

## COSMETIC SPECIFICATION – BATTERY CABLE LUGS (BCL)

### 1.0 SCOPE

This applies to all TBO un-plated (bare) and plated copper BCL products.

### 2.0 PURPOSE

To define acceptability criteria for cosmetic issues

### 3.0 REFERENCE MATERIAL NUMBERS

This applies to all TBO BCL products.

### 4.0 DEFINITIONS

**Copper Color:** Freshly formed, copper is a beautiful rosy-pink color. Copper before long, however, will inevitably change to a darker russet-brown. Under certain circumstances, it may turn red, black or blue-green. Barely noticeable at first, copper becomes darker over time

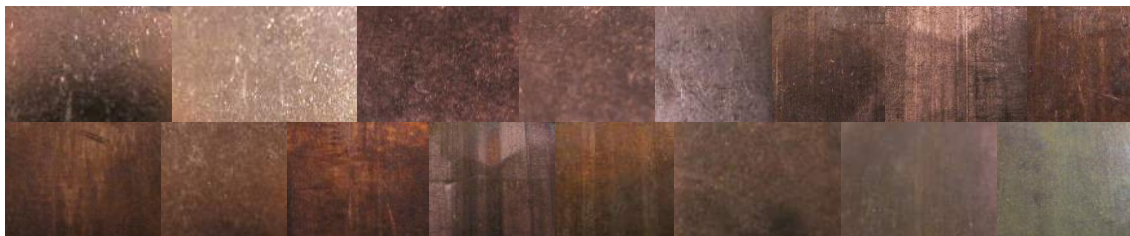
**Plating Challenge:** Appearance of the finish plated part where copper is exposed or plating is cracked.

### 5.0 PROCEDURES

#### **Workmanship, Finish and Appearance:**

As-received parts shall be clean, free of dirt, scale, and other defects. The part surfaces shall be typical in appearance to that of annealed copper. Blemishes and color shade variations are natural and acceptable and do not affect the form, fit, or function of the battery cable lug.

Below are examples (not limited) of acceptable color variation for as-received parts:



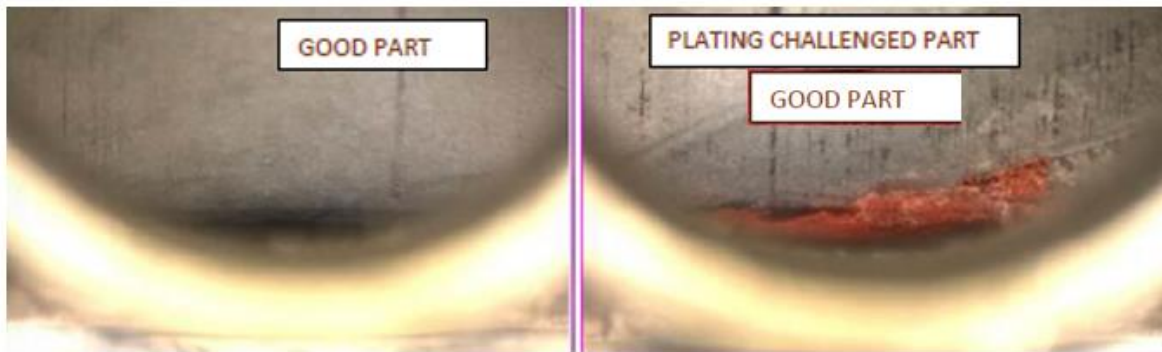
#### **Plating Appearance:**

**Matte tin:** Matte tin has a dull, non-reflective surface that varies in color from ash-white to mid-gray. Lot-to-lot shade variations are acceptable and do not affect the form, fit, or function of the connectors.

Matte tin is inherently soft and susceptible to handling damage that can cause superficial blemishes which are easily seen by the naked eye due to non-reflective surface. Superficial blemishes do not affect the form, fit, or function of the connectors.

REVISION: <b>B</b>	ECR/ECN INFORMATION: EC No: 117534 DATE: 2017 / 05 / 30	TITLE: <b>COSMETIC SPECIFICATION BATTERY CABLE LUGS</b>	SHEET No. <b>1 of 2</b>
DOCUMENT NUMBER: <b>PS-19902-017</b>	CREATED / REVISED BY: <b>GROJAS01</b>	CHECKED BY: <b>JMACNEIL</b>	APPROVED BY: <b>JMACNEIL</b>

### Plating Visual Acceptance Criteria:



- If 1 BCL in one bin is found to be plating challenged it is still a “Good Part”. **Accept the bin, but remove the part and save sample as process indicator for STP.**
- If 3 or more BCLs are found within in one bin: plating challenged – “Good Part”, but should be **rejected for QC review and MRB disposition.**



- If 1 BCL in one bin is found to be plating challenged it is a “No Good Part”. **Accept the bin, but remove the part and save sample as process indicator for STP.**
- If 3 or more BCLs are found within in one bin: plating challenged – “No Good Part”, then bin should be **rejected for return to STP.**

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