Ternium S.A. Form 6-K March 20, 2012

FORM 6 - K

SECURITIES AND EXCHANGE COMMISSION Washington, D.C. 20549

Report of Foreign Private Issuer Pursuant to Rule 13a - 16 or 15d - 16 of the Securities Exchange Act of 1934

As of 3/20/2012

Ternium S.A. (Translation of Registrant's name into English)

Ternium S.A. 29, avenue de la Porte-Neuve, L-2227, Luxembourg (352) 4661-11-3815 (Address of principal executive offices)

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

Form 20-F ü Form 40-F___

Indicate by check mark whether the registrant by furnishing the information contained in this Form is also thereby furnishing the information to the Commission pursuant to Rule 12G3-2(b) under the Securities Exchange Act of 1934.

Yes No ü

If "Yes" is marked, indicate below the file number assigned to the registrant in connection with Rule 12g3-2(b): Not applicable The attached material is being furnished to the Securities and Exchange Commission pursuant to Rule 13a-16 and Form 6-K under the Securities Exchange Act of 1934, as amended.

This report contains Ternium S.A.'s press release announcing Annual General Meetings of Shareholders.

SIGNATURE

Pursuant to the requirements of the Securities Exchange Act of 1934, the Registrant has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized.

TERNIUM S.A.

By: /s/ Raúl Darderes Name: Raúl Darderes Title: Secretary to the Board of Directors

Dated: March 20, 2012

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Ternium Announces Annual General Meeting of Shareholders

Luxembourg, March 20, 2012 – Ternium S.A. (NYSE: TX) announced today that its annual general meeting of shareholders will be held on Wednesday May 2, 2012, at 2:30 p.m. (Luxembourg time) at 29, avenue de la Porte-Neuve, L-2227, Luxembourg. Each holder of Ternium ADSs as of April 2, 2012, shall be entitled to instruct The Bank of New York Mellon, the depositary bank, as to the exercise of the voting rights pertaining to the shares represented by such holder's ADSs.

The Notice and Agenda for the meeting, the Shareholder Meeting Brochure and Proxy Statement and the Company's 2011 annual report (which includes the Company's consolidated financial statements as of December 31, 2011 and 2010 and for the years ended December 31, 2011, 2010 and 2009, and the Company's annual accounts as of December 31, 2011, together with the board of directors' and the independent auditors' reports thereon) are available on our website at http://www.ternium.com/en/ir/default and may also be obtained upon request at +352 26 68 31 52 or +1 800 555 2470 (toll free if you call from the United States). These documents are also available free of charge at the Company's registered office in Luxembourg.

About Ternium

Ternium is a leading steel company in Latin America, manufacturing and processing a wide range of flat and long steel products for customers active in the construction, home appliances, capital goods, container, food, energy and automotive industries. With its principal operations in Mexico and Argentina, Ternium serves markets in the Americas through its integrated manufacturing system and extensive distribution network. The Company has an annual production capacity of approximately 10.8 million tons of finished steel products. More information about Ternium is available at www.ternium.com.