

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

FORM 6-K

**REPORT OF FOREIGN PRIVATE ISSUER PURSUANT TO RULE 13a-16 or 15d-16
UNDER THE SECURITIES EXCHANGE ACT OF 1934**

For the month of September, 2012

Commission File Number: 001-14946

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

(Translation of Registrant's name into English)

Avenida Ricardo Margáin Zozaya #325, Colonia Valle del Campestre

Garza García, Nuevo León, México 66265

(Address of principal executive office)

Indicate by check mark whether the registrant files or will file annual reports under cover Form 20-F or Form 40-F.

Form 20-F Form 40-F

Indicate by check mark if the registrant is submitting the Form 6-K in paper as permitted by Regulation S-T Rule 101(b)(1):

Indicate by check mark if the registrant is submitting the Form 6-K in paper as permitted by Regulation S-T Rule 101(b)(7):

Contents

1. Press release, dated September 17, 2012, announcing successful completion of CEMEX, S.A.B. de C.V.'s (NYSE:CX) refinancing.
-

SIGNATURE

Pursuant to the requirements of the Securities Exchange Act of 1934, CEMEX, S.A.B. de C.V. has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized.

CEMEX, S.A.B. de C.V.
(Registrant)

Date: September 17, 2012

By: /s/ Rafael Garza
Name: Rafael Garza
Title: Chief Comptroller

EXHIBIT INDEX

EXHIBIT NO.

DESCRIPTION

1. Press release, dated September 17, 2012, announcing successful completion of CEMEX, S.A.B. de C.V.'s (NYSE:CMX) refinancing.

Media Relations
Jorge Pérez
+52 (81) 8888-4334
mr@cemex.com

Investor Relations
Eduardo Rendón
+52 (81) 8888-4256
ir@cemex.com

Analyst Relations
Luis Garza
+52 (81) 8888-4136
ir@cemex.com



CEMEX ANNOUNCES SUCCESSFUL COMPLETION OF REFINANCING

MONTERREY, MEXICO, SEPTEMBER 17, 2012 – CEMEX, S.A.B. de C.V. (“CEMEX”) (NYSE: CX) announced today that it has successfully completed the previously announced refinancing of its Financing Agreement, dated as of August 14, 2009, as amended.

Fernando Gonzalez, Executive Vice President of Finance and Administration of CEMEX, stated “CEMEX is pleased to have accomplished this significant milestone, with support from over 55 banks and institutions. We intend to continue to proactively address our maturities and work towards reducing our leverage and strengthening our capital structure.”

Pursuant to the refinancing, participating creditors representing approximately 92.7% of the aggregate principal amount outstanding under the existing Financing Agreement agreed to extinguish their existing loans and private placement notes and to receive in place thereof:

- approximately U.S.\$6.155 billion in aggregate principal amount of new loans and new U.S. Dollar private placement notes issued pursuant to a New Facilities Agreement and a New Note Purchase Agreement, both dated as of September 17, 2012; and
- U.S.\$500 million of new 9.5% senior secured notes due 2018, issued pursuant to an indenture dated as of September 17, 2012, which notes are expected to be delivered by the exchange agent to recipients today.

As a result of the refinancing, the New Facilities Agreement, with a final maturity of February 14, 2017, the principal terms of which were previously announced in CEMEX’s press release dated June 29, 2012, has become effective today. Also, approximately U.S.\$525 million aggregate principal amount of loans and U.S. Dollar private placement notes remain outstanding under the original Financing Agreement, as amended and restated pursuant to the terms of the exchange offer, and the Note Purchase Agreement, each with a final maturity of February 14, 2014.

This transaction includes an offering of securities that was conducted pursuant to Section 4(2) of the U.S. Securities Act of 1933, as amended (the “Securities Act”), and applicable exemptions under the laws of foreign jurisdictions. Participation in this transaction was limited: (a) in the United States, to persons who are “qualified institutional buyers” (as defined in Rule 144A under the Securities Act) or institutional “accredited investors” as that term is defined in Rule 501(a)(1), (2), (3) or (7) under the Securities Act, and (b) outside the United States, to persons other than “U.S. persons” (as defined in Regulation S under the Securities Act) in reliance upon Regulation S under the Securities Act and who are “qualified investors” (within the meaning given at Article 2 of Directive 2003/71/EC (the Prospectus Directive)) or hold an equivalent status under applicable local laws and regulations. The securities offered have not been and will not be registered under the Securities Act and may not be offered or sold in the United States absent an applicable exemption from registration requirements. This press release does not constitute an offer to sell

or the solicitation of an offer to buy securities, nor shall there be any sale of securities, in any jurisdiction in which such an offer, solicitation or sale would be unlawful.

THERE WILL NOT BE A REGISTRATION WITH THE NATIONAL SECURITIES REGISTRY (REGISTRO NACIONAL DE VALORES) MAINTAINED BY THE MEXICAN NATIONAL BANKING AND SECURITIES COMMISSION (COMISIÓN NACIONAL BANCARIA Y DE VALORES, OR CNBV), AND NO PUBLIC OFFERING OR BROKERAGE ACTIVITIES MAY BE CONDUCTED IN MEXICO, EXCEPT PURSUANT TO A PRIVATE PLACEMENT EXEMPTION SET FORTH UNDER ARTICLE 8 OF THE MEXICAN SECURITIES MARKET LAW (LEY DEL MERCADO DE VALORES), TO MEXICAN INSTITUTIONAL AND QUALIFIED INVESTORS. WE WOULD NOTIFY THE CNBV OF THIS TRANSACTION, INCLUDING ITS PRINCIPAL CHARACTERISTICS. SUCH NOTICE WILL BE DELIVERED TO THE CNBV FOR INFORMATION PURPOSES ONLY, AND THE DELIVERY TO AND THE RECEIPT BY THE CNBV OF SUCH NOTICE DOES NOT CONSTITUTE OR IMPLY ANY CERTIFICATION AS TO INVESTMENT QUALITY OR OF OUR SOLVENCY. THE INFORMATION CONTAINED IS THE EXCLUSIVE RESPONSIBILITY OF CEMEX AND HAS NOT BEEN REVIEWED OR AUTHORIZED BY THE CNBV.

###

This press release contains forward-looking statements and information that are necessarily subject to risks, uncertainties, and assumptions. These risks, uncertainties, and assumptions are more fully described in our Annual Report on Form 20-F for the year ended December 31, 2011, as filed with the U.S. Securities and Exchange Commission.