

S A F E T Y D A T A S H E E T

SECTION 1 - CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME : BUEHLER MICROPOLISH ALUMINA No.1 ALPHA,
BUEHLERVANGUARD MICROPOLISH ALUMINA #1
IDENTIFICATION NUMBER: 40-6351-006, 63-6351-006
PRODUCT USE/CLASS : Polishing compound

SUPPLIER:

Buehler UK, Ltd.
Saturn Building
101, Lockhurst Lane
Coventry CV6 5SF ENGLAND

Buehler GmbH
In der Steele 2, 40599 Düsseldorf
Postfach 16 03 55, 40599 Düsseldorf

TEL: (+44) (0) 24 7658 2158
FAX: (+44) (0) 24 7658 2159

Telefon: (+49) 0211-974100
Telefax: (+49) 0211-9741079

PREPARER: Technical Department, PHONE: +18472955600, PREPARE DATE: 02/07/01

SECTION 2 - COMPOSITION/INFORMATION ON INGREDIENTS

ITEM	CHEMICAL NAME	CAS NUMBER	WT/WT%
------	---------------	------------	--------

No Hazardous Materials are Contained in this Product

(See Section 16 for abbreviation legend)

SECTION 3 - IDENTIFICATION OF HAZARDS

EMERGENCY OVERVIEW: Not expected to present a hazard in normal professional use.

PRIMARY ROUTE(S) OF ENTRY: Not applicable

SECTION 4 - FIRST AID MEASURES

EYE CONTACT: Immediately flush eyes with plenty of water. Get medical attention if irritation develops or persists.

SKIN CONTACT: Wash with soap and water. Get medical attention if irritation develops or persists.

INHALATION: No specific treatment is necessary since this material is not likely to be hazardous by inhalation. If exposed to excessive levels of dusts or fumes, remove to fresh air and get medical attention if cough or other symptoms develop.

INGESTION: Swallowing less than an ounce will not cause significant harm. For larger amounts, do not induce vomiting, but give one or two glasses of water to drink and get medical attention.

NOTES TO PHYSICIAN: Treat symptomatically.

SECTION 5 - FIRE FIGHTING MEASURES

FLASH POINT: N.A.

LOWER EXPLOSIVE LIMIT: N.A.
UPPER EXPLOSIVE LIMIT: N.A.

AUTOIGNITION TEMPERATURE: N/A

EXTINGUISHING MEDIA: Unknown

UNUSUAL FIRE AND EXPLOSION HAZARDS: Does not burn.

SPECIAL FIREFIGHTING PROCEDURES: Does not burn.

Continued on Page 2)

SECTION 6 - ACCIDENTAL RELEASE MEASURES

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED: Reclaim clean material. Place contaminated material in covered waste container and dispose of in accordance with local and national regulations.

SECTION 7 - HANDLING AND STORAGE

HANDLING: Avoid prolonged or repeated contact with skin. Follow good general industrial safety practices during use and handling. FOR INDUSTRIAL USE ONLY.

STORAGE: Keep from freezing.

SECTION 8 - EXPOSURE CONTROLS/PERSONAL PROTECTION

ENGINEERING CONTROLS: None normally required.

RESPIRATORY PROTECTION: None normally required under good general industrial ventilation.

SKIN PROTECTION: Clean clothing to cover skin. Cloth or synthetic gloves.

EYE PROTECTION: Safety glasses with side shields.

OTHER PROTECTIVE EQUIPMENT: No information.

HYGIENIC PRACTICES: DO NOT reuse empty containers.

SECTION 9 - PHYSICAL AND CHEMICAL PROPERTIES

BOILING RANGE : N.A. VAPOR DENSITY : Is lighter than air
ODOR : None ODOR THRESHOLD : No data
APPEARANCE : Clear EVAPORATION RATE: Is slower than Butyl
SOLUBILITY IN H2O : Appreciable Acetate
FREEZE POINT : No data SPECIFIC GRAVITY: 1.0755
VAPOR PRESSURE : No data pH @ 0.0 % : 6-8
PHYSICAL STATE : Liquid VISCOSITY : Low
COEFFICIENT OF WATER/OIL DISTRIBUTION: No data
(See Section 16 for abbreviation legend)

SECTION 10 - STABILITY AND REACTIVITY

CONDITIONS TO AVOID: No information.

INCOMPATIBILITY: Strong bases or oxidants.

HAZARDOUS DECOMPOSITION PRODUCTS: Oxides of carbon.

HAZARDOUS POLYMERIZATION: Will not occur under normal conditions.

STABILITY: This product is stable under normal storage conditions.

SECTION 11 - TOXICOLOGICAL PROPERTIES

COMPONENT TOXICOLOGICAL INFORMATION: none known
Toxicological Test Data: No information.

Continued on Page 3)

SECTION 11 - TOXICOLOGICAL PROPERTIES

ACUTE EFFECTS - EYE CONTACT: May cause slight irritation.

ACUTE EFFECTS - SKIN CONTACT: Substance may cause slight skin irritation.

ACUTE EFFECTS - INHALATION: Vapours and/or aerosols which may be formed at elevated temperatures may be irritating.

ACUTE EFFECTS - INGESTION: May cause nausea and vomiting. Small amounts (a tablespoonful) swallowed during normal handling operations are not likely to cause injury; swallowing amounts larger than that may cause injury.

CHRONIC OVEREXPOSURE EFFECTS: No information.

SECTION 12 - ECOLOGICAL INFORMATION

ECOLOGICAL TEST DATA: No information.

SECTION 13 - DISPOSAL CONSIDERATIONS

DISPOSAL METHOD: Material as sold may be disposed of in landfill. If material becomes contaminated, follow disposal instructions for contaminant.

SECTION 14 - TRANSPORTATION INFORMATION

DOT PROPER SHIPPING NAME: Not regulated for transport

DOT TECHNICAL NAME: N/A

DOT HAZARD CLASS: N/A

HAZARD SUBCLASS: N/A

DOT UN/NA NUMBER: N/A

PACKING GROUP: N/A

RESP. GUIDE PAGE:

INTERNATIONAL SHIPPING NAME: Not regulated for transport

INTERNATIONAL ID NUMBER: N/A

IMDG CLASS (10,20): N/A

PACKING GROUP: N/A

IMDG EMS: N/A

IATA CLASS (10,20): N/A

SECTION 15 - REGULATORY INFORMATION

CANADIAN WHMIS: This MSDS has been prepared in compliance with Controlled Product Regulations except for use of the 16 headings.

CANADIAN WHMIS CLASS: none

CHIP SUPPLY LABEL RISK PHRASES: None required.

CHIP SUPPLY LABEL SAFETY PHRASES: None required.

CHIP SUPPLY LABEL SYMBOLS: None required.

SECTION 16 - OTHER INFORMATION

PREVIOUS MSDS REVISION DATE: 02/07/01

REASON FOR REVISION: new format

ADMINISTRATIVE REVISION DATE:

REASON FOR ADMINISTRATIVE REVISION:

VOLATILE ORGANIC COMPOUNDS (VOCS): 5 grams/ltr (calculated)

Continued on Page 4)

=====
SECTION 16 - OTHER INFORMATION
=====

LEGEND: N.A. - No information, N.E. - Not Established,
N.D. - Not Determined

ABBREVIATIONS: ACGIH = American Conference of Governmental Industrial Hygienists; UK = United Kingdom; REL = Recommended Exposure Limit; MAK = Maximale Arbetisplatzkonzentration (Maximum Concentration in the Workplace); TLV-TWA = Threshold Limit Value-Time Weighted Average (8 hours); STEL = Short-Term Exposure Limit (15 minutes); C = Ceiling Value; PEL = Permissible Exposure Limit

DISCLAIMER: To the best of our knowledge, the information contained in this MSDS is accurate or is obtained from sources believed to be accurate. However, no liability, expressed or implied, is assumed for the accuracy or completeness of the information contained herein. Buyer assumes liability in its use of the material.

=====
<END OF SDS>