

Copper Market



Copper prices had a weak start last year, due to rising fears in the market of a weaker Chinese demand and the risks related to higher debt exposure shown by emerging economies in Asia, Europe and South America.

The average London Metals Exchange (LME) copper price was 220.6 US cents per pound (US¢/lb.), i.e., US\$ 4.863 per tonne in 2016, down 11% from the average price in 2015 (249.2 ¢/lb.). However, the overall price trend in 2016 was positive, recording a minimum price of 196 US¢/lb. (4.311 US\$/tonne) in January and reaching the highest price of 269 ¢/lb. (5.936 US\$/tonne) in November.

From the beginning until the end of 2016, copper prices rose 27%. Market balance forecasts for 2016 showed a relatively balanced supply and demand trend, with a slight oversupply of 150,000 tonnes of refined copper. This number plus the accumulated strategic inventories and a positive stock variation in registered warehouses, resulted in stocks equivalent to 2.3 weeks of consumption.

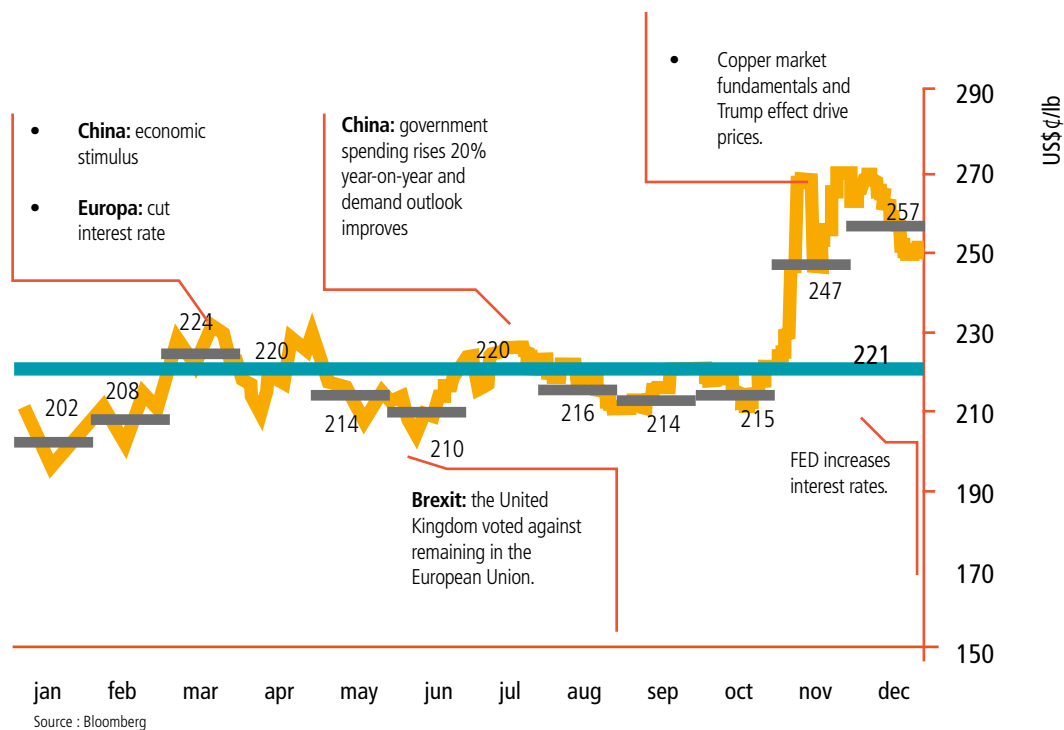
The average price in 2015 was 249.2 US¢/lb. (5.494 US\$/tonne), while the average price during the first two months of 2016 did not exceed 210 US¢/lb. (4.672 US\$/tonne).

The first price recovery was observed in March when China's growth forecast improved and the European Central Bank announced it had cut

interest rates and had extended its asset purchase programme, injecting more than 80 billion euros. In March, copper prices rose to above 220 US¢/lb. (4.850 US\$/tonne).

At the end of the first six months of 2016, the price fell again after the United Kingdom voted against remaining in the European Union.

LME copper price trend



In July, there was more positive data from the Chinese economy, it grew more than had expected during the second quarter, encouraging investment funds to consider metals such as copper, zinc and nickel in their investment strategy. At the time, Chinese public spending sustained part of the growth of copper-intensive sectors, more investment in infrastructure, including the recovery of the industrial sector and the increase in domestic consumption, reflected in higher retail sales. Real estate was a key sector in strengthening the copper demand, which showed a positive recovery compared to 2015.

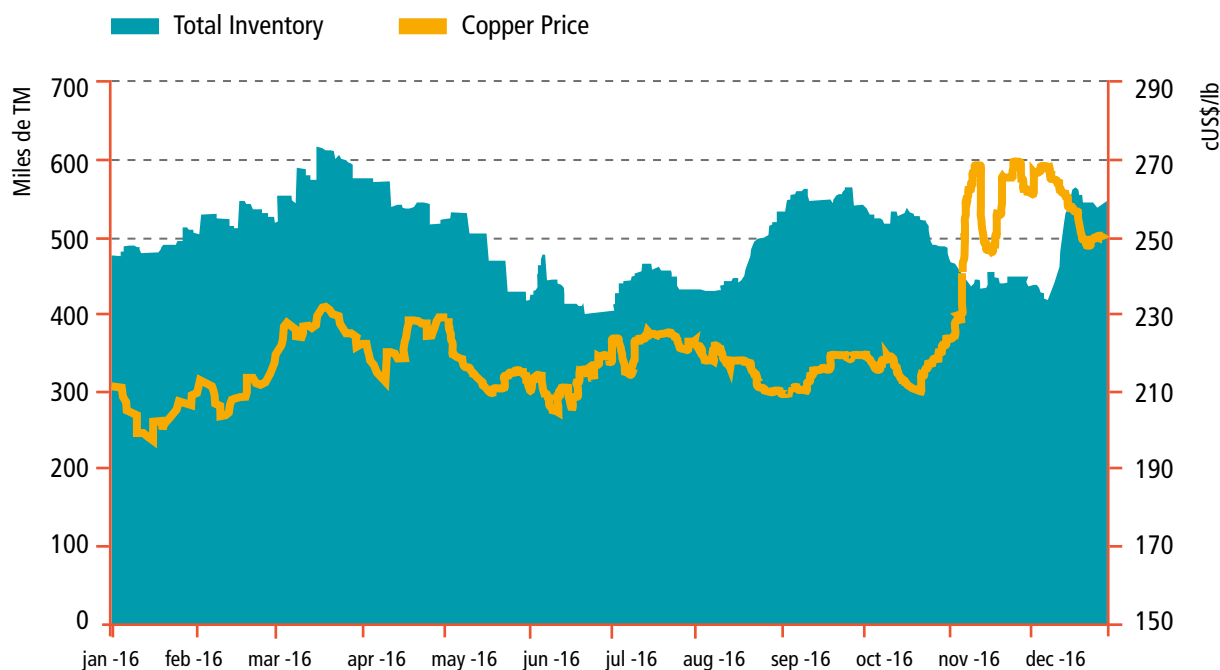
Copper prices showed a positive trend during the second half of the year; prices averaged 228 US¢/lb. (5.027 US\$/tonne), compared to 213 US¢/lb. (4.700 US\$/tonne) in the first six months, in line with market fundamentals that had forecast a copper supply deficit.

In respect of supply, more non cost-related interruptions, but to work and productivity issues of operations in Asia and South America, reduced copper production. Furthermore, the economic performance of China, better than expected, and a positive macroeconomic environment, with the best US industrial

production data since March 2015 and solid numbers shown by companies in the Chinese manufacturing sector, raised demand growth forecasts.

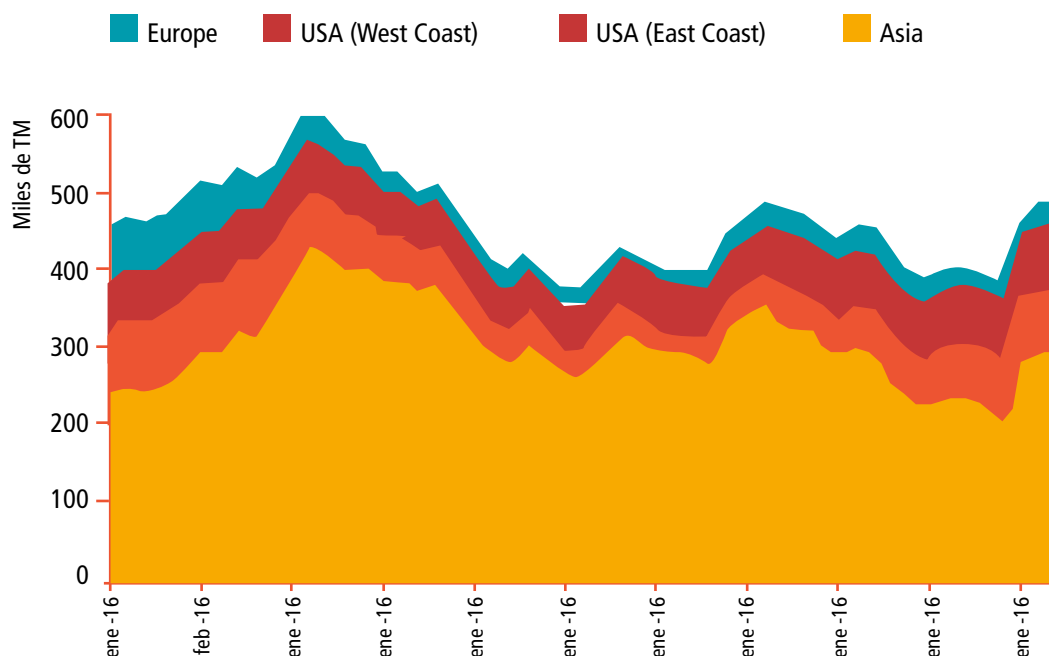
Total copper stocks in registered warehouses (LME, Comex and SHFE) began to decline in September, from a total of 574,000 tonnes of refined copper to 417,000 tonnes at the beginning of December, providing an additional boost to prices. This scenario was favourable for numerous market agencies to invest in three metals markets (LME, Comex and SHFE) with buying positions favourable to copper, boosting its price, consolidated after the elections in the United States.

LME copper prices and official inventory trend (LME, Comex and SHFE)



Source: Bloomberg

Stock trend by region



Source: Bloomberg

Sales

In 2016, our sales revenue was US\$ 11.537 billion; this includes copper, molybdenum, by-products and toll processing services. Copper represents 91% and the remaining products 9% of total sales.

Our own-sources copper sales and third-party sales revenues were US\$10.534 billion, equivalent to 2,262,000 metric tonnes of refined copper.

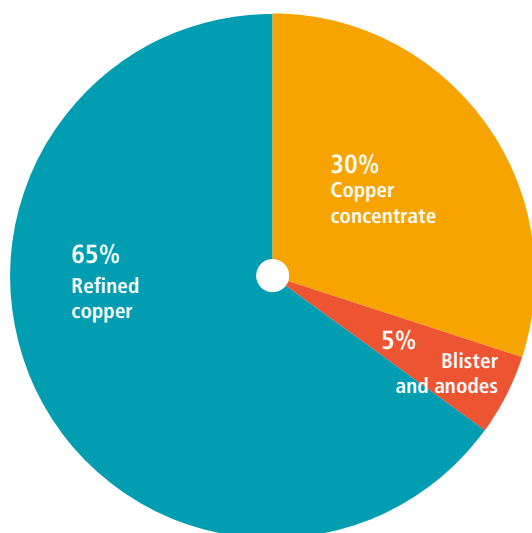
By-product sales revenue totalled US\$1.003 billion; molybdenum sales accounted for US\$419 million and anode slime, gold, silver, sulphuric acid and toll processing services for US\$583 million.

2016 Codelco Products (US\$ million)	
Copper	10,534
Molybdenum	419
Others	583
TOTAL	11,537

Copper Sales distribution by product and market

Total copper sales (own and third-party) were 2.3 million tonnes of refined copper distributed as follows: 65% refined copper, 30% concentrate and 5% blister and anodes. Key markets were Asia (64%), followed by Europe (13%), South America and other markets (12%), and North America (11%).

Copper physical sales by product 2016



Copper physical sales by market 2016

