**TIP 1: ASSESSMENT**
Before initiating a rust removal project, it is essential to closely assess your vintage item with a critical eye. Many customers have used MetalRescue on their antiques with great success, but there are some vintage items that are not stable enough to tolerate the rust removal process. Examples include items with flaking or cracking surfaces, the age/pigment composition of paint, or chipping/deteriorating paint or coatings. Caution should be exercised when working with items with these types of conditions. Metal Rescue is safe on the vast majority of materials including wood, glass, rubber, fabric, and even your skin. For maximum results, Metal Rescue must be used as a bath or a soak. It is the process of soaking a vintage item for a prolonged period of time (whether it is soaked in Metal Rescue or plain water) that can cause unexpected damage. We strongly advise that “when in doubt, test it out”. Test a small, unseen area on the items before proceeding with your project.

**TIP 2: PAINT PRECAUTIONS**
Metal Rescue will not remove or harm the vast majority of paint coatings with a few exceptions as outlined below. As mentioned above, “when in doubt, test it out”. Test a small, unseen area on the items before proceeding with your project.

- **Rust under/behind paint.** If vintage painted item has a layer of rust that has formed under/behind the paint, the paint is at high risk of becoming dislodged during the rust removal process. Metal Rescue works through the process of chelation – molecules contained in Metal Rescue surround the iron oxide (rust) and lift it from the metal’s surface. Chelation eliminates the need for chemicals or acids to remove rust but if a layer of rust has formed behind the paint as the rust is “lifted” from the metal the paint will be lifted and removed as well.

- **Paint containing iron oxide.** Some paints and inks (typically red/orange), especially old paints, may use iron oxide pigment. Metal Rescue has been engineered to remove iron oxide in all forms, therefore it may dissolve the pigment in these types of paints. We strongly advise that “when in doubt, test it out”. Test a small, unseen area on the items before proceeding with your project.

- **Prolonged soak time.** Vintage items with flaking or cracking surfaces or chipping/deteriorating paint or coatings may not be suited for prolonged soaking – whether it is Metal Rescue or plain water – and may experience unexpected damage.

- **Oxide coatings.** Metal Rescue will remove oxide coatings. It will remove zinc phosphate, bluing, browning, and other oxide finishes in about 20-40 minutes immersion time. It will brighten copper and copper-based alloys such as brass and bronze.

**TIP 3: SOAK TIME**
Once items are submerged in Metal Rescue, it is important to check on them frequently. Prolonged soaking of anything antique/old/vintage in a liquid (even water) can cause paints and coatings to loosen and the same may be true of a lengthy soak in Metal Rescue. For optimal results, check items each hour during the rust removal process and promptly remove once the item has reached your desired results.

**TIP 4: ATTENTION TO TEMPERATURE**
Metal Rescue is temperature sensitive. When working with painted vintage metal items, it is best to keep Metal Rescue at a temperature between 68° and 78°. If the temperature of Metal Rescue bath is below 68°, Metal Rescue will become “sluggish” and may not produce optimal results.

NOTE: If room temperature is 68° the temperature of Metal Rescue bath will likely be a few degrees cooler. Similarly, if the vintage metal item has been sitting in an outdoor garage or workshop, it is possible that the metal item will be cold and could cause the temperature of the Metal Rescue to drop.
TIP 5: REMOVE ITEM-FILTER/SAVE/REUSE
When the rust removal process is complete, pour used Metal Rescue into plastic storage container (using a filter such as cheese cloth or a paint filter to skim any rust flakes/sediment), cap it and save for future use. (Note: Keep used and fresh Metal Rescue separate). Metal Rescue has a shelf life of one year after having been opened.

TIP 6: EXTENDED RUST PROTECTION WITH DRY COAT™ RUST PREVENTATIVE
Follow up with Dry Coat Rust Preventative Spray – it is water-based, and once applied provides a clear protective coating. Dry Coat is designed exclusively for indoor storage, and offers up to one year of protection.

NOTE: B'laster is not responsible for damage to any item affected by the use of Metal Rescue or Dry Coat. B'laster is not able to accurately assess the fragility or suitability of individual items before their exposure to its products. Please read all instructions carefully and test Metal Rescue on a concealed or hidden area prior to full submersion.

RUST UNDER/BEHIND PAINT
This is a good example of a painted sign that did not de-rust as well as others. In the top "before" photo, you can see visible rust behind the paint. If rust is present behind any paint on a sign, Metal Rescue will remove the rust and therefore the paint as well. We would NOT recommend trying to remove rust from a sign in this condition because of where the rust is on the sign. In the bottom "after" photo you can see the areas of the sign where the rust was removed. Since the rust was located underneath the paint, the paint was removed as well. Again, we would NOT recommend trying to remove rust from a sign in this condition due to the location of the rust being behind the paint.

RUST UNDER/BEHIND PAINT
This is an old plate from 1927. The plate was soaked in warm solution and the white paint on the letters was removed. If there is concern that a warm water solution might remove the paint we would NOT recommend Metal Rescue for that application. The paint on metal must be sturdy and able to withstand warm liquid. Test in a small concealed area prior to full submersion.

PAINT CONTAINING IRON OXIDE
As mentioned, some paints and inks (typically red/orange), especially those found in old paints, may contain iron oxide pigments such as the red numbers on the old odometer pictured here. Metal Rescue has been engineered to remove iron oxide, and it may dissolve the pigment in these types of paints as shown in this "after" photo – notice the red numbers have been removed.

This 1963 Michigan license plate was derusted halfway down the middle. Note that the paint is untouched as this paint was sturdy and intact prior to rust removal. This plate cleaned up extremely well with Metal Rescue.

B'LASTER METAL RESCUE PRODUCTS WILL TAKE THE WORK OUT OF YOUR WORKDAY!