

approximately 53.9 million tons of mineral with an average grade of 0.89% of copper in Mantoverde and 6.5 million tons with an average grade of 0.77% in Manto Ruso. In December, 1990 investment in this project was US\$ 12.5 million.

Total investment of US\$ 40 million is estimated to develop the deposit.

### II.2.4.2 Other Angloamerican Projects.

By the end of 1990 investment in Mantos Blancos and its projects was US\$ 36.5 million and included the following deposits (figures in millions of dollars): Río del Oro (-); Esperanza (11.2); Aldebarán (3.9); Cacique (0.55); Elvira (0.5); Amalia (1.0); Caspiche (0.9); Vidal (0.9); Río Nevado (0.9); Pantanillo (1.34); different prospections (2.5). In 1990 Mantos Blancos waived its purchase option with Compañía Minera Paredones for Santa Cecilia where US\$ 4.2 million had been invested.

MAAC has contributed funds to finance projects that belong to Compañía Minera Anco Cominco Ltda., which are in the evaluation stage. These projects are the following, with their respective investments in millions of dollars: Lobo (2.1); Valy (0.5); Escondido (0.8); Soledad (0.5); Margeo (0.1); Pastillitos (0.1); Amos (0.3); Novicio (0.97).

### II.2.5 Disputada de las Condes - Exxon

Compañía Minera Disputada de Las Condes S.A. belongs to Exxon Minerals of the United States. It operates three main units: the Los Bronces open pit copper deposit, the El Soldado underground mine and open pit and the Chagres smelter.

#### II.2.5.1 Los Bronces.

Los Bronces is located almost 4,000 meters above sea level only 70 kilometers N.E. of Santiago. Although the mine initially was an underground exploitation, it has evolved since 1969 into an open pit system. A recently completed development extended the open pit exploitation toward other sectors of the mine.

The Los Bronces area, located in the Los Andes mountains near the city of Santiago, processed 3.7 million tons of ore from an open pit with an average grade of 1.32% Cu. Concentrate production at the San Francisco plant, which processes the mineral extracted at Los Bronces, was 123,294 tons with a content of 41,217 of fine copper.

Disputada is completing an expansion project which required investment of US\$ 400 million between 1989 and 1992 to increase mineral treatment capacity at Los Bronces from the current 12,000 tpd to 37,000 tpd, increasing production capacity from 46,000 tpy of fine copper to 130,000 tpy. If El Soldado's production is added, total production of approximately 205,000 tpy would be reached. Start-up is planned for the third quarter of 1992.

As part of the expansion plan, a new concentrating plant and tailings dam were built. The mineral is now transferred to the concentrator in the valley through a 56 km pipeline from Los Bronces, passing through two tunnels, 3.5 km and 1.8 km long. The mineral is being processed at Las Tórtolas in flotation cells with a capacity of three thousand cubic feet.

Among the items of new equipment purchased for the project are 4 Dresser 240 short-ton trucks; 2 Ingersoll Rand T-5 drills for drilling blasting holes; 7 Titan 190 short-ton 2190 trucks and an 18 cubic yard L-1100 front and a 53 cubic yard hydraulic shovel, the largest for hard rock. The material extracted from the mine will be taken to a new 54" x 74" primary crusher and subsequently to a 34 foot diameter, 12,000 horse power semi-autogenous mill which is the second unit of Los Bronces.

#### II.2.5.2 El Soldado.

El Soldado, located in the V Region, approximately 100 kilometers from Santiago, has traditionally been a underground mine but now it is also developing an open pit.

During 1990 the the 14,000 tpd expansion at El Soldado was completed. The underground mine was complemented with an open pit mine which contributes 2,000 additional tpd.

For the implementation of this expansion, 6 50 ton trucks, 3 loaders, 2 drills, 2 bulldozers and one dragshovel were acquired.