

1. Identification

Product name RENOFORM MAC 68/33

Other means of identification No data available.

Recommended use: Metalworking fluid

Restrictions on use: Industrial use only

Manufacturer/Importer/Supplier/Distributor Information

Manufacturer

Company Name: Fuchs Lubricants Co. Address: 17050 Lathrop Avenue

Harvey, Illinois 60426

Telephone: 708-333-8900 Fax: 708-333-9180

Contact Person: EHS Department E-mail: msds@fuchs.com

Emergency telephone number: 708-333-8900 (Bus. hrs) 800-255-3924 (24 hrs)

2. Hazard(s) identification

Hazard Classification

Physical Hazards

Flammable liquids Category 3

Health Hazards

Aspiration Hazard Category 1

Label Elements

Hazard Symbol:



Signal Word: Danger

Hazard Statement: Flammable liquid and vapor.

May be fatal if swallowed and enters airways.



Precautionary Statement

Prevention: Keep away from heat, hot surfaces, sparks, open flames and other ignition

sources. No smoking. Keep container tightly closed. Ground/bond container

and receiving equipment. Use explosion-proof

electrical/ventilating/lighting/equipment. Use only non-sparking tools. Take

precautionary measures against static discharge. Wear protective

gloves/protective clothing/eye protection/face protection.

Response: IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse

skin with water/shower. IF SWALLOWED: Immediately call a POISON CENTER/doctor. Do NOT induce vomiting. In case of fire: Use CO2, dry

chemical, or foam to extinguish.

Storage: Store in well-ventilated place. Keep cool. Store locked up.

Disposal: Dispose of contents/container to an appropriate treatment and disposal

facility in accordance with applicable laws and regulations, and product

characteristics at time of disposal.

Other hazards which do not result in GHS classification:

None.

Unknown toxicity Health

Acute toxicity, oral 0 %
Acute toxicity, dermal 0 %
Acute toxicity, inhalation, vapor 93.6 %
Acute toxicity, inhalation, dust 93.6 %

or mist

3. Composition/information on ingredients

Hazardous Component(s):

Chemical name	CAS-No.	Concentration
Mineral spirits	Confidential	60 - 100%

Specific chemical identities and/or exact percentages have been withheld as trade secrets.

4. First-aid measures

Ingestion: Call a physician or poison control center immediately. Rinse mouth. Never

give liquid to an unconscious person. If vomiting occurs, keep head low so

that stomach content doesn't get into the lungs.

Inhalation: Move to fresh air. Call a Poison Center or doctor if you feel unwell.



Skin Contact: Remove contaminated/saturated clothing and shoes. Wash contact areas

with soap and water. If skin irritation occurs: Get medical advice/attention.

Eye contact: Flush thoroughly with water. If irritation occurs, get medical assistance.

Continue to rinse for at least 15 minutes.

Most important symptoms/effects, acute and delayed

Symptoms: No data available.

Indication of immediate medical attention and special treatment needed

Treatment: Get medical attention as appropriate or if symptoms persist.

5. Fire-fighting measures

General Fire Hazards: Use water spray to keep fire-exposed containers cool. Water may be

ineffective in fighting the fire. Fight fire from a protected location. Move

containers from fire area if you can do so without risk.

Suitable (and unsuitable) extinguishing media

Suitable extinguishing

media:

Water spray, fog, CO2, dry chemical, or regular foam. Use fire-extinguishing media appropriate for surrounding materials.

Unsuitable extinguishing

media:

Avoid water in straight hose stream as this will scatter and spread fire.

Specific hazards arising from

the chemical:

Vapors may travel considerable distance to a source of ignition and flash back. Vapors may cause a flash fire or ignite explosively. Prevent buildup of

vapors or gases to explosive concentrations.

Special protective equipment and precautions for firefighters

Special fire fighting

procedures:

No data available.

Special protective equipment

for fire-fighters:

Firefighters must use standard protective equipment appropriate for

industrial fires.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures: Ventilate closed spaces before entering them. ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area). Keep upwind. Keep unauthorized personnel away. Ensure adequate ventilation. See Section 8 of the SDS for Personal Protective Equipment. Do not handle damaged containers or spilled material unless wearing appropriate protective clothing.



Methods and material for containment and cleaning

Absorb spill with an inert material, then place in a container for safe and proper disposal. Eliminate all ignition sources if safe to do so. Dike far ahead of larger spill for later recovery and disposal. Use only non-sparking tools.

Environmental Precautions:

Do not contaminate water sources or sewer. Prevent further leakage or spillage if safe to do so and protect against releases into the environment. Remediate as appropriate.

7. Handling and storage

Precautions for safe handling:

End-users should follow industry best practices for handling and using this product.

Guidance may be found using the current version of ASTM Standard E1497-05: Standard Practice for Selection and Safe Use of Water-Miscible and Straight Oil Metal Removal Fluids

Observe good industrial hygiene practices. Wear appropriate personal protective equipment. Do not expose to intense heat as product may expand and pressurize container. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Ground/bond container and receiving equipment. Take precautionary measures against static discharges.

Conditions for safe storage, including any incompatibilities:

Store locked up. Store in a well-ventilated place. Store in a cool place. Flammable liquid storage.

8. Exposure controls/personal protection

Exposure Limits

Chemical name	type	Exposure Limit Values		Source
Mineral spirits	PEL	100 ppm	400 mg/m3	US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000) (02 2006)

Protective Measures: Use explosion-proof ventilation equipment. Good general ventilation should be

provided. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable

level.

Respiratory Protection: In case of inadequate ventilation use suitable respirator. Seek advice from

supervisor on the company's respiratory protection standards.

Eye Protection: Wear safety glasses with side shields (or goggles).



Skin and Body Protection: Wear chemical-resistant gloves, footwear, and protective clothing appropriate

for the risk of exposure. Contact health and safety professional or manufacturer

for specific information.

Hygiene measures: Always observe good personal hygiene measures, such as washing after

handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing to remove contaminants. Contaminated work clothing should not be allowed out of the workplace. Discard contaminated footwear that

cannot be cleaned. Avoid contact with skin, eyes, and clothing.

9. Physical and chemical properties

Appearance

Physical state: Liquid

Form: No data available.

Color: Yellow

Odor: Characteristic

Odor threshold:

pH:

No data available.

No data available.

Melting point/freezing point:

No data available.

No data available.

Initial boiling point and boiling range:

No data available.

Flash Point: 48.89 °C (120.00 °F)

Evaporation rate:No data available. **Flammability (solid, gas):**No data available.

Upper/lower limit on flammability or explosive limits

Flammability limit - upper (%): No data available.

Flammability limit - lower (%): No data available.

Explosive limit - upper (%):

No data available.

Explosive limit - lower (%):

Vapor pressure:

No data available.

No data available.

Vapor density:

No data available.

Relative density: 0.78

Solubility(ies)

Solubility in water: Insoluble

Solubility (other):

Partition coefficient (n-octanol/water):

Auto-ignition temperature:

No data available.

No data available.

Decomposition temperature:No data available.

Viscosity: < 10 mm2/s (40 °C, Measured)



10. Stability and reactivity

Reactivity: Not reactive during normal use.

Chemical Stability: Material is stable under normal conditions.

Possibility of Hazardous

Reactions:

None under normal conditions.

Conditions to Avoid: Heat, sparks, flames.

Incompatible Materials: No data available.

Hazardous Decomposition

Products:

Thermal decomposition or combustion may liberate carbon oxides and

other toxic gases or vapors.

11. Toxicological information

Information on likely routes of exposure

Ingestion: Harmful if swallowed.

Inhalation: Harmful if inhaled.

Skin Contact: Prolonged skin contact may cause redness and irritation.

Eye contact: Eye contact is possible and should be avoided.

Symptoms related to the physical, chemical and toxicological characteristics

Ingestion: No data available.

Inhalation: No data available.

Skin Contact: No data available.

Eye contact: No data available.

Information on toxicological effects

Acute toxicity (list all possible routes of exposure)

Oral

Product: ATEmix (): > 5000 mg/kg

Dermal

Product:

Not classified for acute toxicity based on available data.

Inhalation

Product: Not classified for acute toxicity based on available data.



Repeated dose toxicity

Product: No data available.

Skin Corrosion/Irritation

Product: No data available.

Serious Eye Damage/Eye Irritation

Product: No data available.

Respiratory or Skin Sensitization

Product: No data available.

Carcinogenicity

Product: No data available.

IARC Monographs on the Evaluation of Carcinogenic Risks to Humans:

No carcinogenic components identified

US. National Toxicology Program (NTP) Report on Carcinogens:

No carcinogenic components identified

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050):

No carcinogenic components identified

Germ Cell Mutagenicity

In vitro

Product: No data available.

In vivo

Product: No data available.

Reproductive toxicity

Product: No data available.

Specific Target Organ Toxicity - Single Exposure
Product:
No data available.

Specific Target Organ Toxicity - Repeated Exposure

Product: No data available.

Aspiration Hazard

Product: May be fatal if swallowed and enters airways.

Other effects: No data available.



12. Ecological information

General information: This product has not been evaluated for ecological toxicity or other

environmental effects.

13. Disposal considerations

Disposal instructions: Discharge, treatment, or disposal may be subject to national, state, or local

laws. Dispose of waste at an appropriate treatment and disposal facility in

accordance with applicable laws and regulations, and product

characteristics at time of disposal. It is the responsibility of the product user or owner to determine at the time of disposal, which waste regulations must

be applied.

Contaminated Packaging: Empty containers should be taken to an approved waste handling site for

recycling or disposal.

14. Transport information

DOT

UN Number: UN 1993

UN Proper Shipping Name: Flammable liquids, n.o.s.(Petroleum distillates)

Transport Hazard Class(es)

Class: 3
Label(s): 3
Packing Group: III
Marine Pollutant: No

Special precautions for user: –

IMDG

UN Number: UN 1993

UN Proper Shipping Name: FLAMMABLE LIQUID, N.O.S.(Petroleum distillates)

Transport Hazard Class(es)

Class: 3 Label(s): 3

EmS No.: F-E, S-E

Packing Group:

Marine Pollutant: Not regulated.

Special precautions for user: -

Cargo aircraft only: Allowed.

15. Regulatory information

US Federal Regulations



US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

None present or none present in regulated quantities.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories

Fire Hazard
Immediate (Acute) Health Hazards

SARA 313 (TRI Reporting)

None present or none present in regulated quantities.

US State Regulations

US. California Proposition 65

No component is regulated by CA Prop 65.

16.Other information, including date of preparation or last revision

Issue Date: 12.05.2015

Revision Date: 12.05.2015

Version #: 1.0

Further Information: No data available.

Disclaimer: This information is provided without warranty. The information is believed

to be correct. This information should be used to make an independent determination of the methods to safeguard workers and the environment.