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**MICROLOK® MZN Zinc Phosphate**  
Operating Instructions

**PRODUCT DESCRIPTION**

MICROLOK® MZN zinc phosphating solution is used to deposit a fine-grained zinc phosphate coating on iron and non-stainless steel parts. Supplied as a liquid concentrate, MICROLOK® MZN contains a specially designed buffer and accelerator system that forms a high quality, tightly adherent coating with a short immersion time. MICROLOK® MZN is a highly concentrated product with long tank life and high coverage per gallon. The product does not etch the steel surface or cause hydrogen embrittlement. Its porous crystal structure allows it to absorb a rust preventive topcoat for long-term protection and durability.

**OPERATING CONDITIONS**

Bath Makeup	5% by volume.
Operating Temperature	140-160°F
Immersion Time	10-15 minutes for a 300-500 mg/sq. ft. coating.
Equipment Construction	Tank and Immersion Heaters: 316 stainless

**PROCESS SEQUENCE**

1. **CLEAN** parts in PRESTO KLEEN® HP heavy-duty alkaline cleaner, mixed at 8 oz/gallon; at 150° F for 5-8 minutes.
2. **RINSE** in clean water; 30 seconds.
3. **APPLY MICROLOK® MZN PHOSPHATE COATING** by immersing parts in MICROLOK MZN bath at 140-160°F for 10-20 minutes.
4. **RINSE** in clean water; 30 seconds.
5. **SEAL** the phosphate finish in DRI TOUCH® PLUS IRP3 water-displacing rust preventive, for a dry-to-touch finish, or in SHEATH® WS12 water soluble oil, at 130°F, for fast drying, slightly oily finish

## **BATH MAINTENANCE**

MICROLOK<sup>®</sup> MZN zinc phosphate can be maintained by acid titration or drop-count procedures. Ask your Birchwood Technologies<sup>®</sup> technical representative for details.

## **PACKAGING & STORAGE**

5 gallon pails and 55 gallon non-returnable drums. Store indoors in closed container

***Before Using This Product – Please Read, Understand and Follow all the Precautions shown on the Product Label and on the Safety Data Sheet.***

**The Safety Data Sheet can be found on our website:**

**<https://www.birchwoodtechnologies.com/Downloads/Safety.html>**

**Use Appropriate Warning Labels on any Container used to Store or Apply this Product.**

**NOTE:** The information contained herein is provided in good faith and is believed to be correct as of the date below. However, Birchwood Laboratories LLC makes no representation as to the comprehensiveness or accuracy of the information. It is expected that individuals receiving the information will exercise their independent judgment in determining its appropriateness for a particular purpose. Accordingly, Birchwood Laboratories LLC will not be responsible for damages of any kind resulting from the use of or reliance upon such information.

MICROLOK<sup>®</sup> MZN Zinc Phosphate  
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