



DIVISION OF
CORPORATION FINANCE
MAIL STOP 7010

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

June 2, 2006

Mr. J. Eduardo Gonzalez Felix
Vice President Finance
Southern Copper Corporation
2575 East Camelback Road, Suite 500
Phoenix, Arizona USA 85016

Re: Southern Copper Corporation
Form 10-K Amendment No. 1 for Fiscal Year Ended Dec. 31, 2005
Filed March 28, 2006
File No. 001-14066

Dear Mr. Gonzalez Felix

We have reviewed your first amendment of Form 10-K for Fiscal Year Ended Dec. 31, 2005 and have the following comments. We have limited our review of your filing to those issues we have addressed in our comments. Where indicated, we think you should revise your document in response to these comments. If you disagree, we will consider your explanation as to why our comment is inapplicable or a revision is unnecessary. Please provide a written response to our comments and be as detailed as necessary in your explanation. In some of our comments, we may ask you to provide us with information so we may better understand your disclosure. After reviewing this information, we may raise additional 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.

Form 10-K Amendment 1 for the Fiscal Year Ended December 31, 2005

Engineering Comments

General

1. For the property(s), please provide the disclosures as required by Item 102 of regulation S-K. In particular, provide:

- The location and means of access to the property(s).
- A brief description of the rock formations and mineralization of existing or potential economic significance on the property(s).
- The details as to modernization and physical condition of the plant and equipment, including subsurface improvements and equipment.
- Provide a description of major equipment and other infrastructure facilities.
- The current state of exploration of the property(s).
- The source of power and water that can be utilized at the property(s).

See Instruction 1 to that item.

2. Insert a small-scale map showing the location and access to the property, as required by Instruction 3(B) of Rule 102 of Regulation S-K. Please note the index maps included with the filing do illustrate the mine and processing facility locations with regard to national boundaries. The SEC's EDGAR program now accepts Adobe PDF files and digital maps, so please include these maps in any amendments that are uploaded to EDGAR. It is relatively easy to include automatic links at the appropriate locations within the document to GIF or JPEG files, which will allow the figures and/or diagrams to appear in the right location when the document is viewed on the Internet. Maps and drawings should include:

- A legend or explanation showing, by means of pattern or symbol, every pattern or symbol used on the map or drawing.
- A graphical bar scale should be included. Additional representations of scale such as "one inch equals one mile" may be utilized provided the original scale of the map has not been altered.
- A north arrow.
- An index map showing where the property is situated in relationship to the state or province, etc., in which it was located.
- A title of the map or drawing, and the date on which it was drawn.
- In the even interpretive data is submitted in conjunction with any map, the identity of the geologist or engineer that prepared such data.

Any drawing should be simple enough or of sufficiently large scale to clearly show all features on the drawing. For more information, please consult the EDGAR manual, and if addition assistance is required, please call Filer Support at 202-942-8900.

Peruvian Operations - Cajone and Toquepala, page 11

3. Please add the annual operating days to both tables or restate with the total annual tonnage mined and milled. In addition, please include the total tonnage mined, the leach material mined tonnage & grade, and the estimated leach recovery as you do for your reserve statements. Please clarify whether the copper and molybdenum grades are total copper or sulfide copper, total molybdenum or molybdenum disulfide values. You state the mill feed cutoff grade is defined as greater than 0.40% copper (sulfide or oxide). However the status of material between 0.25% and 0.40% TCu is not specified. Is it stockpiled and leached? If so, what is the cutoff grade? In addition, please disclose your sources of water?

Peruvian Operations - Processing Facilities - Ilo, page 12

4. Please add the amounts of concentrate smelted, sulfuric acid produced, anode sales quantity and average anode price received. Also include the average price received for gold, silver, selenium, and sulfuric acid. This information may be placed in a table for ease of viewing. In addition please provide a map of the Peruvian operations showing the facility locations, roads, railroads, and port facilities.

Mexican Open Pit Unit - Cananea and La Caridad, page 13

5. Please add the annual operating days to both tables or restate with the total annual tonnage mined and milled. In addition, please include the total tonnage mined, the leach material mined tonnage & grade, and the leach recovery as you do for your reserve statements. Please clarify whether the copper and molybdenum grades are copper or total copper values, molybdenum or molybdenum disulfide values and state your molybdenum recoveries. You state the mill feed grade is greater than 0.38% copper at Cananea and 0.30 % copper at La Caridad. However the material between 0.15% and 0.25% at Cananea and the material between 0.15% and 0.25% at La Caridad is leached. Please state the status of the material between these two cutoff grades. Is this material stockpiled and leached? If so, what are the respective cutoff grades? Describe is your sources of water and power?

Mexican Open Pit Unit - Processing Facilities - La Caridad, page 15

6. Please add the amounts of concentrate sales & price received, anode sales and price received and the average rod sale price or premium. In addition include the anode blister copper grade and average smelter recovery. Also please include the average price received for gold, silver, and sulfuric acid. This information may be

placed in a table for ease of viewing. Please provide a map of the Mexican open pit operations showing the facility locations, roads, and railroads.

Mexican IMMSA Unit, page 16

7. Please add the annual operating days to both tables or restate with the total annual tonnage mined and milled. In addition include the ore grades for copper, zinc, and lead, as these are your principal salable products. Please include the mill metallurgical recoveries for copper, lead, and zinc. Please state the copper, lead, and zinc concentrate tonnages produced and the average grade. Please provide the average sales price for the lead concentrate sold. Please note for the purposes of these tables, summarize the mines providing feed material to each concentrator.

Mexican IMMSA Unit - Processing facilities - San Luis Potosi, page 18

8. Please provide a three year table of the copper concentrates smelted. In addition include the anode blister copper grades and average copper smelter recoveries. Please state where these anodes are further refined or sold. Please state the zinc concentrate tonnage treated in the zinc refinery, the average price received for arsenic trioxide, cadmium, silver, gold, and sulfuric acid. Please provide a three-year table of the Nueva Rosita coal mined, average BTU content, average percent sulfur, the clean coal produced, and tonnage coke produced. All this information may be placed in a table for ease of viewing. Please state your water sources. Please provide a map of the Mexican IMMSA operations showing the facility locations, roads, and railroads.

Mexico – El Arco page 20

9. Please remove the reference to ore as in sulfide ore. Ore implies this material has demonstrated economic viability.

Mexico – Angangueo page 20

10. Please remove the reference to ore as in million tons of ore. Ore implies this material has demonstrated economic viability.

Mexico – Buenavista page 20

11. Please remove the reference to ore as in million tons of ore. Ore implies this material has demonstrated economic viability.

Available Information, page 25

12. Please change the address for the SEC's public reading room to 100 F Street, Washington, D.C. 20549.

Copper & Molybdenum reserves by Site, page 42

13. Please clearly state these are proven & probable reserves and define the criteria for this distinction as compared to mineralized material.
14. Please provide the lead and zinc reserve tonnages and grades for the IMMSA Unit. Explain how the IMMSA copper reserves increase when the copper price is reduced from USD\$1.261 to 90 cents.

Closing Comments

As appropriate, please amend your filing and respond to these comments within 10 business days or tell us when you will provide us with a response. You may wish to provide us with marked copies of the amendment to expedite our review. Please furnish a cover letter with your amendment that keys your responses to our comments and provides any requested information. Detailed cover letters greatly facilitate our review. Please understand that we may have additional comments after reviewing your amendment and responses to our comments.

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.

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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 George K. Schuler, Mining Engineer, at (202) 551-3718 with questions about engineering comments. Please contact me at (202) 551-3740 with any other questions.

Sincerely,

A handwritten signature in black ink, appearing to read "H. Roger Schwall", written in a cursive style.

H. Roger Schwall
Assistant Director