

The global leader in cathode repair.

For more than four decades, the EPCM Group has supplied the world's leading copper, nickel, manganese and cobalt producers with the highest-performing repaired cathodes. Along the way, we've saved clients millions annually.

Nobody knows the cathode repair business like we do.

Our state-of-the-art technology, proven designs and extensive experience ensure exceptional cathode performance. We understand your environment and your business and will recommend the materials and design to best suit your needs.

Track Record

600,000+
cathodes repaired in 2020

100,000
sheets of copper stripped in 2020

100,000
new cathodes / year capacity

0
empty client cells in 2020

Millions
\$USD in annual savings

Expertise

3
cathode repair facilities

30
clients

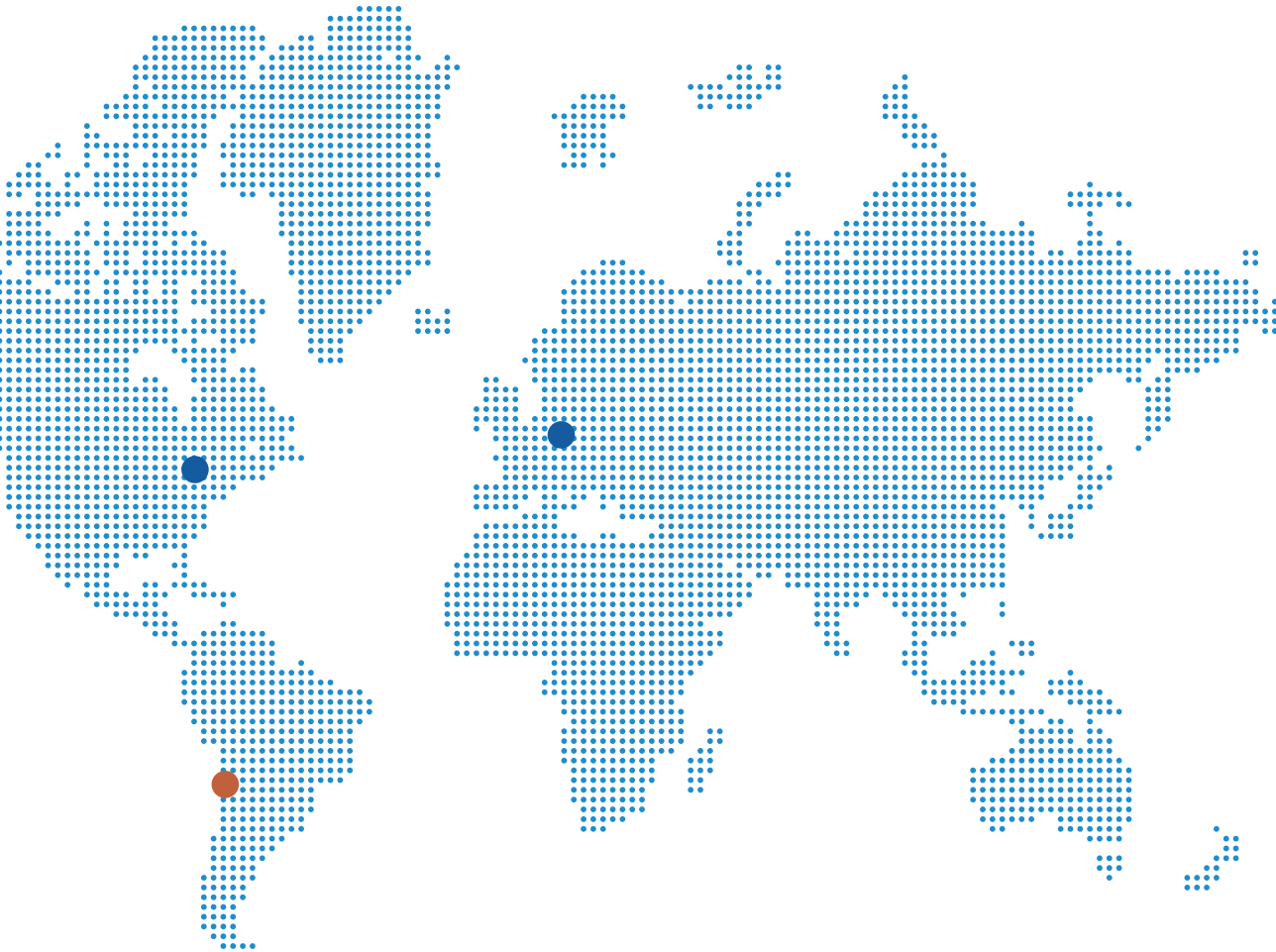
10
countries

100+
highly qualified technicians

30+
years in process refinement

Cathode repairs that save money while improving operational results.

Our clients are often shocked to learn that 95% of the 'unrepairable' cathodes we see can actually be repaired to original standards.



Headquartered in Canada, EPCM operates globally but supports clients locally through our operations in North America, South America and Europe.

Around the world

EPCM

1980
established

20k
monthly capacity

25
employees

COBRA

1998
established

50k
monthly capacity

450
employees



We apply decades of experience and insight to generate solutions that help our clients maximize productivity while reducing costs.

We specialize in repairing the right way – so you can keep your operations running at peak effectiveness.



Our proven approach

Wash – don't buff

New cathodes sheets are damaged by buffing. We minimize damage by using a high-pressure wash system instead and buff only when required.

Ensure a flat, rigid sheet

Our sophisticated equipment ensures cathodes meet original specs to optimize performance.

Technology agnostic

We have decades of expertise repairing cathodes produced by anyone, anywhere, at any time.

Strip copper in the CSM, not offsite

We support client CSMs around the world. We offer a free two-day, onsite assessment of CSMs.

Use only the highest-quality edgestrips

With expertise in the full spectrum of edgestrips, we'll recommend which one is best for you to minimize life-cycle cost.

Restore 'unrepairable' cathodes

We can successfully repair 95% of the 'unrepairable' cathodes we view at client sites. We repair it once – and we repair it right the first time.

Project summary: European refinery client

Poor-quality repairs cost millions of dollars annually in lower current efficiency, poor plating quality and lower CSM throughput. Our repairs at a European refinery saved the client \$2 million USD. And that was just in the first year.

Associated losses

- Difficult to strip copper
- Severely damaged or scrapped cathodes and copper
- Higher-energy consumption
- Lower current efficiency
- Less copper production
- Poor plating quality

Issue	Our solutions	Results & savings (nom. capacity 400 kt/a)
Damaged sheet	Precision mechanical straightening, sheet replacement	Performance 3% increase or 12 kt/a @ 100 \$/t Savings: \$1.2 million/a
Passive surface	Ultra-high pressure-wash, localized buffing	Availability 1% increase or 4 kt/a @ 100 \$/t Savings: \$0.4 million/a
Edgestrip replacement	Machined edgestrip – 5-year minimum life	Tankhouse edgestrip conversion 1% less B-grade copper @ 20 \$/t Savings: \$.4 million/a
Damaged weld	Cathode re-weld, raw material upgrade	Less scrap Repair 'unrepairable' cathodes Savings: \$0.2 – 0.4 million/a

Total Savings: \$2.0 – \$2.4 million

Since we started repairing cathodes with EPCM, we have been able to eliminate the purchase of new cathodes and we have increased profitability by over \$2 million through increased production.

European Refinery Tankhouse Manager

We've been repairing our cathodes exclusively with Tecnologias COBRA (The EPCM Group) for 20 years. Their technology and resulting repairs are unsurpassed by anything else in the market.

South American SX – EW Tankhouse Manager



EPCM has been designing, fabricating and repairing cathodes for global clients for more than 40 years.

We are the go-to experts for restoring nonperforming cathodes – and your tankhouse productivity.

Contact us today to schedule a free onsite assessment of your cathodes.

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By repairing our 20-year-old sheets, we have seen dramatic improvements in plating quality and stripability. EPCM has met all its commitments for us.

North American Refinery
Tankhouse Manager

Global insight. Local presence.

Celebrating 40+ years of global excellence in engineering, procurement and construction management. We deliver single-source life-cycle solutions through EPCM Engineering, EPCM Automation, EPCM Service & Supply, and Tecnologias COBRA. Our customer-first solutions are specifically designed to help our clients achieve and maintain leadership in their industries.



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