CHEMISTRY

14 - 16 YEARS

Copper Mining and Extraction: Oxide Ores

Answers

1. Why can the electrolytic refining (electrowinning) be done without the use of copper anodes?

In electrolytic refining using copper anodes, the copper is in the anode. In electrowinning the copper is in the electrolyte.

2. In electrolytic refining of anode copper from sulfide ores, small amounts of impurities from the anode form a sludge containing precious metals. In SX-EW there is no sludge. Explain why.

In electrowinning there is no copper anode. The electrolyte contains copper ions with minimal impurities. The precious metals are left in the leach pad and not recovered.

Return to Copper Mining and Extraction: Oxide Ores