



DIVISION OF
CORPORATION FINANCE

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

July 21, 2011

C. Brig Miller
Vice President and Chief Accounting Officer
Core Laboratories N.V.
Herengracht 424
1017 BZ Amsterdam
The Netherlands

**Re: Core Laboratories N.V.
Form 10-K for Fiscal Year Ended December 31, 2010
Filed February 22, 2011
Form 8-K
Filed April 19, 2011
File No.: 1-14273**

Dear Mr. Miller:

We have reviewed your filings and have the following comments. In some of our comments, we may ask you to provide us with information so we may better understand your disclosure.

Please respond to this letter within ten business days by amending your filing(s), by providing the requested information, or by advising us when you will provide the requested response. If you do not believe our comments apply to your facts and circumstances or do not believe an amendment is appropriate, please tell us why in your response.

After reviewing any amendment to your filing(s) and the information you provide in response to these comments, we may have additional comments.

Form 10-K for Fiscal Year Ended December 31, 2010

Risk Factors, page 7

1. The introductory paragraph states that you do not list all risk factors and that the risk factors merely "include" those listed below. Please eliminate any text which suggests that you do not include in this section all the known, material risks.

We are subject to a variety of environmental laws and regulations, page 9

2. We note that you supply certain chemicals used in hydraulic fracturing operations. Please tell us, with a view for disclosure, whether there have been any incidents,

citations, or suits related to your fracking operations for environmental concerns, and if so, what your response has been.

3. In regard to your involvement in hydraulic fracturing, please also tell us what steps you, or your customers, have taken to minimize any potential environmental impact. For example, and without limitation, please explain if you:
 - have steps in place to ensure that the drilling, casing, and cementing adhere to known best practices;
 - monitor the rate and pressure of the fracturing treatment in real time for any abrupt change in rate or pressure;
 - evaluate the environmental impact of additives to the fracturing fluid; and
 - minimize the use of water and/or dispose of it in a way that minimizes the impact to nearby surface water.
4. Please provide us a report detailing all chemicals used in your hydraulic fracturing fluid formulation/mixture, in the volume/concentration and total amounts utilized, for representative wells in each of the major resource plays for which you supply fluid.
5. In light of the public concern over the risks relating to hydraulic fracturing, please review your disclosure to ensure that you have disclosed all material information regarding your potential liability. This would include, for example, your potential liability in connection with any environmental contamination related to fracturing operations in which you or your customers are involved. For example, and without limitation, please address the following with respect to your hydraulic fracturing operations:
 - disclose the applicable policy limits and deductibles related to your insurance coverage;
 - disclose your related indemnification obligations and those of the third parties who use your products or services when performing hydraulic fracturing operations, if applicable;
 - clarify your insurance coverage with respect to any liability related to any resulting negative environmental effects; and
 - provide further detail on the risks for which you are insured for your customers' hydraulic fracturing operations.
6. In this regard, discuss what remediation plans or procedures are in place to deal with the environmental impact that would occur in the event of a spill or leak from the hydraulic fracturing operations in which you or your customers are involved.

Management's Discussion and Analysis of Financial Condition and Results of Operation,
page 15

Results of Operations, page 20

7. In this section, you sometimes refer to two or more primary drivers that contributed to a material change. For example, you state that the increase in product sale revenues from 2009 to 2010 "was driven by (1) the acceptance and demand of [your] specialized completion products introduced over the last three years, (2) an increased market share in North American natural gas and oil shale reservoirs and (3) an increased market penetration in the Middle East and Asia-Pacific perforating markets." Please quantify the amount of the change that was contributed by each of the primary drivers. See Section III.D of SEC Release 33-6835 (May 18, 1989).

Financial Statements

Note 2: Summary of Significant Accounting Policies, page F-7

Accounts Receivable / Inventories, page F-8

8. We note from your revenue recognition policy that you earn revenue from long-term contracts that are rendered in proportion to the work performed. Please tell us how you have considered the disclosure requirements of Rules 5-02(3)(c) and 5-02(6)(a)(2) of Regulation S-X. Note that contracts of a duration under 12 months may also be included in the accounts receivable disclosure, as provided by Rule 5-02(6)(d).

Revenue Recognition, page F-10

9. Please provide us, and in your disclosure, more specificity as to how progress to completion is measured, as it relates to your long term contracts. Refer to ASC 605-35-25-51 through 25-53, 25-79 through 25-81, and 50-2, for guidance.
10. We note throughout your filing you identify the types of services and products that you provide. We also note that you recognize revenue under a number of different methods. Please tell us how you have considered providing examples of your significant products and services for each method in which you recognize revenue.
11. We note that you recognize revenue for consulting services as the services are performed. Please clarify for us, with a view towards disclosure in future filings, how you bill these consulting services (e.g. hourly, fixed price, or performance measures).
12. We note that you recognize revenue for consulting services as the services are performed. You indicate at the beginning of your policy that revenues for services are generally recognized when completed. Please clarify which services are recognized upon completion, and which consulting services are recognized as performed.

Note 15: Segment Reporting, page F-25

13. Your website displays nine divisions that comprise your company and it is not clear whether these divisions constitute operating segments that have been aggregated under ASC 280-10-50-11. (ASC 280-10-50-21 requires disclosure when operating segments have been aggregated.) As it relates to the divisions, we note that at least three of them, Owens Oil Tools, Saybolt, and Integrated Reservoir Solutions, are led by an executive who is also part of “senior operations management.” If the members of senior operations management report to your entity’s chief operating decision maker, it may be an indication that the divisions are operating segments. Accordingly, please clarify for us the number of operating segments that you have identified under ASC 280-10-50-1 and ASC 280-10-50-3 through 50-9. If less than nine operating segments have been identified, provide us an analysis that explains the basis for your determination. In addition, provide us an analysis that supports aggregation if operating segments are being aggregated. As part of your response, please provide us a copy of the 2010 operating results reviewed by your chief operating decision maker to make decisions about resources to be allocated and assess performance.
14. Please provide us a comprehensive analysis of your products and services as it relates to the requirement to disclose the revenue attributable to each product and service, or each group of similar products and services, as provided by ASC 280-10-50-40.

Form 8-K

15. We note from your press release included as an exhibit to your 8-K that you referenced free cash flow per share. Please tell us how you considered Accounting Series Release No. 142, Regulation G, and our Non-GAAP Financial Measures C&DIs, located at <http://www.sec.gov/divisions/corpfin/guidance/nongaapinterp.htm>, with respect to the inclusion of this measure in your document. Similar concerns would apply to the use of free cash flow per share in earnings conference calls.

We urge all persons who are responsible for the accuracy and adequacy of the disclosure in the filings to be certain that the filings include the information the Securities Exchange Act of 1934 and all applicable Exchange Act rules require. Since the company and its management are in possession of all facts relating to a company’s disclosure, they are responsible for the accuracy and adequacy of the disclosures they have made.

In responding to our comments, please provide a written statement from the company acknowledging that:

- the company is responsible for the adequacy and accuracy of the disclosure in the filings;
- staff comments or changes to disclosure in response to staff comments do not foreclose the Commission from taking any action with respect to the filings; and

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- the company may not assert staff comments as a defense in any proceeding initiated by the Commission or any person under the federal securities laws of the United States.

You may contact Michael Fay at 202-551-3812 or Mark Shannon at 202-551-3299 if you have questions regarding comments on the financial statements and related matters. You may contact Parker Morrill at 202-551-3696 or Timothy Levenberg at 202-551-3707 if you have questions regarding other comments. Please contact me with any other questions at 202-551-3745.

Sincerely,

/s/ H. Roger Schwall

H. Roger Schwall
Assistant Director