

ALC 50

CLEANER / CONDITIONER FOR METALWORKING FLUID AND AQUEOUS SYSTEMS

▷ PRODUCT DESCRIPTION

ALC 50 is a water based, low-temperature alkaline cleaner and conditioner (contains biocidal additives) designed for the internal and external cleaning of metalworking fluid sumps and systems. It is designed and formulated for the removal of organic, inorganic contaminants and irritating odors from sumps, barges, lines, and water treatment systems.

ALC 50 is used to flush and clean metalworking machine sumps and system components prior to recharging with fresh coolant or as an additive to control odors. It is engineered to condition metalworking fluids for extended use prior to cleaning and replacement.

ALC 50 specialty cleaning and performance additives exhibit enhanced detergency/dispersing properties for the effective and timely removal of oil-based contaminants, swarf, and microbiological growth present in sumps and coolant lines. ALC 50 is also recommended for water treatment, recycling, and cooling systems.

ALC 50 is completely triazine and formaldehyde free.

▷ FEATURED BENEFITS

- High detergency multi-purpose hard system cleaner
- Low use concentrations ensure low consumption and cost effectiveness
- Balanced detergency/surfactant package providing added cleaning power beyond normal high alkaline system cleaners
- Safe on all metals
- Safely and effectively dislodges and removes both inorganic, organic, and biological residues and deposits
- Balanced corrosion inhibitor regime for all metals
- Bio-dispersant component for effective removal of biological contaminants
- Moderate alkalinity with use pH range of 9.00-9.50

▷ APPROVALS

- Super-compliant for California SCAQMD Rule 1144
- Pratt and Whitney: PMC 1244 Rev. A Cleaner, Metalworking fluid sump

APPLICATION



COMPATIBLE METALS

Steel
Aluminum
Galvanized steel
Painted surfaces

RECOMMENDED OPERATING TEMPERATURE

Ambient

RECOMMENDED DILUTION RANGE

3 – 5% v/v

FOAMING CHARACTERISTICS

Low

RUST PROTECTION

Provides good corrosion protection for machining center tables, fixtures and way covers.





TYPICAL PROPERTIES

| | |
|------------------|---|
| Fluid Type | Alkaline cleaner |
| Appearance | Clear and light amber |
| Odor | Mild |
| Specific Gravity | 1.035 |
| pH (neat) | 10.0 |
| pH (5% dilution) | 9.5 |
| Solubility | Complete in water, forms clear solution |
| Rinsability | Excellent with water |
| VOC, ASTM 1868 | 23.0 grams/liter |

PRODUCT APPLICATION / USAGE

The old metalworking fluid should be drained from the sump or system. Also, attempt to remove all swarf, debris, and dirt from all machine surfaces, transfer lines, floor trenches, filter mechanisms, and the sides of the sump, barge, or mix tank. Failure to do this could result in immediate contamination of the new metalworking fluid immediately after charging. Always use proper personal protective equipment.

The sump or system should then be recharged with water and ALC 50. For systems which are relatively clean, charge the ALC 50 at 2.0% by volume. For dirtier systems, charge between 3.0-5.0% by volume. Hot water should be used if possible, at least for the initial charge. The sump/system should be filled with a sufficient volume of diluted cleaner to reach all system surfaces, so the cleaner volume reaches a fluid level above the level normally maintained for the coolant.

Circulation time will depend upon system size. For individually sumped machines of 100 gallons or less, the cleaner solution should be circulated for at least four to eight hours. For larger systems, especially central systems of 1000 gallons or larger, the cleaner solution should be circulated for at least 24 hours. Attempt to wash or hose down all machine surfaces, floor trenches, transfer lines, and filter mechanisms with the cleaner solution to ensure the effective removal of all dirt, debris, contaminants, and biomass.

ALC 50 may also be added to the contaminated fluid prior to dumping the system. Utilize the same system concentration recommendations as described earlier based upon the degree of system contamination. Also utilize the same circulation parameters as listed above. Follow with an aggressive aqueous rinse. If the rinse water solution exhibits a high degree of contamination, especially biomass, a second cleaning sequence may be necessary.

Contact your Chemtool Incorporated sales engineer for additional technical assistance.

PRODUCT CODE

4101200000

HEALTH AND SAFETY

For health and safety guidance, please refer to the Chemtool SDS (Safety Data Sheets).