

MATERIAL SAFETY DATA SHEET

I. PRODUCT IDENTIFICATION

Product Name: AMCO 1966A CAS number: N/A - mixture
Chemical Name & Synonyms: N/A - mixture
Appearance: Clear, red liquid with alcohol odor
Use: Canning industry soft soldering flux
Manufacturer: Force Industries Division Tel. 610-647-3575
EMERGENCY PHONE No. CALL CHEMTREC (800) 424-9300 * Available 24 Hours

II. CHEMICAL COMPOSITION

Material	SARA/III	CAS Number	OSHA PEL	ACGIH TLV
Isopropyl alcohol	< 70.0%	67-63-0	1225 mg/m ³	980 mg/m ³
Ammonium chloride	-	12125-02-9	10 mg/m ³	10 mg/m ³
Ammonium hydroxide	<2%	1336-21-6	18 mg/m ³	18 mg/m ³

Others, if any, are non-hazardous and are claimed as trade secret.

Hazard Rating: HMIS: (H =1 F=3 R=0 PE=C) NFPA: (H=1 F=3 R=0)

III. POTENTIAL HEALTH EFFECTS AND HEALTH HAZARD DATA

Target organ statement: **Caution:** strong irritant to skin, eyes, and respiratory system. Dermatitis, and possible burns.

Effects of Chronic Exposure: See "Target Organ" statement

Effects of Acute Overexposure

Swallowing: May cause nausea and diarrhea. Chemical burns to digestive system.

Skin Absorption: None currently known.

Inhalation: Irritant to respiratory system. Inhalation of vapors may result in giddiness, headache, or dizziness. Existing lung disorders will be aggravated.

Skin Contact: May cause chemical burns; dermatitis. Existing skin disorders may be aggravated.

Eye Contact: Irritation to eye surfaces. Possible damage to the eye.

IV. EMERGENCY AND FIRST AID PROCEDURES

Swallowing: Call a physician at once or your Poison Control Center. Do not aspire into lungs; aspiration pneumonitis.

Skin: Wash hands with soap and water to remove all residue. If rash develops, consult a physician.

Inhalation: Remove to fresh air. If fumes are inhaled, call a physician.

Eyes: Flush with water for at least 15 minutes to remove all residue. Get medical help NOW! Blindness can result!

V. FIRE AND EXPLOSION DATA

Flash point (°F): 100°F

Flammable limits in air (% by volume): LOWER: 2.0 as isopropanol UPPER: 12.0 as isopropanol

Extinguishing media: Dry chemical or CO₂

Special fire fighting method: Wear protective clothing

Unusual fire and explosion hazards: None

VI. REACTIVITY INFORMATION

Stability considerations/Conditions to avoid: Stable/Heat, sparks, open flames

Hazardous polymerization/Conditions to avoid: Will not occur/None

Incompatibility/Conditions to avoid: Concentrated acids, oxidizers, and alkalis

Hazardous combustion or Decomposition products: Carbon monoxide and/or carbon dioxide

VII. SPILL AND LEAK RESPONSE

Steps to be taken if material is released or spilled: Contain spill, absorb, sweep-up. Flush area to chemical sewer.

Waste disposal method: Dispose of in accordance with all federal, state, and local regulations.

MATERIAL SAFETY DATA SHEET

VIII. SPECIAL PROTECTION INFORMATION

Respiratory protection: If the workstation is not properly ventilated to exhaust all fumes and dusts, use a NIOSH approved mask.

Ventilation: Maintain airflow away from user to remove all fumes and dusts, so that the PEL is never exceeded.

Protective gloves: Chemical and oil impervious.

Eye protection: Chemical tight safety goggles. Do not wear contact lenses.

Other protective equipment: Full protective equipment normally used in a braze/soldering operation to prevent any contact. Review operations to avoid contact with hazardous gas, liquid or solid. See also:
29 CFR 1910. 132 - 29 CFR 1910. 140. Personal Protective Equipment
29 CFR 1910. 251 - 29 CFR. 257. Welding, Cutting and Brazing

IX. STORAGE, HANDLING AND SPECIAL PRECAUTIONS

Precautions to be taken in handling and storage: Wash hands thoroughly after handling to remove all residues. Store material under ambient conditions. Vent drums occasionally

Other precautions: Remove and professionally wash contaminated clothing before re-use.

X. PHYSICAL AND CHEMICAL PROPERTIES

Boiling Point (°F @ 760 mmHg):	205	Specific gravity (H ₂ O = 1 @ 72°F):	0.872
Vapor density (air = 1):	1.710	Vapor pressure:	23.06
Percent volatiles by volume:	66.0	Solubility in water:	Complete
Evaporation rate (butyl acetate = 1):	>1(1.88)		

XI. OPTIONAL INFORMATION

Department of Transportation: DOMESTIC GROUND

Proper shipping name: Flammable Liquids, N.O.S. (Isopropyl Alcohol, Ammonium Hydroxide)

Hazard Class: 3

ID & Packing Group Number: UN 1993, PG III

ERG Guide Number: 128

Toxic Substance Control Act: All components of this compound are listed within the TSCA inventory.

SARA Title III Program: This product contains the following toxic chemicals subject to the reporting requirements of EPCRA of 1986 and 40 CFR 372. This information must be included in all MSDS that are copied and distributed for this material.

Chemical Name	CAS No.	Concentration
Isopropyl alcohol	67-63-0	<70%

Hazard Communication Program: Hazardous warnings and training requirements as mandated for flammable liquids.

State Right-to-Know Programs:

Pennsylvania: This product contains the following chemicals listed in PA Code Title 34, Hazardous Substance List: Isopropyl alcohol

California: This product contains the following compounds subject to the reporting and labeling requirements of Proposition 65: None

Miscellaneous: This product contains the following marine pollutants listed under 49 CFR 172.101 Appendix B: None

NOTES: NA=Not Applicable
H=Health

NE=Not Established
F=Fire R=Reactivity PE=Personal Equipment

While we believe all information presented herein is accurate and reliable, the data are not to be taken as a guarantee or representation of any kind for which Force Industries assumes legal responsibility. They are offered solely for your consideration, investigation, and verification.