

SECURITIES AND EXCHANGE COMMISSION  
Washington, DC 20549

**SCHEDULE 13G**  
(Rule 13d-102)

INFORMATION TO BE INCLUDED IN STATEMENTS FILED PURSUANT  
TO RULES 13d-1(b)(c), AND (d) AND AMENDMENTS THERETO FILED  
PURSUANT TO RULE 13d-2(b)

(Amendment No. 3) \*

**Rigel Pharmaceuticals, Inc.**

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(Name of Issuer)

Common Stock

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(Title of Class of Securities)

766559603

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(CUSIP Number)

December 31, 2009

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(Date of Event which Requires Filing of this Statement)

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

Rule 13d-1(b)

Rule 13d-1(c)

Rule 13d-1(d)

(Page 1 of 13 Pages)

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

The information required in the remainder of this cover page shall not be deemed to be "filed" for the purpose of Section 18 of the Securities Exchange Act of 1934 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 I.R.S. IDENTIFICATION NO. OF ABOVE PERSONS (ENTITIES ONLY)	
	Deerfield Capital, L.P.	
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP*	(a) <input type="checkbox"/> (b) <input checked="" type="checkbox"/>
3.	SEC USE ONLY	
4.	CITIZENSHIP OR PLACE OF ORGANIZATION	
	Delaware	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	5.	SOLE VOTING POWER 0
	6.	SHARED VOTING POWER 1,799,947
	7.	SOLE DISPOSITIVE VOTING POWER 0
	8.	SHARED DISPOSITIVE VOTING POWER 1,799,947
9.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON 1,799,947	
10.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (9) EXCLUDES CERTAIN SHARES* <input type="checkbox"/>	
11.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW 9 3.47%	
12.	TYPE OF REPORTING PERSON* PN	

1.	NAME OF REPORTING PERSONS I.R.S. IDENTIFICATION NO. OF ABOVE PERSONS (ENTITIES ONLY)  Deerfield Partners, L.P.	
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input checked="" type="checkbox"/>	
3.	SEC USE ONLY	
4.	CITIZENSHIP OR PLACE OF ORGANIZATION  Delaware	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	5.	SOLE VOTING POWER  0
	6.	SHARED VOTING POWER  1,455,996
	7.	SOLE DISPOSITIVE VOTING POWER  0
	8.	SHARED DISPOSITIVE VOTING POWER  1,455,996
9.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON  1,455,996	
10.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (9) <input type="checkbox"/> EXCLUDES CERTAIN SHARES*	
11.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW 9  2.81%	
12.	TYPE OF REPORTING PERSON*  PN	

1.	NAME OF REPORTING PERSONS I.R.S. IDENTIFICATION NO. OF ABOVE PERSONS (ENTITIES ONLY)  Deerfield Special Situations Fund, L.P.	
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input checked="" type="checkbox"/>	
3.	SEC USE ONLY	
4.	CITIZENSHIP OR PLACE OF ORGANIZATION  Delaware	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	5.	SOLE VOTING POWER  0
	6.	SHARED VOTING POWER  343,951
	7.	SOLE DISPOSITIVE VOTING POWER  0
	8.	SHARED DISPOSITIVE VOTING POWER  343,951
9.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON  343,951	
10.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (9) <input type="checkbox"/> EXCLUDES CERTAIN SHARES*	
11.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW 9  .66%	
12.	TYPE OF REPORTING PERSON*  PN	

1.	NAME OF REPORTING PERSONS I.R.S. IDENTIFICATION NO. OF ABOVE PERSONS (ENTITIES ONLY)  Deerfield Management Company, L.P.	
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input checked="" type="checkbox"/>	
3.	SEC USE ONLY	
4.	CITIZENSHIP OR PLACE OF ORGANIZATION  New York	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	5.	SOLE VOTING POWER  0
	6.	SHARED VOTING POWER  2,650,053
	7.	SOLE DISPOSITIVE VOTING POWER  0
	8.	SHARED DISPOSITIVE VOTING POWER  2,650,053
9.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON  2,650,053	
10.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (9) EXCLUDES CERTAIN SHARES* <input type="checkbox"/>	
11.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW 9  5.11%	
12.	TYPE OF REPORTING PERSON*  PN	

1.	NAME OF REPORTING PERSONS I.R.S. IDENTIFICATION NO. OF ABOVE PERSONS (ENTITIES ONLY)  Deerfield International Limited	
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input checked="" type="checkbox"/>	
3.	SEC USE ONLY	
4.	CITIZENSHIP OR PLACE OF ORGANIZATION  British Virgin Islands	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	5.	SOLE VOTING POWER  0
	6.	SHARED VOTING POWER  2,044,004
	7.	SOLE DISPOSITIVE VOTING POWER  0
	8.	SHARED DISPOSITIVE VOTING POWER  2,044,004
9.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON  2,044,004	
10.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (9) <input type="checkbox"/> EXCLUDES CERTAIN SHARES*	
11.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW 9  3.94%	
12.	TYPE OF REPORTING PERSON*  CO	

1.	NAME OF REPORTING PERSONS I.R.S. IDENTIFICATION NO. OF ABOVE PERSONS (ENTITIES ONLY)  Deerfield Special Situations Fund International Limited	
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input checked="" type="checkbox"/>	
3.	SEC USE ONLY	
4.	CITIZENSHIP OR PLACE OF ORGANIZATION  British Virgin Islands	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	5.	SOLE VOTING POWER  0
	6.	SHARED VOTING POWER  606,049
	7.	SOLE DISPOSITIVE VOTING POWER  0
	8.	SHARED DISPOSITIVE VOTING POWER  606,049
9.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON  606,049	
10.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (9) <input type="checkbox"/> EXCLUDES CERTAIN SHARES*	
11.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW 9  1.17%	
12.	TYPE OF REPORTING PERSON*  CO	

1.	NAME OF REPORTING PERSONS I.R.S. IDENTIFICATION NO. OF ABOVE PERSONS (ENTITIES ONLY)	
	James E. Flynn	
2.	CHECK THE APPROPRIATE BOX IF A MEMBER OF A GROUP* (a) <input type="checkbox"/> (b) <input checked="" type="checkbox"/>	
3.	SEC USE ONLY	
4.	CITIZENSHIP OR PLACE OF ORGANIZATION	
	United States	
NUMBER OF SHARES BENEFICIALLY OWNED BY EACH REPORTING PERSON WITH	5.	SOLE VOTING POWER 25,000
	6.	SHARED VOTING POWER 4,475,000
	7.	SOLE DISPOSITIVE VOTING POWER 25,000
	8.	SHARED DISPOSITIVE VOTING POWER 4,475,000
9.	AGGREGATE AMOUNT BENEFICIALLY OWNED BY EACH REPORTING PERSON 4,475,000	
10.	CHECK BOX IF THE AGGREGATE AMOUNT IN ROW (9) EXCLUDES CERTAIN SHARES* <input type="checkbox"/>	
11.	PERCENT OF CLASS REPRESENTED BY AMOUNT IN ROW 9 8.64%	
12.	TYPE OF REPORTING PERSON* IN	

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- Item 1(a). Name of Issuer:  
Rigel Pharmaceuticals, Inc.
- Item 1(b). Address of Issuer's Principal Executive Offices:  
1180 Veterans Blvd.  
South San Francisco, CA 94080
- Item 2(a). Name of Person Filing:  
James E. Flynn, Deerfield Capital, L.P., Deerfield Partners, L.P.,  
Deerfield Special Situations Fund, L.P., Deerfield Management  
Company, L.P., Deerfield International Limited, Deerfield Special  
Situations Fund International Limited
- Item 2(b). Address of Principal Business Office, or if None, Residence:  
James E. Flynn, Deerfield Capital, L.P., Deerfield Partners, L.P.  
Deerfield Special Situations Fund, L.P., Deerfield Management  
Company, L.P., 780 Third Avenue, 37th Floor, New York, NY 10017  
Deerfield International Limited, Deerfield Special Situations  
Fund International Limited c/o Bisys Management, Bison Court,  
Columbus Centre, P.O. Box 3460, Road Town, Tortola, British Virgin Islands
- Item 2(c). Citizenship:  
Mr. Flynn - United States citizen  
Deerfield Capital, L.P., Deerfield Partners, L.P. and Deerfield  
Special Situations Fund, L.P. - Delaware limited partnerships  
Deerfield Management Company, L.P. - New York limited partnership  
Deerfield International Limited and Deerfield Special Situations  
Fund International Limited - British Virgin Islands corporations
- Item 2(d). Title of Class of Securities:  
Common Stock
- Item 2(e). CUSIP Number:  
766559603
- Item 3. If This Statement is Filed Pursuant to Rule 13d-1(b), or 13d-2(b) or (c), Check Whether the Person Filing is a:
- (a)  Broker or dealer registered under Section 15 of the Exchange Act.
  - (b)  Bank as defined in Section 3(a)(6) of the Exchange Act.
  - (c)  Insurance company as defined in Section 3(a)(19) of the Exchange Act.
  - (d)  Investment company registered under Section 8 of the Investment Company Act.
  - (e)  An investment adviser in accordance with Rule 13d-1(b)(1)(ii)(E);
  - (f)  An employee benefit plan or endowment fund in accordance with Rule 13d-1(b)(1)(ii)(F);
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- (g)  A parent holding company or control person in accordance with Rule 13d-1(b)(1)(ii)(G);
- (h)  A savings association as defined in Section 3(b) of the Federal Deposit Insurance Act;
- (i)  A church plan that is excluded from the definition of an investment company under Section 3(c)(14) of the Investment Company Act;
- (j)  Group, in accordance with Rule 13d-1(b)(1)(ii)(J).

Item 4. Ownership.

Provide the following information regarding the aggregate number and percentage of the class of securities of the issuer identified in Item 1.

- (a) Amount beneficially owned:
- Deerfield Capital, L.P. – 1,799,947 shares  
 Deerfield Partners, L.P. – 1,455,996 shares  
 Deerfield Special Situations Fund, L.P. – 343,951 shares  
 Deerfield Management Company, L.P. – 2,650,053 shares  
 Deerfield International Limited – 2,044,004 shares  
 Deerfield Special Situations Fund International Limited – 606,049 shares  
 James E. Flynn – 4,475,000 shares
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- (b) Percent of class:
- Deerfield Capital, L.P. - 3.47%  
 Deerfield Partners, L.P. – 2.81%  
 Deerfield Special Situations Fund, L.P. - .66%  
 Deerfield Management Company, L.P. – 5.11%  
 Deerfield International Limited – 3.94%  
 Deerfield Special Situations Fund International Limited – 1.17%  
 James E. Flynn – 8.64%
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- (c) Number of shares as to which such person has:
- |   |  |
|---|--|
| (i) Sole power to vote or to direct the vote    | James E. Flynn – 25,000<br>All Other Reporting Persons - 0   |
| (ii) Shared power to vote or to direct the vote | Deerfield Capital,<br>L.P. – 1,799,947<br>Deerfield Partners,<br>L.P. – 1,455,996<br>Deerfield Special<br>Situations Fund,<br>L.P. - 343,951<br>Deerfield<br>Management Company,<br>L.P. - 2,650,053<br>Deerfield<br>International<br>Limited - 2,044,004<br>Deerfield Special<br>Situations Fund<br>International<br>Limited - 606,049<br>James E. Flynn -<br>4,475,000 |
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- (iii) Sole power to dispose or to direct the disposition of
- (iv) Shared power to dispose or to direct the disposition of

James E. Flynn – 25,000  
 All Other Reporting Persons - 0  
 Deerfield Capital,  
 L.P. – 1,799,947  
 Deerfield Partners,  
 L.P. – 1,455,996  
 Deerfield Special  
 Situations Fund,  
 L.P. - 343,951  
 Deerfield  
 Management Company,  
 L.P. - 2,650,053  
 Deerfield  
 International  
 Limited - 2,044,004  
 Deerfield Special  
 Situations Fund  
 International  
 Limited - 606,049  
 James E. Flynn -  
 4,475,000

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Item 5. Ownership of Five Percent or Less of a Class.

If this statement is being filed to report the fact that as of the date hereof the reporting person has ceased to be the beneficial owner of more than five percent of the class of securities check the following .

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N/A

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Item 6. Ownership of More Than Five Percent on Behalf of Another Person.

If any other person is known to have the right to receive or the power to direct the receipt of dividends from, or the proceeds from the sale of, such securities, a statement to that effect should be included in response to this item and, if such interest relates to more than five percent of the class, such person should be identified. A listing of the shareholders of an investment company registered under the Investment Company Act of 1940 or the beneficiaries of employee benefit plan, pension fund or endowment fund is not required.

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N/A

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Item 7. Identification and Classification of the Subsidiary Which Acquired the Security Being Reported on by the Parent Holding Company or Control Person.

If a parent holding company or Control person has filed this schedule, pursuant to Rule 13d-1(b)(1)(ii)(G), so indicate under Item 3(g) and attach an exhibit stating the identity and the Item 3 classification of the relevant subsidiary. If a parent holding company or control person has filed this schedule pursuant to Rule 13d-1(c) or Rule 13d-1(d), attach an exhibit stating the identification of the relevant subsidiary.

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N/A

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

If a group has filed this schedule pursuant to ss.240.13d-1(b)(1)(ii)(J), so indicate under Item 3(j) and attach an exhibit stating the identity and Item 3 classification of each member of the group. If a group has filed this schedule pursuant to ss.240.13d-1(c) or ss.240.13d-1(d), attach an exhibit stating the identity of each member of the group.

See Exhibit B

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## Item 9. Notice of Dissolution of Group.

Notice of dissolution of a group may be furnished as an exhibit stating the date of the dissolution and that all further filings with respect to transactions in the security reported on will be filed, if required, by members of the group, in their individual capacity. See Item 5.

N/A

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## Item 10. Certifications.

"By signing below I certify that, to the best of my knowledge and belief, the securities referred to above were not acquired and are not held for the purpose of or with the effect of changing or influencing the control of the issuer of the securities and were not acquired and are not held in connection with or as a participant in any transaction having such purpose or effect."

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## 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.

## DEERFIELD CAPITAL, L.P.

By: J.E. Flynn Capital LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

## DEERFIELD PARTNERS, L.P.

By: Deerfield Capital, L.P.

By: J.E. Flynn Capital LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

## DEERFIELD SPECIAL SITUATIONS FUND, L.P.

By: Deerfield Capital, L.P.

By: J.E. Flynn Capital LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

## DEERFIELD MANAGEMENT COMPANY, L.P.

By: Flynn Management LLC  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

## DEERFIELD INTERNATIONAL LIMITED

By: Deerfield Management Company

By: Flynn Management LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

## DEERFIELD SPECIAL SITUATIONS FUND INTERNATIONAL LIMITED

By: Deerfield Management Company

By: Flynn Management LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

## JAMES E. FLYNN

/s/ Darren Levine  
Darren Levine, Attorney-In-Fact

Date: February 12, 2010

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Exhibit List

Exhibit A. Joint Filing Agreement.

Exhibit B. Item 8 Statement.

Exhibit C.(1) Power of Attorney.

(1) Previously filed as Exhibit 24 to a Form 4 with regard to PAR Pharmaceutical Companies, Inc. filed with the Commission on February 1, 2007 by Deerfield Capital L.P.; Deerfield Partners, L.P.; Deerfield Management Company, L.P.; Deerfield International Limited; Deerfield Special Situations Fund, L.P.; Deerfield Special Situations Fund International Limited; and James E. Flynn.

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Exhibit A

Agreement

The undersigned agree that this Schedule 13G, and all amendments thereto, relating to the Common Stock of Rigel Pharmaceuticals, Inc. shall be filed on behalf of the undersigned.

DEERFIELD CAPITAL, L.P.

By: J.E. Flynn Capital LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

DEERFIELD PARTNERS, L.P.

By: Deerfield Capital, L.P.

By: J.E. Flynn Capital LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

DEERFIELD SPECIAL SITUATIONS FUND, L.P.

By: Deerfield Capital, L.P.

By: J.E. Flynn Capital LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

DEERFIELD MANAGEMENT COMPANY, L.P.

By: Flynn Management LLC  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

DEERFIELD INTERNATIONAL LIMITED

By: Deerfield Management Company

By: Flynn Management LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

DEERFIELD SPECIAL SITUATIONS FUND INTERNATIONAL LIMITED

By: Deerfield Management Company

By: Flynn Management LLC,  
General Partner

By: /s/ Darren Levine  
Darren Levine, Attorney-In-Fact

JAMES E. FLYNN

/s/ Darren Levine  
Darren Levine, Attorney-In-Fact

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Exhibit B

Due to the relationships between them, the reporting persons hereunder may be deemed to constitute a "group" with one another for purposes of Section 13(d)(3) of the Securities Exchange Act of 1934.