



# KROHN INDUSTRIES

*Quality & Service Since 1955*



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## EARTHCOAT™

**Decorative Gold Plating Solution 14K, 18K, 24K, and Rose colors  
(Decorative)**

### Product Description

EARTHCOAT™ is a resilient gold plating solution which deposits a flash plate of gold over nickel, sterling silver, gold, rhodium, and most other similar metals. The color control of EARTHCOAT™ gold plating is very easy due to a superb combination of brighteners which provide excellent coverage and leveling ability.

EARTHCOAT™ offers a cyanide-free alternative to other hazardous gold plating solutions.

EARTHCOAT™ is supplied as ready to use, for ease of set-up and operation.

### Applications:

Over nickel, sterling silver, gold, rhodium, and most other similar metals.

### Cautions: Read all safety information before using this product

1. Use only with proper ventilation.
2. Wear gloves, safety goggles, and apron.
3. Avoid contact with eyes and skin.

### Operating Conditions:

Temperature	140°F (60°C)
Current Density	3-4 Volts (5-10 ASF)
PH	9.2-10.0
Beaker	Pyrex
Anodes	Stainless Steel
	1 micro inch per minute

### Bath Set Up:

1. Fill beaker with **EARTHCOAT™** gold plating & heat to 140° F.
2. Check connections from rectifier to anode and work to be sure the negative (-) and positive (+) wires are connected properly.  
The work should be charged negative (-), and the anode positive (+).  
Turn Rectifier On.
3. Plate for 30-45 seconds at 3-4 volts depending on size of part and coverage desired.
4. Larger parts require slightly higher voltage (4V), while smaller parts require lower voltage (2-3V). If part shows any burning such as a dark or rich orange deposit around the edges, you are burning the part and must lower the voltage. If part is not a gold color after 45-60 seconds of plating, voltage is too low, therefore, increase voltage slightly.
5. After gold plating rinse part thoroughly in deionized water and dry completely with either a steam cleaner or a hot air dryer.

### Trouble Shooting:

Pieces not plating

- Check power supply, make sure switch is on.
- If switch is on, check fuse.
- Check connections from power supply to anode or cathode (part).

Pieces turn dark gray or black

- Anode/cathode connections are reversed.
- Current is too high.

Pieces turn hazy, cloudy, dark

- Current too low. Adjust to higher current.
- Temperature is low. Heat to 140 F.
- Plate for a longer time.
- Organics are too high. Solution is used up - discard.

Pieces are too rich in gold color

- Current too low. Adjust to higher current.
- Plate for a shorter time.
- If solution is old, organics are too high. Solution is used up - discard.

### Discard & Replace:

**EARTHCOAT™** is a rugged solution and is designed to help assure long life. If, however, a problem should arise that cannot be solved by any of the above recommendations, or recommendations by our or any other qualified laboratory, the bath may need to be replaced: Transfer to a D.O.T. approved container.