

## **CHALLENGE 361-HT**

### **SYNTHETIC GRINDING FLUID FOR CERAMIC AND OPTICAL MATERIALS**

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**CHALLENGE 361-HT** is an aqueous based synthetic formulation developed to optimize removal rate and surface finish in grinding, sawing and fixed abrasive lapping processes using diamond grinding wheels, blades, plates and pads. The product's exceptional heat transfer characteristics insure prolonged diamond life, even with the most difficult materials.

The product also contains extra lubricating qualities for difficult processes. The extra lubrication allows for use in grinding and fixed abrasive lapping where the wheel/plate or pad loads prematurely with grinding debris reducing material removal rate over time. CHALLENGE 361-HT is compatible with all type filtration systems allowing for extended use. Its low foam operation promotes easy application providing a laminar flow of coolant to the wheel/work-piece interface for fine finishes and prolonged tool life.

#### **Typical Applications:**

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Surface, Blanchard Type, O.D./Cylindrical, Edge/Bevel/Dicing, Core Drilling, Diamond Wire Sawing.

#### **Benefits:**

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- Better surface finishes
- Faster removal rates
- High lubrication
- Low foam
- Extended diamond life
- Non-staining
- Compatible with all filtration systems
- Non-corrosive to ferrous metals

#### **Typical Properties:**

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|------------------|--------|
| pH               | 10.5   |
| Conductivity     | mS 0.2 |
| Specific Gravity | 1.03   |

#### **Directions:**

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CHALLENGE 361-HT is designed for use at economical low concentrations and is equally effective in hard and soft water (though DI or softened water is best). Recommended concentration with water is 3%. Maintaining dilution ratios with a hand-held industrial fluid tester (refractometer) is recommended.

#### **Additional Information:**

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CHALLENGE Products are available in 5-gallon pails and 55-gallon drums, F.O.B. Bethel, Connecticut, and also include: grinding fluids, sawing fluids, lapping/polishing slurry additives, rinse/wet storage additives and ultrasonic/megasonic detergents. Safety Data Sheets available upon request.