

Handy Flo 718 and DF 718

Material Safety Data Sheet

1. Product And Company Identification

Supplier

Lucas-Milhaupt, Inc.
A Handy & Harman Company
5656 South Pennsylvania Avenue
Cudahy, WI 53110
Telephone Number: 414-769-6000
FAX Number: 414-769-1093

Supplier Emergency Contacts & Phone Number

Chemtrec: (800) 424-9300

Manufacturer

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A Handy & Harman Company
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Manufacturer Emergency Contacts & Phone Number

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Issue Date: 11/26/2007
Product Name: Handy Flo 718 and DF 718
CAS Number: Not Established
MSDS Number: 364
Product Code: 83-718

2. Composition/Information On Ingredients

Ingredient Name - (CAS Number) - %

Petroleum distillates (C12-C15), hydrotreated light (64742-47-8)
Petroleum naphtha (C11-C12), hydrotreated heavy (64742-48-9)
Trisodium aluminum fluoride (15096-52-3)
Zinc chloride (7646-85-7)

No Data Available...

3. Hazards Identification

----- Primary Routes(s) Of Entry

Ingestion; inhalation.

Eye Hazards

This product can cause eye irritation, or eye injury upon prolonged contact.

Skin Hazards

This product can produce irritation, particularly on abraded skin. Prolonged exposure may cause dermatitis.

Ingestion Hazards

Some components of this product are potentially toxic if ingested, causing one or more of the following symptoms and effects: nausea, vomiting, cramps, diarrhea, abdominal pain, tachycardia, gastrointestinal irritation, central nervous system depression, convulsions, and coma.

Inhalation Hazards

Inhalation of the components of this product is not known to pose a significant risk to health when used according to instructions and with appropriate protective measures (see Section #8). Inhalation of the certain components has been reported to cause one or more of the following symptoms and/or effects upon excessively high or prolonged exposure:

Acute exposure: Irritation to the nose, throat, and respiratory tract; cough, nausea, vomiting, chills, fever, tearing, ulceration of mucous membranes, pneumonitis, and pulmonary edema.

Chronic exposure: Abdominal pain and cramps, liver and kidney damage, impaired pulmonary function, and fluorosis (a disease characterized by mottled teeth, osteosclerosis, and pain and loss of mobility in joints).

4. First Aid Measures

Eye

Flush affected areas with water for at least fifteen minutes. Seek medical assistance if necessary.

Skin

Remove contaminated clothing. Wash affected area with large quantities of water for at least five minutes. Seek medical attention if necessary. Launder or dry-clean clothing before reuse.

Ingestion

Do not induce vomiting. If conscious, give the subject large quantities of milk or other liquid. Seek immediate medical assistance. Do not attempt to give anything by mouth to an unconscious or convulsive person.

Inhalation

If signs and symptoms of toxicity are observed, remove subject from area, administer oxygen, and seek medical attention. Keep the subject warm and at rest. Perform artificial respiration if breathing has stopped.

Note To Physician

The inorganic fluoride component may be harmful. Its concentration in the product is <100 gm/kg. Treat fluoride intoxication symptomatically. Intoxication may occur by ingestion and/or inhalation. No components are absorbed through the skin, although the component zinc chloride can cause burns or irritation.

5. Fire Fighting Measures

Flash Point: >129 °F >54 °C

Flash Point Method: ASTM D56
Autoignition Point: >475 °F >246 °C
Flammability Class: II
Lower Explosive Limit: ca. 0.7
Upper Explosive Limit: ca. 5.3
Fire And Explosion Hazards

This product may ignite if exposed to flame or in contact with incompatible materials (see Section #10). If it is present in a fire or explosion, hazardous decomposition byproducts may include aluminum oxide, zinc oxide, gaseous and particulate fluorides, hydrogen chloride, carbon monoxide, smoke, and irritant combustion byproducts.

Extinguishing Media

Use dry chemical, foam, or carbon dioxide. Do not use water.

Fire Fighting Instructions

If fighting a fire in which this product is present, wear a self-contained breathing apparatus with full facepiece operated in pressure-demand or other positive pressure mode.

6. Accidental Release Measures

Eliminate sources of ignition. Isolate spilled material and transfer to impervious containers. Avoid contact with skin, eyes, and mucous membranes. Wear appropriate protective equipment (e.g., gloves, chemical goggles) during cleanup and disposal.

7. Handling And Storage

Handling Precautions

No special handling precautions are required.

Storage Precautions

Store in a cool, dry place, away from sources of ignition and incompatible materials (see Section #10).

Work/Hygienic Practices

To minimize possible ingestion, wash hands and face before eating, drinking, or using cosmetics or tobacco.

8. Exposure Controls/Personal Protection

----- Engineering Controls

Use appropriate ventilation (e.g., dilution, local exhaust) adequate to maintain concentrations of all components to within their applicable standards.

Eye/Face Protection

Wear eye protection adequate to prevent eye contact with this product and eye injury from the hazards of brazing. Plastic-frame spectacles with side shields and filter lenses (shade #3 or #4) are recommended.

Skin Protection

Wear appropriate protective gloves and clothing to prevent skin injuries from brazing and from skin contact with this product. Avoid flammable fabrics.

Respiratory Protection

If an exposure level exceeds an applicable exposure standard, wear a NIOSH-approved respirator having a configuration (type of facepiece, filter media, assigned protection factor, etc.) appropriate to the concentration of the contaminant(s) generated. For guidance on selection and use of respiratory protection, consult American National Standard Z88.2 (ANSI, New York, NY 10036 USA).

Ingredient(s) - Exposure Limits

Petroleum distillates (C12-C15), hydrotreated light
ACGIH TLV: 300 ppm TWA (TLV for VM&P Naphtha as guideline)
OSHA PEL: 500 ppm TWA
Petroleum naphtha (C11-C12), hydrotreated heavy
ACGIH TLV: 300 ppm TWA (recommended by manufacturer)
OSHA PEL: 500 ppm TWA (as petroleum distillates)

Trisodium aluminum fluoride

ACGIH TLVs: 2 mg/m3 TWA (as Al); 2.5 mg/m3 TWA (as F-)

OSHA PEL: 2.5 mg/m3 TWA (F-)

Zinc chloride

ACGIH TLVs: 1 mg/m3 TWA; 2 mg/m3 STEL

OSHA PEL: 1 mg/m3 TWA

9. Physical And Chemical Properties

Appearance

White paste, mineral spirits odor.

Chemical Type: Mixture

Physical State: Solid

Boiling Point: >345 °F >174 °C

Percent Volatiles: <45

Percent VOCs: 0.00

Vapor Pressure: <10 mm Hg

Solubility: partial

Evaporation Rate: <0.1 (n-Butyl Acetate = 1)

10. Stability And Reactivity

Stability: stable

Hazardous Polymerization: will not occur

Conditions To Avoid (Stability)

Some components of this product may decompose at elevated temperatures.

Incompatible Materials

Acetic anhydride; alkali and alkali earth metals; zirconium; sulfuric acid; bromine trifluoride; potassium permanganate.

Hazardous Decomposition Products

Aluminum and zinc oxides, gaseous and particulate fluorides, carbon monoxide, hydrogen chloride, smoke, and irritant decomposition byproducts.

11. Toxicological Information

----- Chronic/Carcinogenicity -----

None of the components are classified as potential or demonstrated carcinogens by IARC, NTP, or OSHA.

Mutagenicity (Genetic Effects) -----

Inorganic fluoride compounds have been demonstrated to induce mutagenic changes in mammalian cell in culture. The significance of these findings to human health risks is unknown.

Conditions Aggravated By Overexposure -----

Pre-existing pulmonary diseases (e.g., bronchitis, asthma) may be aggravated by inhalation overexposure to the components or decomposition byproducts of this product. Inhalation may aggravate diseases of the liver, kidneys, and skeletal, cardiovascular, central nervous, and gastrointestinal systems.

Ingredient(s) - Toxicological Data -----

Petroleum distillates (C12-C15), hydrotreated light

LD50: >5,000 mg/kg (oral/rat) LC50: >5,200 mg/m3 for 4 hrs (rat)

Petroleum naphtha (C11-C12), hydrotreated heavy

LD50: >5,000 mg/kg (oral/rat) LC50: >12,000 mg/m3 for 6 hrs (rat)

Trisodium aluminum fluoride

LD50: >5,000 mg/kg (oral/rat) LC50: No data available

Zinc chloride

LD50: 350 mg/kg (oral/rat) LC50: No data available

12. Ecological Information

In their intended manner of use, these products should not be released into the environment, and adverse effects on ecosystems are not anticipated under recommended conditions of use, storage, and disposal.

13. Disposal Considerations

Dispose of unused or unusable product in accordance with all Federal, State/Provincial, and local regulations.

14. Transport Information

Proper Shipping Name

Zinc chloride, anhydrous mixture

Hazard Class

8 (Packing Group III)

DOT Identification Number

UN2331

DOT Shipping Label

CORROSIVE

15. Regulatory Information

SARA Hazard Classes

Acute Health Hazard; Chronic Health Hazard; Fire Hazard

SARA Section 313 Notification

This product contains no ingredients in concentrations greater than 1% (for carcinogens 0.1%) that are regulated under Section 313 of the Emergency Planning and Community Right-To-Know Act of 1986 or 40 CFR 372.

Canadian Regulatory Information

WHMIS Class(es) and Division(s): B3, D1B, D2B, E
Components on Ingredients Disclosure List:
1. Fluoride compounds, inorganic, n.o.s.
2. Zinc chloride (CASRN 7646-85-7)

16. Other Information

----- Revision/Preparer Information -----

This MSDS Supersedes A Previous MSDS Dated: 04/05/2001

Disclaimer -----

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Lucas-Milhaupt, Inc.