 20,661,639 shares of Common Stock, representing approximately 40.94% of the outstanding shares of Common Stock. IBF I GP, by virtue of being the general partner of IBF I, may be deemed to beneficially own, and share the power to vote and dispose, such shares. For the sake of clarity, such number of shares of Common Stock include the SAFE Securities and Loan Securities issuable to IBF I under the terms of the SLA.

As of the close of business on February 6, 2024, IBF 2 beneficially owned 25,130,903 shares of Common Stock, representing approximately 44.79% of the outstanding shares of Common Stock. IBF II GP, by virtue of being the general partner of IBF II, may be deemed to beneficially own, and share the power to vote and dispose, such shares. For the sake of clarity, such number of shares of Common Stock include the SAFE Securities and Loan Securities issuable to IBF II under the terms of the SLA.

As of the close of business on February 6, 2024, IBF Management, by virtue of being the management company of each of IBF I GP and IBF II GP, may be deemed to beneficially own 45,792,542 shares of Common Stock, representing approximately 71.63% of the outstanding shares of Common Stock. For the sake of clarity, such number of shares of Common Stock (i) include the SAFE Securities and Loan Securities issuable to IBF I and IBF II under the terms of the SLA and (ii) exclude any securities of the Issuer held by Dr. David Sidransky, Robert Spiegel, M.D. and Murray A. Goldberg, for which the Reporting Persons disclaim any beneficial ownership.

Information provided to the Reporting Persons indicates that none of the persons listed on Schedule A annexed hereto beneficially owned as of February 6, 2024 any shares of Common Stock, except as indicated in Schedule A.

(c) Except as set forth herein, none of the Reporting Persons effected any transactions in the shares of Common Stock in the 60 days preceding February 6, 2024. Information provided to the Reporting Persons indicates that none of the persons listed on Schedule A annexed hereto effected any transactions in the shares of Common Stock in the 60 days preceding February 6, 2024.

Item 6. Contracts, Arrangements, Understandings or Relationships With Respect to Securities of the Issuer.

*Item 6 of the Statement is hereby amended and supplemented to add the following:*

See Item 4, which is incorporated herein by reference.

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Item 7. Material to be Filed as Exhibits.

*Item 7 of the Statement is hereby amended and supplemented to add the following exhibit:*

- 99.15 Form of Immunome Support Agreement (incorporated by reference to Exhibit 10.1 of the Issuer's Form 8-K filed with the SEC on February 6, 2024).
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SIGNATURES

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

Dated: February 12, 2024

Israel Biotech Fund I, L.P.

By: /s/ Yuval Cabilly

Name, Title: Yuval Cabilly, Managing Partner

Israel Biotech Fund II, L.P.

By: /s/ Yuval Cabilly

Name, Title: Yuval Cabilly, Managing Partner

Israel Biotech Fund GP Partners, L.P.

By: /s/ Yuval Cabilly

Name, Title: Yuval Cabilly, General Partner

Israel Biotech Fund GP Partners II, L.P.

By: /s/ Yuval Cabilly

Name, Title: Yuval Cabilly, General Partner

I.B.F Management Ltd.

/s/ Yuval Cabilly

Name, Title: Yuval Cabilly, Chief Executive Officer

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**SCHEDULE A**

**Directors and Officers of IBF Management Ltd.**

**General**

<u>Name and Position</u>	<u>Principal Occupation</u>	<u>Principal Business Address</u>	<u>Citizenship</u>
Yuval Cabilly, Director & CEO	Managing Partner, IBF 1 and IBF 2	c/o IBF Management Ltd., 4 Oppenheimer St. Rehovot Israel	Israel
Aido Zairi, Director	Managing Partner, IBF 1 and IBF 2	c/o IBF Management Ltd., 4 Oppenheimer St. Rehovot Israel	Israel, U.S.
David Sidransky, Director	Managing Partner, IBF 1 and IBF 2	c/o IBF Management Ltd., 4 Oppenheimer St. Rehovot Israel	Israel, U.S.

**Beneficial Ownership of Directors and Officers of IBF Management**

Yuval Cabilly – None

Aido Zairi – None

David Sidransky – 93 shares of Common Stock (of which 46 shares are held by his son) and the following stock options:

<b>Exercise Price</b>	<b>Date Exercisable</b>	<b>Expiration Date</b>	<b>Number of Shares</b>
\$55.23	This option is fully vested and exercisable.	06/09/2031	2,342
\$8.7	This option is fully vested and exercisable.	06/12/2032	2,342
\$16,128	This option is fully vested and exercisable.	05/27/2025	17
\$15,372	This option is fully vested and exercisable.	11/04/2025	42
\$9,252	This option is fully vested and exercisable.	11/03/2026	25
\$3,828	This option is fully vested and exercisable.	11/01/2027	25
\$648	This option is fully vested and exercisable.	11/04/2028	25
\$24.8	This option is fully vested and exercisable.	10/23/2029	125
\$52.8	This option is fully vested and exercisable	05/03/2030	163