

Q8 Brunel XF 776

Extreme performing water soluble cutting fluid for heavy duty machining

Description

Q8 Brunel XF 776 is an exceptional performing water-soluble cutting fluid where mineral oil is replaced by high-purity base fluids chemically derived from natural gas. It has an excellent physical-chemical and biological stability, minimal tendency to foam formation, excellent detergency and compatibility with both hard and soft water.

The very advanced lubricity additive allows to obtain cutting performance even higher than products with standard EP components. The exceptional lubricating power of the advanced lubricity additive in combination with the high-purity base fluids guarantees excellent surface finishes and an increase in the useful life of the tools.

Applications

Q8 Brunel XF 776 has been designed to minimize the risk of staining of even the most sensitive aluminum alloys including aerospace applications. It is recommended for highly demanding cutting operations on all aluminum alloys, titanium, inconel, copper alloys, high alloy steels and stainless steel.

User instructions

1. The correct mixing procedure is to add Q8 Brunel XF 776 to water and stir. For this operation we recommend positive displacement (Dosatron type) mixing units.
2. In order to preserve the integrity of this product drums should be stored inside a building (5-40 °C) protected from frost and direct sunlight.
3. Recommended concentrations are listed below.

| | |
|-------------------|----------|
| General machining | 4 – 6 % |
| Severe operations | 8 – 12 % |

Note: In some circumstances and applications, it is beneficial to exceed the recommendations shown above.

Environment, Health and Safety

Q8 Brunel XF 776 has an advanced safety profile. It does not contain biocide and it is free of chlorine, cresols, nitrites, boron, boric acid, DCHA and secondary amines. It is compliant with the TRGS 611 specification. This ensures environmental safety & operator health. Also the reduced smell in the application improves operator environment. Please consult the Material Safety Data Sheet for instructions regarding safe handling and environmental issues.

Properties

| | Method | Unit | Typical |
|---|--------|--------------------|---------|
| Base fluid content | - | % | 36 |
| Density, 20 °C | D 4052 | g/ml | 0.912 |
| Kinematic Viscosity, 40 °C | D 445 | mm ² /s | 47 |
| Appearance (Emulsion) | Visual | - | Milky |
| pH@3% in 400 ppm CaCO ₃ water | D 1287 | pH | 9.5 |
| Determination of rust prevention characteristics of water-mix metalworking fluids | IP 287 | % | 5 |
| Corrosion characteristics of water-mix metalworking fluids | IP 125 | % | 3 |
| Refractometer Factor | - | - | 1.0 |

The figures above are not a specification. They are typical figures obtained within production tolerances.

Remarks

Please contact your Q8Oils representative for further advice and support on your specific application and equipment