W R GRACE & CO Form SC 13G January 31, 2013

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

SCHEDULE 13G

Under the Securities Exchange Act of 1934 (Amendment No.)*

W.R. Grace & Co. (Name of Issuer)

Common Stock, \$.01 par value (Title of Class of Securities)

38388F108 (CUSIP Number)

December 31, 2012 (Date of Event which Requires Filing of this Statement)

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

| [| X |] Rule 13d-1(b) |
|---|---|-----------------|
| [| |] Rule 13d-1(c) |
| ſ | |] Rule 13d-1(d) |

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).

^{*} 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.

SCHEDULE 13G CUSIP No. 38388F108

| | 1. | Names of Reporting Persons. | | | |
|---|---|--------------------------------------|---|--|--|
| | Iridian Asset Management LLC I.R.S. Identification Nos. of above persons (entities only). | | | | |
| Number of Shares Beneficially Owned by Each Reporting Person With: | 2. | | Check the Appropriate Box if a Member of a Group (See Instructions) (a) [X] (b) [] | | |
| | 3. | SEC USE ONLY | SEC USE ONLY | | |
| | 4. | Citizenship or Plac Delaware | Citizenship or Place of Organization Delaware | | |
| | | 5. | Sole Voting Power 0 | | |
| | | 6. | Shared Voting Power 4,515,563 | | |
| | g | 7. | Sole Dispositive Power 0 | | |
| | | 8. | Shared Dispositive Power 4,515,563 | | |
| | 9. | Aggregate Amount 4,515,563 | Aggregate Amount Beneficially Owned by Each Reporting Person 4,515,563 | | |
| | 10. | Check if the Aggre Instructions) [] | Check if the Aggregate Amount in Row (9) Excludes Certain Shares (See Instructions) [] | | |
| | 11. | Percent of Class Ro | Percent of Class Represented by Amount in Row (9) 6.0% | | |
| | 12. | Type of Reporting IA | Type of Reporting Person IA | | |
| | | | 2 | | |

SCHEDULE 13G CUSIP No. 38388F108

Edgar Filing: W R GRACE & CO - Form SC 13G 1. Names of Reporting Persons. David L. Cohen I.R.S. Identification Nos. of above persons (entities only). 2. Check the Appropriate Box if a Member of a Group (See Instructions) (a) [X] (b) [] 3. SEC USE ONLY 4. Citizenship or Place of Organization **United States** 5. Sole Voting Power 6. **Shared Voting Power** 4,515,563 7. Sole Dispositive Power Each Reporting 8. Shared Dispositive Power 4,515,563 9. Aggregate Amount Beneficially Owned by Each Reporting Person 4,515,563 10. Check if the Aggregate Amount in Row (9) Excludes Certain Shares (See Instructions) [] 11. Percent of Class Represented by Amount in Row (9) 6.0%

12. Type of Reporting Person

IN

Number of

Beneficially Owned by

Person With:

Shares

3

SCHEDULE 13G CUSIP No. 38388F108

1. Names of Reporting Persons.

Harold J. Levy

I.R.S. Identification Nos. of above persons (entities only).

2. Check the Appropriate Box if a Member of a Group (See Instructions)

| | (a) [X] (b) [] | | | |
|---|-----------------|---|------------------------------------|--|
| | 3. | SEC USE ONLY | | |
| | 4. | Citizenship or Place of Organization United States | | |
| | | 5. | Sole Voting Power 0 | |
| Number of Shares Beneficially Owned by Each Reporting Person With: | | 6. | Shared Voting Power 4,515,563 | |
| | g | 7. | Sole Dispositive Power 0 | |
| | | 8. | Shared Dispositive Power 4,515,563 | |
| | 9. | Aggregate Amount Beneficially Owned by Each Reporting Person 4,515,563 | | |
| | 10. | Check if the Aggregate Amount in Row (9) Excludes Certain Shares (See Instructions) [] | | |
| | 11. | Percent of Class Represented by Amount in Row (9) 6.0% | | |
| | 12. | Type of Reporting Person IN | | |
| | | 4 | | |
| | | | | |
| Item 1. | (a) | Name of Issuer | | |
| | | W.R. Grace & Co. | | |
| | (b) | Address of Issuer's Principal Executive Offices 7500 Grace Drive, Columbia, MD 21044 | | |
| Item 2. | (a) | Name of Person Filing This Statement is being filed by and on behalf of Iridian Asset Management LLC ("Iridian"), David L. Cohen ("Cohen") and Harold J. Levy ("Levy") (collectively, the "Reporting Persons"). | | |

Iridian is majority owned by Arovid Associates LLC, a Delaware limited liability company owned and controlled by the following: 12.5% by Cohen, 12.5% by Levy, 37.5% by LLMD LLC, a Delaware limited liability company, and 37.5% by ALHERO LLC, a Delaware limited liability company. LLMD LLC is owned 1% by Cohen, and 99% by a family trust controlled by Cohen. ALHERO LLC is owned 1% by Levy and 99% by a family trust controlled by Levy.

(b) Address of Principal Business Office or, if none, Residence The principal business address of the Reporting Persons is 276 Post Road West, Westport, CT 06880-4704. Citizenship or Place of Organization (c) Iridian is a Delaware limited liability company. Cohen and Levy are US citizens. Title of Class of Securities (d) Common Stock, \$.01 par value. (e) **CUSIP** Number 38388F108 If this statement is filed pursuant to §§240.13d-1(b) or 240.13d-2(b) or (c), check whether the person filing is a: (a) Broker or dealer registered under section 15 of the Act (15 U.S.C. 780). (b) [] Bank as defined in section 3(a)(6) of the Act (15 U.S.C. 78c). [] Insurance company as defined in section 3(a)(19) of the (c) Act (15 U.S.C. 78c). [] Investment company registered under section 8 of the (d) Investment Company Act of 1940 (15 U.S.C 80a-8). An investment adviser in accordance with [] (e) §240.13d-1(b)(1)(ii)(E); [] An employee benefit plan or endowment fund in (f) accordance with §240.13d-1(b)(1)(ii)(F); A parent holding company or control person in accordance [] (g) with $\S 240.13d-1(b)(1)(ii)(G)$; A savings associations as defined in Section 3(b) of the (h) [] Federal Deposit Insurance Act (12 U.S.C. 1813); A church plan that is excluded from the definition of an (i) [] investment company under section 3(c)(14) of the Investment Company Act of 1940 (15 U.S.C. 80a-3); Group, in accordance with §240.13d-1(b)(1)(ii)(J). (j) [x]

Item 4. Ownership.

Item 3.

(a) and (b) Amount beneficially owned and Percent of Class:

As of the date of this Statement, the Reporting Persons beneficially owned in the aggregate 4,515,563 shares of Common Stock which equates to approximately 6.0% of the outstanding shares (the percentage of shares of Common Stock owned being based upon 75,313,364 shares of Common Stock outstanding at October 31, 2012 as set forth in the Issuer's Quarterly Report on Form 10-Q for the quarter ended September 30, 2012).

Iridian has direct beneficial ownership of the shares of Common Stock in the accounts for which it serves as the investment adviser under its investment management agreements.

Messrs. Cohen and Levy may be deemed to possess beneficial ownership of the shares of Common Stock beneficially owned by Iridian by virtue of their indirect controlling ownership of Iridian, and having the power to vote and direct the disposition of shares of Common Stock as joint Chief Investment Officers of Iridian. Messrs. Cohen and Levy disclaim beneficial ownership of such shares.

As used herein, "beneficial ownership" has the meaning set forth in Rule 13d-3 under the Securities Exchange Act of 1934, as amended.

(c) Power to vote or dispose.

> Iridian has the direct power to vote or direct the vote, and the direct power to dispose or direct the disposition, of 4,515,563 shares of Common Stock. Cohen and Levy may be deemed to share with Iridian the power to vote or direct the vote and to dispose or direct the disposition of such shares.

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 []. Not Applicable.

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

Not Applicable

Item 7. Identification and Classification of the Subsidiary Which Acquired the Security Being

Reported on By the Parent Holding Company

Not Applicable.

Item 8. Identification and Classification of Members of the Group

Iridian is an investment adviser registered under Section 203 of the Investment Advisers Act of 1940, and its principal business is managing a number of accounts containing securities over which Iridian has voting and dispositive power. Each of Messrs. Cohen and Levy has a controlling interest in Iridian, and serves as Co-Chief Executive Officer and Co-Chief Investment Officer of Iridian.

Item 9. Notice of Dissolution of Group

Not Applicable

Certification Item 10.

By signing below the undersigned certifies that, to the best of its or his knowledge and belief, the securities referred to above were acquired and are held in the ordinary course of business and were not acquired and are not held for the purpose of and do not have 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.

SIGNATURE

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

| Date: January 31, 2013 | IRIDIAN ASSET | MANAGEMENT LLC | |
|------------------------|--------------------------|------------------------|--------------------------|
| | By: | /s/ Jeffrey M. Elliott | |
| | Title: | Jeffrey M. Elliott | Executive Vice President |
| | David L. Cohen | | |
| | By: | /s/ Jeffrey M. Elliott | |
| | Title: Harold J. Levy | Jeffrey M. Elliott | Agent |
| | Ву: | /s/ Jeffrey M. Elliott | |

Title:

Jeffrey M. Elliott

Agent