

PEACOCK LABORATORIES, INC.

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INSTRUCTIONS FOR GOLD PLATING ON GLASS

Many surfaces may be coated with gold; we will restrict this discussion to glass. Peacock Laboratories Gold Electroless bath consists of three components: EG-2000 Gold solution (henceforth called "A"), EG-2000 Gold Addition Agent (henceforth called "B"), and EG-2000 Reducer solution (henceforth called "C"). Please note that while this document describes the gilding process by pouring, the appropriate solutions can also be sprayed on using the Peacock double nozzle spray gun.

Preparation of Solutions:

1. In a glass beaker, add 10 ml of A to 10 ml of B. This solution must be made fresh daily. Although the color of the liquid will not affect the plating, you will notice that after some time, the originally slightly yellow liquid may turn almost colorless. After 24-48 hours the clear liquid will show some particulates indicating that it is now not suitable for use.
2. In a second beaker measure 10 ml of C.
3. In a third beaker, measure 10 ml of #93 sensitizer solution and add to it 40 ml of distilled water.

Gilding:

1. On a clean glass surface, apply solution 3 for 15 seconds taking care that the entire surface is covered. Pour out the solution and rinse well with distilled water.
2. While the glass surface is still wet, thoroughly mix the solutions in beakers 1 and 2 and then pour it evenly on the glass taking care that the entire surface is covered. The gold deposits as a blue-gold layer and the formerly clear solution turns grayish-blue.
4. Carefully rinse with distilled water. It is not necessary that the coating is opaque. The color of the gold mirror and the thickness of the gold can be increased by using higher concentrations, or by applying more coats.