

UNITED STATES SECURITIES AND EXCHANGE COMMISSION WASHINGTON, D.C. 20549-7010

November 30, 2007

Hector Medina
Executive VP of Planning and Finance
CEMEX, S.A.B. de C.V.
Av. Ricardo Margain Zozaya #325
Colonia Valle del Campestre
Garza Garcia, Nuevo Leon, Mexico 66265

Re: CEMEX, S.A.B. de C.V.

Form 20-F for the Fiscal Year Ended December 31, 2006

Filed June 29, 2007 File No. 1-14946

Dear Mr. Medina:

We have limited our review of your filing to those issues we have addressed in our comments. Please understand that the purpose of our review process is to assist you in your compliance with the applicable disclosure requirements and to enhance the overall disclosure in your filing. We look forward to working with you in these respects. We welcome any questions you may have about our comments or any other aspect of our review. Feel free to call us at the telephone numbers listed at the end of this letter.

Compensation of Our Directors and Members of Our Senior Management, page 129

1. Supplementally advise whether you have disclosed or are required to disclose the individual annual compensation for your named senior management under Mexican law. See Item 6.B of Form 20-F.

Disclosure Controls and Procedures, page 153

2. We note that Hector Medina, the Executive Vice President of Planning and Finance, has evaluated your disclosure controls and procedures, and signed the Section 302 certification as principal financial officer; however, you state on page 124 that Rodrigo Trevino is the chief financial officer. Please tell us whether Mr. Medina and Mr. Trevino are principal financial officers. If Mr. Trevino is also a principal financial officer, he should also evaluate the effectiveness of your disclosure controls and procedures and sign a Section 302 certification. Note that Rule 13a-14(a) requires that each principal executive and financial officer must provide the certification.

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Please respond to these comments within 10 business days or tell us when you will provide us with a response.

We urge all persons who are responsible for the accuracy and adequacy of the disclosure in the filing to be certain that the filing includes all information required under the Securities Exchange Act of 1934 and that they have provided all information investors require for an informed investment decision. 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 connection with responding to our comments, please provide, in writing, a statement from the company acknowledging that:

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

In addition, please be advised that the Division of Enforcement has access to all information you provide to the staff of the Division of Corporation Finance in our review of your filing or in response to our comments on your filing.

You may contact Brigitte Lippmann at (202) 551-3713 or me at (202) 551-3760 if you have any questions.

Sincerely,

Pamela A. Long Assistant Director