

## RE: Protective Coatings on Brass Parts

### General

In our continuing effort to provide the finest products, we have performed extensive tests to determine the best way to protect the finish of all Mystery Electronics parts. Every consideration is made to allow the customer to enjoy the benefit of our products for many years. The brass versions of our product can be ordered with a proprietary protective treatment or an optional permanent protective coating applied. We acknowledge that some form of surface protection is needed. The proprietary protection method we furnish, as well as our reasons for selecting this method, are explained below. Please contact the factory if you have further questions. As always, we invite your comments.

### Test Results

Our tests indicate that the long-term appearance of a natural brass luster is best achieved and maintained when a protective coating is not applied. For this reason Mystery Electronics brass parts do NOT have any type of "permanent" protective coating such as lacquer, polyurethane, or similar material applied. Such permanent coatings impair restoration of the finish when oxidization occurs.

### Application Conditions

When brass parts have a permanent protective coating applied, and are installed in a location or application that receives little or no wear, they will retain a new look for an indefinite time period provided certain conditions are met. These conditions mandate that no humidity be present at the time of coating application, no humidity or adverse atmospheric chemical agents are present in the location where the part is to be installed, and that the part can maintain the continuity and integrity of the overall coating without abrasion. If the same parts are installed where abrasion or wear does occur, they too will show discoloration in a very short time, regardless of any protective coating. The coating usually wears off in some areas but not uniformly over the whole part, resulting in a splotched or "two-tone" appearance.

### Normal Oxidization

Our tests demonstrate that routine shading of brass from a brite finish to a slightly yellowed finish is due to oxidization of the metal. This is considered normal for brass. Continued uniform yellowing causes the part to take on an overall cast. This too is normal when the metal is exposed to the air without oxidization protection. For many applications this is not considered to be a problem especially where the part receives enough abrasion thru regular use to retain the "brite" effect. It is when oxidization is excessive or not uniform that the subsequent discoloration becomes objectionable. Since discoloration of the "two-tone" variety will occur under the best of "permanent" protective coatings, when the surface is scratched or rubbed thru regular use, removal of even a minor discoloration becomes a major task, as the entire protective coating must be removed.

### Floor Mounted Locations

It is important to consider that our products are designed to be used on floors and similar areas where abrasion and traffic are likely. To avoid a condition that eventually deteriorates to the aforementioned "two-toned" look, all Mystery Electronics brass parts are buffed to a uniform finish. The parts are then polished with a urethane based, silicone resin, non-wax, protective polish. This treatment method prevents discoloration during shipment/installation and minimizes oxidization throughout the life of the product. We have selected this method to keep the part looking new for the longest time period possible. As opposed to the aforementioned permanent protection problem, our method allows maintenance of the product to its original "new" appearance luster without extensive effort.

### Installation

Fingerprints are caused by humidity reacting with the oils of the skin while in contact with the part. Our proprietary treatment prevents fingerprints under most circumstances. In the event that fingerprints do occur, they can be easily removed by rubbing the affected area with tissue paper. Using household baking flour or cornstarch on a tissue or soft rag also works.

### Maintenance

We recommend an automobile "car polish" or household metal polish that contains some form of wax or metal protective formula be used for later touch-up maintenance if needed. Avoid polishes made of abrasive compounds only, as they leave no moisture protection after application. Certain polishes may have stronger abrasive qualities, so caution is advised. If the brass finish is scratched, we recommend that a fine grade Scotchbrite pad be used in lieu of heavy abrasives for a more uniform result.

Surface protection must be reapplied after maintenance to afford long term protection performance. Results approximating our proprietary treatment can be had by using a silicone polymer auto polish such as Nu-care, Finish 2001, or similar brand car polish available at most auto parts and discount stores. We suggest that ANY polish be tried out on a small unseen area (such as the underside of the door) before applying larger amounts. The use of regular kitchen cleanser or other strong abrasive is NOT recommended.