

## ***ArmaKleen Technical Service Report Summary***

**Cleaning Trial Type:** Aqueous

**Industry:** Ammunition Manufacturer

**Segment:** 26 – Fabricated Metal Products

**Soil:** Cosmoline

**Substrate:** steel

**Description of Part(s):** three sets of steel pump/dispensers

**Customer objective:** The customer was looking to improve their cleaning performance.

**Cleaner used:**

- 5% by volume solution of ArmaKleen™ 4 in 1 Cleaner
- 10% by volume solution of ArmaKleen™ M-HP-2

**Machine used:**

- Ultrasonic Washer (SK Blackstone 6315)
- Spray Under Immersion Washer (Graymills T12, Graymills T24, SK Model 81.8 w/SUI)

**Temperature used:** 160°F

**Time required:** 1 hour

**Post Cleaning:** Fresh water rinse followed by air pressure drying.

**Recommendation to Customer:** The ArmaKleen Technical Center recommends using a 5% by volume solution of ArmaKleen™ 4 in 1 Cleaner at 160°F in an Ultrasonic Washer for a minimum of 1 hour.

**Before Picture**



**After Picture**



**Source:** TSR # 16-A-097