SAFETY DATA SHEET

Revision Date 18-Jun-2015 **Version** 3

1. IDENTIFICATION

Product identifier
Product Name VERSACHEM PLASTIC TANK & RADIATOR REPAIR KIT (HARDENER)

Other means of identification
Product Code 90214V
Synonyms None

Recommended use of the chemical and restrictions on use
Recommended Use Epoxy curing agent
Uses advised against No information available

Details of the supplier of the safety data sheet

Manufacturer Address
ITW Permatex
10 Columbus Blvd.
Hartford, CT 06106 USA

Distributor
ITW Permatex Canada
35 Brownridge Road, Unit 1
Halton Hills, ON Canada L7G 0C6
Telephone: (800) 924-6994

Company Phone Number 1-87-Permatex
(877) 376-2839

24 Hour Emergency Phone Number Chem-Tel: 800-255-3924
International Emergency:
00+1+ 813-248-0585
Contract Number: MIS0003453

E-mail address mail@permatex.com

2. HAZARDS IDENTIFICATION

Classification

OSHA Regulatory Status
This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

Skin corrosion/irritation	Category 2
Serious eye damage/eye irritation	Category 2A

Label elements

Emergency Overview

Warning

Causes skin irritation
Causes serious eye irritation

Appearance Yellow | Physical state Liquid | Odor Mercaptan

Precautionary Statements - Prevention
Wash face, hands and any exposed skin thoroughly after handling
Wear eye/face protection

Precautionary Statements - Response
Specific treatment (see supplemental first aid instructions on this label)
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing
If eye irritation persists: Get medical advice/attention
IF ON SKIN: Wash with plenty of soap and water
If skin irritation occurs: Get medical advice/attention
Take off contaminated clothing and wash before reuse

Precautionary Statements - Disposal
Dispose of contents/container to an approved waste disposal plant

Hazards not otherwise classified (HNOC)
Not applicable

Other Information
- Not applicable

Unknown acute toxicity — 100 % of the mixture consists of ingredient(s) of unknown toxicity

3. COMPOSITION/INFORMATION ON INGREDIENTS

substance(s)

Chemical Name	CAS No	Weight-%	Trade Secret
MERCAPTAN AMINE BLEND (TSRN 679485-6533P)	–	60 - 100	*

*The exact percentage (concentration) of composition has been withheld as a trade secret.

4. FIRST AID MEASURES

Description of first aid measures

General advice — Get medical advice/attention if you feel unwell.

Eye contact — IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.

Skin contact — IF ON SKIN:. Wash skin with soap and water. If skin irritation persists, call a physician. Wash contaminated clothing before reuse.

Inhalation — IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. If symptoms persist, call a physician.

Ingestion	IF SWALLOWED:. Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Call a physician.
Self-protection of the first aider	Use personal protective equipment as required.

Most important symptoms and effects, both acute and delayed

Symptoms	See section 2 for more information.

Indication of any immediate medical attention and special treatment needed

Note to physicians	Treat symptomatically.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media
Carbon dioxide (CO2), Dry chemical, Foam

Unsuitable extinguishing media
Do not use a solid water stream as it may scatter and spread fire.

Specific hazards arising from the chemical
None in particular.

Explosion data

Sensitivity to Mechanical Impact	None.
Sensitivity to Static Discharge	None.

Protective equipment and precautions for firefighters
As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions	Ensure adequate ventilation, especially in confined areas. Avoid contact with eyes and skin. Use personal protective equipment as required.

Environmental precautions

Environmental precautions	Do not flush into surface water or sanitary sewer system. Prevent further leakage or spillage if safe to do so. Prevent product from entering drains.

Methods and material for containment and cleaning up

Methods for containment	Prevent further leakage or spillage if safe to do so.
Methods for cleaning up	Ensure adequate ventilation. Soak up with inert absorbent material. Sweep up and shovel into suitable containers for disposal.
Prevention of secondary hazards	Clean contaminated objects and areas thoroughly observing environmental regulations.

7. HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling	Handle in accordance with good industrial hygiene and safety practice. Avoid breathing vapors or mists. Avoid contact with skin, eyes or clothing. Wash thoroughly after handling. Wash contaminated clothing before reuse. Use personal protective equipment as required.

Conditions for safe storage, including any incompatibilities

Storage Conditions	Keep containers tightly closed in a dry, cool and well-ventilated place.
Incompatible materials	Strong oxidizing agents, Acids, Alkalis

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Appropriate engineering controls

Engineering Controls	Showers Eyewash stations Ventilation systems

Individual protection measures, such as personal protective equipment

Eye/face protection	Wear safety glasses with side shields (or goggles).
Skin and body protection	Wear protective gloves and protective clothing.
Respiratory protection	Use NIOSH-approved air-purifying respirator with organic vapor cartridge or canister, as appropriate.
General Hygiene Considerations	Handle in accordance with good industrial hygiene and safety practice. Regular cleaning of equipment, work area and clothing is recommended.

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Physical state	Liquid
Appearance	Yellow
Odor	Mercaptan
Odor threshold	No information available

Property	Values	Remarks • Method
pH	No information available	
Melting point / freezing point	No information available	
Boiling point / boiling range	Not Applicable	
Flash point	> 93 °C / > 200 °F	Pensky-Martens Closed Cup (PMCC)
Evaporation rate	No information available	
Flammability (solid, gas)	No information available	
Flammability Limit in Air		
Upper flammability limit:	No information available	
Lower flammability limit:	No information available	
Vapor pressure	No information available	
Vapor density	No information available	
Relative density	1.13	
Water solubility	Insoluble in water	
Solubility in other solvents	No information available	
Partition coefficient	No information available	
Autoignition temperature	No information available	
Decomposition temperature	No information available	
Kinematic viscosity	No information available	
Dynamic viscosity	No information available	
Explosive properties	No information available	
Oxidizing properties	No information available	

Other Information

Softening point	No information available
Molecular weight	No information available
VOC Content (%)	0
Density	No information available
Bulk density	No information available

10. STABILITY AND REACTIVITY

Reactivity
No data available

Chemical stability
Stable under recommended storage conditions.

Possibility of Hazardous Reactions
None under normal processing.

Conditions to avoid
Excessive heat.

Incompatible materials
Strong oxidizing agents, Acids, Alkalis

Hazardous Decomposition Products
Carbon oxides
Nitrogen oxides (NOx)
Oxides of sulfur
Hydrogen sulfide

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

Inhalation	May cause irritation of respiratory tract.
Eye contact	Contact with eyes may cause irritation. May cause redness and tearing of the eyes.
Skin contact	May cause skin irritation and/or dermatitis.
Ingestion	Ingestion may cause irritation to mucous membranes.

Information on toxicological effects

Symptoms	No information available.

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Sensitization	No information available.
Germ cell mutagenicity	No information available.
Carcinogenicity	No information available.

12. ECOLOGICAL INFORMATION

Ecotoxicity

100 % of the mixture consists of components(s) of unknown hazards to the aquatic environment

Persistence and degradability
No information available.

Bioaccumulation
No information available.

Mobility
No information available.

Other adverse effects
No information available

13. DISPOSAL CONSIDERATIONS

Waste treatment methods

Disposal of wastes	Disposal should be in accordance with applicable regional, national and local laws and regulations.
Contaminated packaging	Do not reuse container.
US EPA Waste Number	Not applicable

14. TRANSPORT INFORMATION

DOT

Proper shipping name:	Not regulated

IATA

UN/ID no	3334
Proper shipping name:	Aviation regulated liquid, n.o.s, (Mercaptan mixture), Limited Quantity (LQ)
Hazard Class	9
Packing Group	III
ERG Code	9A

IMDG

Proper shipping name:	Not regulated

15. REGULATORY INFORMATION

International Inventories

TSCA	Complies
DSL/NDSL	Complies
EINECS/ELINCS	Not determined
ENCS	Not determined
IECSC	Not determined
KECL	Not determined
PICCS	Not determined
AICS	Not determined

Legend:
TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List
EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances
ENCS - Japan Existing and New Chemical Substances
IECSC - China Inventory of Existing Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances
PICCS - Philippines Inventory of Chemicals and Chemical Substances
AICS - Australian Inventory of Chemical Substances

US Federal Regulations

SARA 313
Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

SARA 311/312 Hazard Categories

Acute health hazard	Yes
Chronic Health Hazard	No
Fire hazard	No
Sudden release of pressure hazard	No
Reactive Hazard	No

CWA (Clean Water Act)
This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

CERCLA
This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material

US State Regulations

California Proposition 65
This product does not contain any Proposition 65 chemicals

U.S. State Right-to-Know Regulations

U.S. EPA Label Information
EPA Pesticide Registration Number Not applicable

NFPA	**Health hazards** 2	**Flammability** 1	**Instability** 0	-
HMIS	**Health hazards** 2	**Flammability** 1	**Physical hazards** 0	**Personal protection** B

NFPA (National Fire Protection Association)
HMIS (Hazardous Material Information System)

Revision Date 18-Jun-2015

Disclaimer
The information provided in this Material Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

End of Safety Data Sheet

SAFETY DATA SHEET

Revision Date 18-Jun-2015 **Version** 1

1. IDENTIFICATION

Product identifier
Product Name VERSACHEM PLASTIC TANK & RADIATOR REPAIR KIT (RESIN)

Other means of identification
Product Code 90214
Synonyms None

Recommended use of the chemical and restrictions on use
Recommended Use (Epoxy resin)
Uses advised against No information available

Details of the supplier of the safety data sheet

Manufacturer Address
ITW Permatex
10 Columbus Blvd.
Hartford, CT 06106 USA

Distributor
ITW Permatex Canada
35 Brownridge Road, Unit 1
Halton Hills, ON Canada L7G 0C6
Telephone: (800) 924-6994

Company Phone Number 1-87-Permatex
(877) 376-2839
24 Hour Emergency Phone Number Chem-Tel: 800-255-3924
International Emergency:
00+1+ 813-248-0585
Contract Number: MIS0003453

E-mail address mail@permatex.com

2. HAZARDS IDENTIFICATION

Classification

OSHA Regulatory Status
This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

Skin sensitization	Category 1
Carcinogenicity	Category 2

Label elements

Emergency Overview

Warning

May cause an allergic skin reaction
Suspected of causing cancer

Appearance Black | Physical state Viscous liquid | Odor Mild

Precautionary Statements - Prevention
Obtain special instructions before use
Do not handle until all safety precautions have been read and understood
Use personal protective equipment as required
Avoid breathing dust/fume/gas/mist/vapors/spray
Contaminated work clothing should not be allowed out of the workplace
Wear protective gloves

Precautionary Statements - Response
IF exposed or concerned: Get medical advice/attention
Specific treatment (see supplemental first aid instructions on this label)
IF ON SKIN: Wash with plenty of soap and water
If skin irritation or rash occurs: Get medical advice/attention
Wash contaminated clothing before reuse

Precautionary Statements - Storage
Store locked up

Precautionary Statements - Disposal
Dispose of contents/container to an approved waste disposal plant

Hazards not otherwise classified (HNOC)
Not applicable

Other Information
- Harmful to aquatic life with long lasting effects

Unknown acute toxicity 96.31 % of the mixture consists of ingredient(s) of unknown toxicity

3. COMPOSITION/INFORMATION ON INGREDIENTS

substance(s)

Chemical Name	CAS No	Weight-%	Trade Secret
EPOXY RESIN (EPICHLOROHYDRIN, BISPHENOL A)	25085-99-8	60 - 100	*
BISPHENOL A/EPICHLOROHYDRIN BASED EPOXY RESIN	25068-38-6	1 - 5	*
CARBON BLACK	1333-86-4	0.1 - 1	*

*The exact percentage (concentration) of composition has been withheld as a trade secret.

4. FIRST AID MEASURES

Description of first aid measures

General advice Get medical advice/attention if you feel unwell.

Eye contact	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.
Skin contact	IF ON SKIN:. Wash with soap and water. If skin irritation or rash occurs: Get medical advice/attention. Wash contaminated clothing before reuse.
Inhalation	IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. If symptoms persist, call a physician.
Ingestion	IF SWALLOWED:. Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Call a physician.
Self-protection of the first aider	Use personal protective equipment as required. Avoid contact with skin, eyes or clothing.

Most important symptoms and effects, both acute and delayed

Symptoms	See section 2 for more information.

Indication of any immediate medical attention and special treatment needed

Note to physicians	Treat symptomatically.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media
Carbon dioxide (CO2), Dry chemical, Foam

Unsuitable extinguishing media
None.

Specific hazards arising from the chemical
None in particular.

Explosion data

Sensitivity to Mechanical Impact	None.
Sensitivity to Static Discharge	None.

Protective equipment and precautions for firefighters
As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions	Ensure adequate ventilation, especially in confined areas. Avoid contact with eyes and skin. Use personal protective equipment as required.

Environmental precautions

Environmental precautions	See Section 12 for additional ecological information.

Methods and material for containment and cleaning up

Methods for containment	Prevent further leakage or spillage if safe to do so.
Methods for cleaning up	Ensure adequate ventilation. Soak up with inert absorbent material. Sweep up and shovel into suitable containers for disposal.
Prevention of secondary hazards	Clean contaminated objects and areas thoroughly observing environmental regulations.

7. HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice. Avoid breathing vapors or mists. Avoid contact with skin, eyes or clothing. Wash thoroughly after handling. Wash contaminated clothing before reuse. Use personal protective equipment as required.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep container tightly closed in a dry and well-ventilated place. Store locked up.

Incompatible materials Strong oxidizing agents, Bases, Acids, Amines

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure Guidelines

Chemical Name	ACGIH TLV	OSHA PEL	NIOSH IDLH
CARBON BLACK 1333-86-4	TWA: 3 mg/m³ inhalable fraction	TWA: 3.5 mg/m³ (vacated) TWA: 3.5 mg/m³	IDLH: 1750 mg/m³ TWA: 3.5 mg/m³ TWA: 0.1 mg/m³ Carbon black in presence of Polycyclic aromatic hydrocarbons PAH

NIOSH IDLH Immediately Dangerous to Life or Health

Other Information Vacated limits revoked by the Court of Appeals decision in AFL-CIO v. OSHA, 965 F.2d 962 (11th Cir., 1992).

Appropriate engineering controls

Engineering Controls Showers
Eyewash stations
Ventilation systems

Individual protection measures, such as personal protective equipment

Eye/face protection Wear safety glasses with side shields (or goggles).

Skin and body protection Wear protective gloves and protective clothing.

Respiratory protection Use NIOSH-approved air-purifying respirator with organic vapor cartridge or canister, as appropriate.

General Hygiene Considerations Handle in accordance with good industrial hygiene and safety practice. Regular cleaning of equipment, work area and clothing is recommended.

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Physical state Viscous liquid
Appearance Black
Odor Mild
Odor threshold No information available

Property	Values	Remarks • Method
pH	No information available	

Melting point / freezing point	No information available	
Boiling point / boiling range	No information available	
Flash point	> 204 °C / > 400 °F	
Evaporation rate	No information available	
Flammability (solid, gas)	No information available	
Flammability Limit in Air		
Upper flammability limit:	No information available	
Lower flammability limit:	No information available	
Vapor pressure	0.03 mmHg	
Vapor density	>1	Air = 1
Relative density	1.16	
Water solubility	Negligible	
Solubility in other solvents	No information available	
Partition coefficient	No information available	
Autoignition temperature	No information available	
Decomposition temperature	No information available	
Kinematic viscosity	No information available	
Dynamic viscosity	No information available	
Explosive properties	No information available	
Oxidizing properties	No information available	

Other Information

Softening point	No information available
Molecular weight	No information available
VOC Content (%)	0
Density	No information available
Bulk density	No information available

10. STABILITY AND REACTIVITY

Reactivity
No data available

Chemical stability
Stable under recommended storage conditions.

Possibility of Hazardous Reactions
None under normal processing.

Conditions to avoid
Excessive heat.

Incompatible materials
Strong oxidizing agents, Bases, Acids, Amines

Hazardous Decomposition Products
Carbon oxides
Phenols

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

Inhalation	May cause irritation of respiratory tract.
Eye contact	Contact with eyes may cause irritation. May cause redness and tearing of the eyes.
Skin contact	May cause skin irritation and/or dermatitis. May cause sensitization by skin contact.
Ingestion	Ingestion may cause irritation to mucous membranes.

Chemical Name	Oral LD50	Dermal LD50	Inhalation LC50
BISPHENOL A/EPICHLOROHYDRIN BASED EPOXY RESIN 25068-38-6	= 11400 mg/kg (Rat)	-	-
CARBON BLACK 1333-86-4	> 15400 mg/kg (Rat)	> 3 g/kg (Rabbit)	-

Information on toxicological effects

Symptoms No information available.

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Sensitization No information available.
Germ cell mutagenicity No information available.
Carcinogenicity The table below indicates whether each agency has listed any ingredient as a carcinogen.

Chemical Name	ACGIH	IARC	NTP	OSHA
CARBON BLACK 1333-86-4	A3	Group 2B	-	X

ACGIH (American Conference of Governmental Industrial Hygienists)
A3 - Animal Carcinogen
IARC (International Agency for Research on Cancer)
Group 2B - Possibly Carcinogenic to Humans
OSHA (Occupational Safety and Health Administration of the US Department of Labor)
X - Present

The following values are calculated based on chapter 3.1 of the GHS document .
ATEmix (oral) 16286 mg/kg

12. ECOLOGICAL INFORMATION

Ecotoxicity

97.417 % of the mixture consists of components(s) of unknown hazards to the aquatic environment

Chemical Name	Algae/aquatic plants	Fish	Crustacea
CARBON BLACK 1333-86-4	-	-	5600: 24 h Daphnia magna mg/L EC50

Persistence and degradability
No information available.

Bioaccumulation
No information available.

Mobility
No information available.

Other adverse effects
No information available

13. DISPOSAL CONSIDERATIONS

Waste treatment methods

Disposal of wastes Disposal should be in accordance with applicable regional, national and local laws and regulations.

Contaminated packaging Do not reuse container.

US EPA Waste Number	Not applicable

14. TRANSPORT INFORMATION

DOT

Proper shipping name:	Not regulated

IATA

UN/ID no	3082
Proper shipping name:	Environmentally hazardous substances, liquid, n.o.s, (Epoxy resin), Limited Quantity (LQ)
Hazard Class	9
Packing Group	III
ERG Code	E1

IMDG

UN/ID no	3082
Proper shipping name:	Environmentally hazardous substances, liquid, n.o.s, (Epoxy resin), Limited Quantity (LQ)
Hazard Class	9
Packing Group	III
EmS-No	F-A, S-F

15. REGULATORY INFORMATION

International Inventories

TSCA	Complies
DSL/NDSL	Complies
EINECS/ELINCS	Not Listed.
ENCS	Complies
IECSC	Complies
KECL	Complies
PICCS	Complies
AICS	Complies

Legend:

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List
EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances
ENCS - Japan Existing and New Chemical Substances
IECSC - China Inventory of Existing Chemical Substances
KECL - Korean Existing and Evaluated Chemical Substances
PICCS - Philippines Inventory of Chemicals and Chemical Substances
AICS - Australian Inventory of Chemical Substances

US Federal Regulations

SARA 313

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

SARA 311/312 Hazard Categories

Acute health hazard	Yes
Chronic Health Hazard	No
Fire hazard	No
Sudden release of pressure hazard	No
Reactive Hazard	No

CWA (Clean Water Act)
This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

CERCLA
This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material

US State Regulations

California Proposition 65
This product contains the following Proposition 65 chemicals

Chemical Name	California Proposition 65
CARBON BLACK - 1333-86-4	Carcinogen

U.S. State Right-to-Know Regulations

Chemical Name	New Jersey	Massachusetts	Pennsylvania
CARBON BLACK 1333-86-4	X	X	X

U.S. EPA Label Information
EPA Pesticide Registration Number Not applicable

NFPA	Health hazards 2	Flammability 1	Instability 0	-
HMIS	Health hazards 2	Flammability 1	Physical hazards 0	Personal protection B

NFPA (National Fire Protection Association)
HMIS (Hazardous Material Information System)

Revision Date 18-Jun-2015

Disclaimer
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End of Safety Data Sheet

Material Safety Data Sheet

MSDS: 308

SECTION 1: CHEMICAL PRODUCT AND COMPANY INFORMATION

Company:
IDQ Operating, Inc.
2901 W Kingsley Rd.
Garland, Texas 75041
Phone No.: 1-888-396-0422
CHEMTREC Phone No.: 1-800-424-9300

HAZARD RATING		*SCALE*
Health	1	*0 = Insignificant*
Fire:	0	*1 = Slight*
Reactivity:	0	*2 = Moderate*
Special:	--	*3= High*
Toxicity:	*1*	*4 = Extreme*

Product Description: Automotive Refrigerant with Leak Sealer

Name: 308 R134A Refrigerant with Stop Leak (standard package contains 12.3 Fl Oz)

Product Code: 308

MSDS Date: 9-22-2009

SECTION 2: COMPOSITION AND INFORMATION ON INGREDIENTS

No.	Description	CAS Reg. No.	Units	Amount
1	1,1,1,2-Tetrafluoroethane	811-97-2	% vol	80-97
2	Cyclohexanone	108-94-1	% vol	0-0.99
3	Methylene Chloride	75-09-02	% vol	0-0.99
4	Other Chloride Content		% vol	0-0.01
5	Proprietary Ingredients		% vol	0-3

SECTION 3: HAZARDS INFORMATION

Portals of Entry: Inhalation, ingestion, eye contact, skin contact, and dermal absorption.

Inhalation: Inhalation of high vapor concentrations can cause anesthetic effects including dizziness, weakness, nausea, and unconsciousness. It can act as an asphyxiant by limiting available oxygen. Very high doses can cause abnormal heart rhythm which is potentially fatal. Breathing high concentration vapors or prolonged breathing vapors can cause irritation of the nose, throat, and lungs as well as headaches, drowsiness, and fatigue. Extreme inhalation can cause loss of coordination and unconsciousness.

Eye Contact: Liquid splashes or vapor spray may cause freeze burns. Vapors can cause eye irritation.

Skin Contact: Vapor spray can cause freeze burns. Product can cause eye irritations.

Ingestion: Most of the product is a gas at Standard Temperature and Pressure (STP) which would not allow much of the product to be ingested. The liquid material at STP could cause nausea, gastrointestinal disturbances, headaches, drowsiness, vertigo, and dizziness.

Delayed Effects: Prolonged and repeated overexposure can cause irritation of the respiratory tract and mucous membranes, and kidney effects.

HEALTH EFFECTS FROM OVEREXPOSURE:

Primary Routes of Exposure: Skin and inhalation.

SECTION 4: FIRST AID MEASURES

Inhalation: Inhalation under normal exposure should not cause problems; however if inhalation has resulted in symptoms, move patient to fresh air. If breathing is difficult, give oxygen. Give artificial respiration if breathing has stopped. Get prompt medical attention.

Eye Contact: Immediately flush eyes with a large amount of water for at least 15 minutes. If symptoms exist and/or persist, get prompt medical attention.

Skin Contact: Wash affected skin areas thoroughly with soap and water. Remove contaminated clothing. If skin irritation persists, see a physician.

Ingestion: If swallowed, give large quantities of water to drink. Induce vomiting. Careful gastric lavage may be indicated. Immediately see a physician. Never give anything by mouth nor induce vomiting of an unconscious person.

SECTION 5: FIRE FIGHTING MEASURES

Unusual Hazards: Toxic fumes are generated when material is exposed to fire and fire conditions.

Extinguishing Agents: Use the following extinguishing media when fighting fires involving this material: polar solvent foam, carbon dioxide, dry chemical, and water spray.

Personal Protective Equipment: Wear self-contained breathing apparatus and full protective gear.

Special Precautions: Use water spray to cool large containers exposed to fire. Vapors are denser than air and will have a tendency to accumulate in lower areas which can cause the vapors to concentrate and suffocate. The relatively small part of the product that is liquid at STP can be flammable. If the product's liquid portion is exposed to fire, extinguish with polar solvent foam, carbon dioxide, dry chemical, and water spray.

FIRE AND EXPLOSIVE PROPERTIES:

Flash Point (°C):	Non-Flammable at STP
Auto-Ignition Temperature (°C):	>350
Lower Explosive Limit (°C):	Non-Flammable at STP
Upper Explosive Limit (°C):	Non-Flammable at STP

SECTION 6: ACCIDENTAL SPILL OR LEAK RELEASE INFORMATION

Personal Protection: Appropriate protective equipment must be worn when handling a large spill of this material. See the PERSONAL PROTECTION MEASURES Section for recommendations. If exposed to material during clean-up operations, see the FIRST AID PROCEDURES Section for actions to follow.

Procedures: Evacuate the spill area. Floor may be slippery if non-volatile components in product (< 3 % volume) have wetted the floor; use care to avoid falling. Ventilate the spill area. Avoid breathing vapor. Contain non-volatile material spills immediately with inert adsorption materials. Transfer liquids and solid adsorption materials and diking material to separate suitable containers for recovery or disposal.

CAUTION: Keep spills and cleaning runoff out of municipal sewers and open bodies of water.

SECTION 7: HANDLING AND STORAGE

Storage Conditions: Store in a cool, well ventilated place. Keep containers dry. Store product away from reactive and corrosive materials. The minimum recommended storage temperature for this material is -29° C/ -20° F. The maximum storage temperature is 49° C/ 120° F.

Handling Procedures: Avoid causing and inhaling high concentrations of vapor. The vapor concentration levels in air need to be keep below occupational exposure limits and keep as low as practicable. Do not mix product with air or oxygen under pressure. Avoid exposure of product to flame or very hot surfaces. Vapors can be evolved when material is being used in processing operations. See FACILITY CONTROL MEASURES Section for types of ventilation required.

SECTION 8: EXPOSURE CONTROLS AND PERSONAL PROTECTION

Respiratory Protection: A respiratory protection program meeting OSHA 1910.134 and ANSI Z88.2 requirements must be followed whenever workplace conditions warrant a respirator's use. If respiratory protection is needed, use, MSHA-NIOSH approved respirator for organic vapors. None required if airborne concentrations are maintained below the TWA/TLV's listed in the COMPONENT EXPOSURE INFORMATION Section.

Up to 10 times the TWA/TLV: Wear a half-mask, air purifying respirator.

Up to 1000 ppm organic vapor: Wear an approved full-face piece, air-purifying respirator.

Above 1000 ppm organic vapor or unknown: Wear an approved positive pressure mode, or an approved full-face piece airline respirator in the positive pressure mode with emergency escape provisions.

Air purifying respirators should be equipped with organic vapor cartridges.

Eye Protection: Use eye goggles and/or face shield.

Hand Protection: The gloves listed below may provide protection against permeation. Gloves of other chemically resistant materials may not provide adequate protection: Polyvinyl alcohol and Viton.

Gloves should be removed and replaced immediately if there is any indication of degradation or chemical breakthrough.

Other Protection: Use chemically resistant apron or other impervious clothing to avoid prolonged or repeated skin contact.

FACILITY CONTROL MEASURES:

Ventilation: Use normal local exhaust ventilation with a minimum capture velocity of 100 ft/min (0.5 m/sec) at the point of vapor evolution.

Other Protective Equipment: Facilities storing and utilizing this material should be equipped with an eyewash facility and a safety shower.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

TYPICAL PHYSICAL PROPERTIES:

PROPERTY	METRIC UNITS	ENGLISH UNITS
Appearance:	Product in Aerosol Container	Product in Aerosol Container
Color:	Colorless	Colorless
State:	Liquid under Gas Pressure	Liquid under Gas Pressure
Odor Characteristics:	Ethereal	Ethereal
Viscosity (CP @ 20° C); [CP @ 68° F]:	20	20
Specific Gravity (d/do 4°C); [d/do 39°F]	1.225	1.225
Vapor Density (Air = 1.0):	3.3	3.3
Vapor Pressure (mm Hg @ 20° C); [psia]:	4268	85.6
Melting Point (°C); [°F]:	Extremely Low; < -26 °C	Extremely Low; < -15 °F
Boiling Point (°C); [°F]:	-26.5	-15.7
Solubility in Water (gr/100 cm^3); [lb/100 in^3]:	0; Non-soluble	0; Non-soluble
Evaporation Rate (n-butyl acetate = 1.0):	> 120	> 120
pH (product or water extract)	< 7	< 7
Percent Volatility (% wt):	97	97

SECTION 10: STABILITY AND REACTIVITY

Stability: Stable under normal conditions.

Hazardous Decomposition Products: Thermal decomposition may yield toxic decomposition products which include alkyl low molecular weight components, organic chlorides, COx, SOx, NOx, POx, hydrochloric acid, hydrofluoric acid, organic pyrolytic components, and phosgene.

Hazardous Polymerization: Product will not undergo polymerization.

Incompatibility: Avoid contact with strong oxidizing and reducing agents, fine particulate metals, magnesium and alloy containing more than 2 percent magnesium. Product can react under certain conditions with alkali or alkali earth metals such as sodium, potassium or barium and other Group IA and IIA of the Periodic Table of Elements.

SECTION 11: TOXICOLOGICAL INFORMATION

ACCIDENT PREVENTION INFORMATION:

COMPONENT EXPOSURE INFORMATION:

Component Information:

No.	Description	CAS Reg. No.	Units	Amount	Max. Amount % Wt.
1	1,1,1,2-Tetrafluoroethane	811-97-2	% vol	80-97	97
2	Cyclohexanone	108-94-1	% vol	0-1.5	0.99
3	Methylene Chloride	75-09-02	% vol	0-3	0.99
4	Other Chloride Content		ppm	100	0.01
5	Proprietary Ingredients		% vol	0-3	3

Exposure Information for Specific Component:

	Health	Flammable	Component	OSHA		ACGIH			
No.	Rating	Rating	Units	TWA	STEL	TWA	STEL	IDLH	HAP
1	1	0	ppm	1000	NA	NA	NA	NA	No
2	2	2	ppm	50	75	25	NA	NA	No
3	2	0	ppm	100	NA	50	NA	NA	Yes
4	2	0	ppm	100	NA	50	NA	NA	Yes
5	1	0	ppm	NA	NA	NA	NA	NA	No

NA: Not Available; ppm: parts per million

Note: 1 ppm equals 3.8 mg/m^3; 5 ppm equals 19 mg/m^3; 10 ppm equals 38 mg/m^3; 100 ppm equals 380 mg/m^3.

SECTION 12: ECOLOGICAL INFORMATION

Persistence and Degradation: Decomposes comparatively rapidly in the lower atmosphere (troposphere). Atmospheric lifetime is 15.6 years. Products of decomposition will be highly dispersed and hence will have a very low concentration. It is not a significant contributor to photochemical smog and is not considered to be a VOC. It is not considered as an ozone depleting chemical.

SECTION 13: DISPOSAL INFORMATION

WASTE DISPOSAL:

Procedure: For disposal, dispose this material at a facility that complies with local, state, and federal regulations.

SECTION 14: TRANSPORTATION INFORMATION

DOT Hazard Description:

Proper Shipping Name: CONSUMER COMMODITY
Hazard Class: NA
Identification Number: NA
Packing Group: NA
Hazardous Substance (RQ): NA

SECTION 15: REGULATORY INFORMATION

EPA Regulation:
SARA SECTION 311/312 HAZARDS: Acute Health, Chronic Health

All components of this product are on the TSCA list.

SARA Title III Section 313 Supplier Notification: This product contains the indicated "*" toxic chemical(s) subjecdt to the reporting requirements of Section 313 of the Emergency Planning and Community Right-To-Know Act of 1986 and of 40 CFR 372. This information must be included in all MSDSs that are copied and distributed for this material.

SARA TITLE III INGREDIENTS	CAS NO.	% WT.	REGULATION SECTION	RQ (LBS)
*Methylene Chloride	75-09-2	0.99	311, 312, 313, RCRA	1000
Cyclohexanone	108-94-1	0.99	311, 312, RCRA	5000

If 101,000 lbs of this product is in one container the Reportable Quantity "RQ" of Methylene Chloride is exceeded. Typically this product is packaged in 12.3 fl oz containers.

State Regulations: This product meets requirements of Southern California AQMD Rule 443.1 and Similar Regulations California Proposition 65: This product contains the following chemical known to the State of California to cause cancer: Methylene Chloride < 1%.

SECTION 16: OTHER INFORMATION

All information, recommendations, and suggestions made by IDQ Operating, Inc. ("Company") appearing herein concerning our product are based upon tests and data believed to be reliable. However, because of the variable characteristics of analytical procedures and samples, and the inability to control its customers' uses of the information and recommendations, or the related products or materials, Company makes NO WARRANTY, EXPRESS OR IMPLIED as to the accuracy of the information or recommendations or that such are fit for any general or specific purpose, whatsoever. Company shall have NO LIABILITY arising from the use by its customers or any third parties of the information and recommendations, and it shall be each customer's sole responsibility to determine the suitability for its own use of any information or recommendations provided by Company.

Material Safety Data Sheet

MSDS: ACP-102CA

SECTION 1: CHEMICAL PRODUCT AND COMPANY INFORMATION

Company:
IDQ Operating, Inc.
2901 W Kingsley Rd.
Garland, Texas 75041
Phone No.: 1-888-318-5454
CHEMTREC Phone No.: 1-800-424-9300

HAZARD RATING		*SCALE*
Health	1	*0 = Insignificant*
Fire:	1	*1 = Slight*
Reactivity:	0	*2 = Moderate*
Special:	--	*3= High*
Toxicity:	*1*	*4 = Extreme*

Product Description: AC PRO R-134a Professional Refrigerant Formula.

Part Number: ACP-102CA

MSDS Date: 10/21/2011

SECTION 2: COMPOSITION AND INFORMATION ON INGREDIENTS

No.	Description	CAS Reg. No.	Units	Amount
1	1,1,1,2-Tetrafluoroethane	811-97-2	% weight	80-90
2	Polyalkylene glycol monobutyl ether	N/A	% weight	1-5
3	Additive Package	NA	% weight	10-15
4	Leak Sealer	NA	% weight	0-1

SECTION 3: HAZARDS INFORMATION

Portals of Entry: Inhalation, ingestion, eye contact, skin contact, and dermal absorption.

Inhalation: Inhalation of high vapor concentrations can cause anesthetic effects including dizziness, weakness, nausea, and unconsciousness. It can act as an asphyxiant by limiting available oxygen. Very high doses can cause abnormal heart rhythm which is potentially fatal. Breathing high concentration vapors or prolonged breathing vapors can cause irritation of the nose, throat, mucous membranes, and lungs as well as headaches, drowsiness, and fatigue. Extreme inhalation can cause loss of coordination and unconsciousness.

Eye Contact: Liquid splashes may cause eye irritation. Vapor spray may cause freeze burns. Vapors can cause eye irritation.

Skin Contact: Vapor spray can cause freeze burns. Product can cause skin irritations, dermatitis, defatting of skin, adsorption of certain components in product.

Ingestion: A large percentage of the product is a gas at Standard Temperature and Pressure (STP) which would not allow much of the product to be ingested. The liquid material at STP, if ingested, could cause nausea, gastrointestinal disturbances, headaches, drowsiness, vertigo, gastrointestinal disturbance, abdominal pain, and dizziness.

Delayed Effects: Prolonged and repeated overexposure can cause irritation of the respiratory tract and mucous membranes, central nervous system (CNS) effects, blood dysfunction, and kidney effects.

HEALTH EFFECTS FROM OVEREXPOSURE:

Primary Routes of Exposure: Skin and inhalation.

SECTION 4: FIRST AID MEASURES

Inhalation: Inhalation under normal exposure should not cause problems; however if inhalation has resulted in symptoms, move patient to fresh air. If breathing is difficult, give oxygen. Give artificial respiration if breathing has stopped. Get prompt medical attention.

Eye Contact: Immediately flush eyes with a large amount of water for at least 15 minutes. If symptoms exist and/or persist, get prompt medical attention.

Skin Contact: Wash affected skin areas thoroughly with soap and water. Remove contaminated clothing. If skin irritation persists, see a physician.

Ingestion: If swallowed, give large quantities of water to drink. Induce vomiting. Careful gastric lavage may be indicated. Immediately see a physician. Never give anything by mouth nor induce vomiting of an unconscious person.

SECTION 5: FIRE FIGHTING MEASURES

Unusual Hazards: Toxic fumes are generated when material is exposed to fire and fire conditions.

Extinguishing Agents: Use the following extinguishing media when fighting fires involving this material: polar solvent foam, carbon dioxide, dry chemical, and water spray.

Personal Protective Equipment: Wear self-contained breathing apparatus and full protective gear.

Special Precautions: Use water spray to cool large containers exposed to fire. Vapors are denser than air and will have a tendency to accumulate in lower areas which can cause the vapors to concentrate and suffocate. The much reduced part of the product that is liquid at STP can be flammable. If the product's liquid portion is exposed to fire or an ignition source that results in flammability, extinguish with polar solvent foam, carbon dioxide, dry chemical, and water spray. The product is typically packaged in 12 oz cans, which aids in isolating product for flammability but creates problems if the pressurized cans are exposed to fire or excessive heat that could result in sudden can rupture.

FIRE AND EXPLOSIVE PROPERTIES:

PROPERTY	PACKAGED PRODUCT	LIQUID PORTION OF PRODUCT
Flash Point (°C); [°F]:	Non-Flammable at STP	204; 399*
Auto-Ignition Temperature (°C):	>400	>400
Lower Explosive Limit (ppm):	Non-Flammable at STP	11,000
Upper Explosive Limit (ppm):	Non-Flammable at STP	94,000

*: Initially the liquid portion of product at STP is Non-Flammable. As the liquid components evaporate they are Non-Flammable, however, the final volatile fraction, which constitutes a very low concentration of the formula (<1%), will be slightly flammable with a relatively high flash point being 11° C or 51° F. After this final volatile component has volatilized, the remaining liquid is Non-Flammable being combustible at ~ 204° C; 399° F.

SECTION 6: ACCIDENTAL SPILL OR LEAK RELEASE INFORMATION

Personal Protection: Appropriate protective equipment must be worn when handling a large spill of this material. See the PERSONAL PROTECTION MEASURES Section for recommendations. If exposed to material during clean-up operations, see the FIRST AID PROCEDURES Section for actions to follow.

Procedures: Evacuate the spill area. Floor may be slippery if non-volatile components in product (~ 16 % volume) have wetted the floor; use care to avoid falling. Ventilate the spill area. Avoid breathing vapor. Contain non-volatile material spills immediately with inert adsorption materials. Transfer liquids and solid adsorption materials and diking material to separate suitable containers for recovery or disposal.

CAUTION: Keep spills and cleaning runoff out of municipal sewers and open bodies of water.

SECTION 7: HANDLING AND STORAGE

Storage Conditions: Store in a cool, well ventilated place. Keep containers dry. Store product away from reactive and corrosive materials. The minimum recommended storage temperature for this material is -29° C/ -20° F. The maximum storage temperature is 49° C/ 120° F.

Handling Procedures: Avoid causing and inhaling high concentrations of vapor. The vapor concentration levels in air need to be keep below occupational exposure limits and keep as low as practicable. Do not mix product with air or oxygen under pressure. Avoid exposure of product to flame or very hot surfaces. Vapors can be evolved when material is being used in processing operations. See FACILITY CONTROL MEASURES Section for types of ventilation required.

SECTION 8: EXPOSURE CONTROLS AND PERSONAL PROTECTION

Respiratory Protection: A respiratory protection program meeting OSHA 1910.134 and ANSI Z88.2 requirements must be followed whenever workplace conditions warrant a respirator's use. If respiratory protection is needed, use, MSHA-NIOSH approved respirator for organic vapors. None required if airborne concentrations are maintained below the TWA/TLV's listed in the COMPONENT EXPOSURE INFORMATION Section.

Up to 10 times the TWA/TLV: Wear a half-mask, air purifying respirator.

Up to 1000 ppm organic vapor: Wear an approved full-face piece, air-purifying respirator.

Above 1000 ppm organic vapor or unknown: Wear an approved positive pressure mode, or an approved full-face piece airline respirator in the positive pressure mode with emergency escape provisions.

Air purifying respirators should be equipped with organic vapor cartridges.

Eye Protection: Use eye goggles and/or face shield.

Hand Protection: The gloves listed below may provide protection against permeation. Gloves of other chemically resistant materials may not provide adequate protection: Polyvinyl alcohol and Viton.

Gloves should be removed and replaced immediately if there is any indication of degradation or chemical breakthrough.

Other Protection: Use chemically resistant apron or other impervious clothing to avoid prolonged or repeated skin contact.

FACILITY CONTROL MEASURES:

Ventilation: Use normal local exhaust ventilation with a minimum capture velocity of 100 ft/min (30 m/min) at the point of vapor evolution.

Other Protective Equipment: Facilities storing and utilizing this material should be equipped with an eyewash facility and a safety shower.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

TYPICAL PHYSICAL PROPERTIES:

PROPERTY	METRIC UNITS	ENGLISH UNITS
Appearance:	Product in Aerosol Container	Product in Aerosol Container
Color:	Clear	Clear
State:	Liquid under Gas Pressure	Liquid under Gas Pressure
Odor Characteristics:	Ethereal	Ethereal
Viscosity (CP @ 20° C); [CP @ 68° F]:	N/A	N/A
Specific Gravity (d/do 4°C); [d/do 39°F]	N/A	N/A
Density (gr/cm³); [lb/gal]	N/A	N/A
Vapor Density (Air = 1.0):	3.5	3.5
Vapor Pressure (mm Hg @ 20° C); [psia]:	4277	85.8
Melting Point (°C); [°F]:	Extremely Low; < -26 °C	Extremely Low; < -15 °F
Boiling Point (°C); [°F]:	-26.5	-15.7
Solubility in Water (gr/100 cm³); [lb/100 in³]:	<15%	<15%
Evaporation Rate (n-butyl acetate = 1.0):	> 1	> 1
pH (product or water extract)	< 7	< 7
Percent Volatility (% wt):	83	83

SECTION 10: STABILITY AND REACTIVITY

Stability: Stable under normal conditions.

Hazardous Decomposition Products: Thermal decomposition may yield toxic decomposition products which include alkyl low molecular weight components, organic chlorides, COx, SOx, NOx, POx, hydrochloric acid, hydrofluoric acid, organic pyrolytic components, and phosgene.

Hazardous Polymerization: Product will not undergo polymerization.

Incompatibility: Avoid contact with strong oxidizing and reducing agents, fine particulate metals, magnesium and alloy containing more than 2 percent magnesium. Product can react under certain conditions with alkali or alkali earth metals such as sodium, potassium or barium and other Group IA and IIA of the Periodic Table of Elements.

SECTION 11: TOXICOLOGICAL INFORMATION

COMPONENT EXPOSURE INFORMATION:

No.	Description	CAS Reg. No.	Units	Max Amount
1	1,1,1,2-Tetrafluoroethane	811-97-2	% weight	85
2	Polyalkylene glycol monobutyl ether	N/A	% weight	1
3	Additive Package	NA	% weight	15
4	Leak Sealer	NA	% weight	1

Exposure Information for Specific Component:

	Health	Flam.	Reactivity	Component	OSHA		ACGIH			
No.	Rating	Rating	Rating	Units	TWA	STEL	TWA	STEL	IDLH	HAP
1	1	0	0	ppm	1000	NA	NA	NA	NA	No
2	1	1	0	ppm	NA	NA	NA	NA	NA	No
3	2	2	0	ppm	NA	NA	NA	NA	NA	No
4	2	0	1	ppm	75	150	50	75	5,000	Yes

NA: Not Available/Non Hazardous; ppm: parts per million

Note: 1 ppm equals 3.8 mg/m³; 5 ppm equals 19 mg/m³; 10 ppm equals 38 mg/m³; 100 ppm equals 380 mg/m³.

SECTION 12: ECOLOGICAL INFORMATION

Persistence and Degradation: Decomposes comparatively rapidly in the lower atmosphere (troposphere). Atmospheric lifetime is 15.6 years. Products of decomposition will be highly dispersed and hence will have a very low concentration. It is not a significant contributor to photochemical smog and is not considered to be a VOC. It is not considered as an ozone depleting chemical.

SECTION 13: DISPOSAL INFORMATION

WASTE DISPOSAL: *For disposal, dispose this material at a facility that complies with local, state, and federal regulations.*

SECTION 14: TRANSPORTATION INFORMATION

DOT Hazard Description:

Proper Shipping Name: CONSUMER COMMODITY
Hazard Class: ORM-D
Identification Number: NA
Packing Group: NA
Hazardous Substance (RQ): NA

SECTION 15: REGULATORY INFORMATION

EPA Regulation:
SARA SECTION 311/312 HAZARDS: Acute Health, Chronic Health

All components of this product are on the TSCA list.

SARA Title III Section 313 Supplier Notification: This product contains the indicated "*" toxic chemical(s) subject to the reporting requirements of Section 313 of the Emergency Planning and Community Right-To-Know Act of 1986 and of 40 CFR 372. This information must be included in all MSDSs that are copied and distributed for this material.

SARA TITLE III INGREDIENTS	CAS NO.	% WT.	REGULATION SECTION	RQ (LBS)
*Methylene Chloride	75-09-2	0.5	311, 312, 313, RCRA	1000

If > 266,000 canisters of this product are in one container the Reportable Quantity "RQ" of Methylene Chloride is exceeded. Based on the composition of SARA Title III ingredients and the RQs of ingredients, listed above, Methylene Chloride is the most restrictive of the product composition. Typically this product is packaged in 12 oz containers.

State Regulations: This product meets requirements of Southern California AQMD Rule 443.1 and Similar Regulations California Proposition 65: This product contains the following chemical known to the State of California to cause cancer: Methylene Chloride < 0.5%

SECTION 16: OTHER INFORMATION

All information, recommendations, and suggestions made by IDQ, Inc. ("Company") appearing herein concerning our product are based upon tests and data believed to be reliable. However, because of the variable characteristics of analytical procedures and samples, and the inability to control its customers' uses of the information and recommendations, or the related products or materials, Company makes NO WARRANTY, EXPRESS OR IMPLIED as to the accuracy of the information or recommendations or that such are fit for any general or specific purpose, whatsoever. Company shall have NO LIABILITY arising from the use by its customers or any third parties of the information and recommendations, and it shall be each customer's sole responsibility to determine the suitability for its own use of any information or recommendations provided by Company.

Safety Data Sheet

IDQ Operating, Inc.
44 Old Ridgebury Road
Suite 300
Danbury, CT 06810
Tel. 1-203-205-2900

1. Product And Company Identification

Product Name: IDQ ACP-105

Responsible Party: IDQ Operating, Inc.
44 Old Ridgebury Road
Suite 300
Danbury, CT 06810

Information Phone Number: +1 203-205-2900
Emergency Phone Number:
For Medical Emergencies, call 1-866-949-6465 / +1 303-389-1332 (Outside US and Canada)
For Transportation Emergencies, call 1-800-424-9300 (Chemtrec) +1-703-527-3887 for Outside US and Canada (call collect)
SDS Date Of Preparation: 05/25/2015
Product Use and Uses Advised Against: Automotive maintenance product – For consumer and professional use

2. Hazards Identification

Note: This product is a consumer product and is labeled in accordance with the Consumer Product Safety Commission regulations and not OSHA regulations. The requirements for the labeling of consumer products take precedence over OSHA labeling so the actual product label will not contain the OSHA label elements shown below on this SDS.

GHS Classification:

Physical:	Health:
Gases Under Pressure: Compressed Gas	Carcinogen Category 1B Simple Asphyxiant

GHS Label Elements:

Danger!

Statements of Hazard	Prevention
Contains gas under pressure; may explode if heated. May cause cancer. Simple Asphyxiant: May displace oxygen and cause rapid suffocation.	Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Wear protective gloves. IF exposed or concerned: Get medical attention. Store locked up. Protect from sunlight. Do not exposure to temperatures exceeding 50°C / 122°F.

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	Dispose of contents and container in accordance with local and national regulations.

3. Composition/Information On Ingredients

Component	CAS No.	Amount
1,1,1,2-tetrafluoroethane	811-97-2	80-85%
Polyalkylene glycol monobutyl ether	Proprietary	15-20%
Methylene chloride	75-09-2	<1%

The exact concentrations are a trade secret.

4. First Aid Measures

Inhalation: If symptoms of exposure develop, remove to fresh air. Seek medical attention if breathing problem or irritation persists.

Skin Contact: Wash exposed skin with soap and water. If skin irritation or redness develops, seek medical attention.

Eye Contact: Flush eyes with large amounts of water for several minutes. If irritation or other symptoms develop, seek medical attention.

Ingestion: Ingestion is an unlikely route exposure for aerosol products.

Most Important Symptoms: May cause mild eye and skin irritation. Mists may cause mild respiratory irritation. Exposure to high concentrations can induce anesthetic effects progressing from dizziness, weakness, nausea, to unconsciousness. May cause cancer.

Indication of Immediate Medical Attention/Special Treatment: None known.

5. Firefighting Measures

Suitable (and Unsuitable) Extinguishing Media: Use extinguishing media suitable for surrounding fire. Cool fire exposed containers with water.

Specific Hazards Arising from the Chemical: Contents under pressure. Exposure of containers to heat and flames can cause them to rupture often with violent force. Burning may produce oxides of carbon and fluoride; and hydrogen fluoride.

Special Fire Fighting Procedures: Firefighters should always wear positive pressure self-contained breathing apparatus and full protective clothing. Cool fire-exposed containers with water. Use shielding to protect against bursting cans.

6: Accidental Release Measures

Personal Precautions, Protective Equipment, and Emergency Procedures: Ventilate the area. Wear appropriate protective clothing and equipment.

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44 Old Ridgebury Road
Suite 300
Danbury, CT 06810
Tel. 1-203-205-2900

Methods and Materials for Containment and Clean-Up: Place leaking can in a pail in a well-ventilated area until pressure has dissipated. Collect residual liquid using inert absorbents and place into a suitable container for disposal.

Environmental Precautions: Report release as required by local and national regulations.

7. Handling and Storage

Precautions for Safe Handling: Avoid contact with eyes and skin. Avoid breathing aerosol or gas. Use only with adequate ventilation. Wash thoroughly with soap and water after handling. Contents under pressure, do not puncture or incinerate containers. Refer to OSHA 1910.1052 (methylene chloride standard) for additional requirements.

Conditions for Safe Storage, Including any Incompatibilities: Store in a cool, well-ventilated area, away from incompatible materials. Do not store in direct sunlight or above 120°F.

8. Exposure Controls / Personal Protection

Exposure Guidelines:

CHEMICAL	EXPOSURE LIMIT
1,1,1,2-tetrafluoroethane	1000 ppm TWA AIHA WEELs
Polyalkylene glycol monobutyl ether	None established
Methylene chloride	50 ppm TWA ACGIH TLV 25 ppm TWA, 125 STEL OSHA PEL

Appropriate Engineering Controls: General ventilation should be adequate for normal use. For operations where the exposure limits may be exceeded, forced ventilation such as local exhaust may be needed to maintain exposures below applicable limits.

Personal Protective Equipment

Respiratory Protection: None under normal use conditions. For operations where the exposure limits may be exceeded, a NIOSH approved supplied air respirators recommended. Equipment selection depends on contaminant type and concentration. Select in accordance with 29 CFR 1910.134 and 1910.1052; all applicable laws and regulations; and good industrial hygiene practice.

Gloves: Wear impervious gloves to avoid skin contact.

Eye Protection: Safety glasses are recommended if eye contact is possible.

Other Protective Equipment/Clothing: None required.

9. Physical and Chemical Properties

Appearance And Odor: Light amber liquid in aerosol can with ethereal odor.

Physical State: Liquid-based aerosol	**Odor Threshold:** Not available
pH: < 7	**Specific Gravity:** Not determined

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44 Old Ridgebury Road
Suite 300
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Tel. 1-203-205-2900

Initial Boiling Point/Range: -26.5°C @ 736 mm Hg (1,1,1,2-tetrafluoroethane)	**Vapor Pressure:** 4277 mm Hg at 20°C
Melting/Freezing Point: -15.7 °F (<-26.5°C)	**Vapor Density:** (Air = 1) 3.5
Solubility In Water: Water solubility <15%	**Percent Volatile:** 85%
Viscosity: Not determined	**Evaporation Rate:** >1
Decomposition Temperature: Not available	**VOC Content:** Not determined
Coefficient Of Water/Oil Distribution: Not determined	**Autoignition Temp:** 752°F (>400°C)
Flash Point: Non-Flammable	**Flame extension:** Not determined
Flammability Limits: LEL: Not determined UEL: Not determined	**Flammability (solid, gas):** Not applicable

10. Stability and Reactivity

Reactivity: Not normally reactive
Chemical Stability: Stable under normal storage and handling conditions
Conditions to Avoid: Keep away from excessive heat, and open flames. Containers may rupture at temperatures > 120°F (48.8°C)
Incompatible Materials: Strong oxidizing agents.
Hazardous Decomposition Products: Burning may produce oxides of carbon and fluoride; and hydrogen fluoride.

11. Toxicological Information

Potential Health Effects:

Acute Hazards:

Inhalation: Mist can irritate the throat and respiratory tract. Exposure to high concentrations can induce anesthetic effects progressing from dizziness, weakness, nausea, to unconsciousness.

Skin Contact: May cause mild skin irritation.

Eye Contact: Direct contact may cause mild eye irritation with redness, and tearing.

Ingestion: Ingestion is an unlikely route exposure for aerosol products. Swallowing may cause gastrointestinal disturbances.

Chronic Effects: None expected.

Carcinogenicity Listing: Contains methylene chloride which is classified as an OSHA carcinogen, ACGIH - Confirmed animal carcinogen with unknown relevance to humans, NTP - Reasonably anticipated to be a human carcinogen, and IARC 2B - Possibly carcinogenic to humans. None of the other components listed at 0.1% or greater is a carcinogen or potential carcinogen by IARC, NTP, ACGIH or OSHA

Numerical Measures of Toxicity:

1,1,1,2-tetrafluoroethane:	LC50 Inhalation Rat: >500,000/4h
Polyalkylene glycol monobutyl ether:	Not acutely toxic.
Methylene Chloride:	LD50 Oral Rat >2,000 mg/kg

IDQ Operating, Inc.
44 Old Ridgebury Road
Suite 300
Danbury, CT 06810
Tel. 1-203-205-2900

LD50 Dermal Rat >2,000 mg/kg

12. Ecological Information

Ecotoxicity: No ecotoxicity data is currently available for product.

Persistence and Degradability: No data available for product.

Bio accumulative Potential: No data available for product.
Will not bio concentrate in fish and aquatic organisms.

Mobility in Soil: No data available for product. If released to soil, 1,1,1,2-tetrafluoroethane will rapidly volatilize from either moist or dry soil to the atmosphere. It will display moderate to high mobility in soil.

Other Adverse Effects: Products of decomposition will be highly dispersed and hence will have a very low concentration. It is not a significant contributor to photochemical smog and is not considered to be a VOC. It is not considered as an ozone depleting chemical.

13. Disposal Considerations

Dispose of in accordance with all local, state/provincial and federal regulations. Offer empty containers for recycling.

14. Transport Information

DOT Hazardous Materials Description:

Proper Shipping Name: CONSUMER COMMODITY
Hazard Class: ORM-D
Identification Number: NA

IMDG Dangerous Goods Description:

Proper Shipping Name: 1,1,1,2-Tetrafluoroethane
Hazard Class: 2.2
Identification Number: UN3159

15. Regulatory Information

United States:

EPA TSCA INVENTORY: All of the components of this material are listed on the Toxic Substances Control Act (TSCA) Chemical Substances Inventory.

CERCLA Section 103: Spills of this product over the RQ (reportable quantity) must be reported to the National Response Center. The RQ for this product, based on the RQ for Methylene Chloride (<1% maximum) of 1,000 lbs., is 100000 lbs. Many states have more stringent release reporting requirements. Report spills required under federal, state and local regulations.

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Suite 300
Danbury, CT 06810
Tel. 1-203-205-2900

SARA Hazard Category (311/312): Sudden Release of Pressure, Chronic Health

SARA 313: This product contains the following chemicals subject to Annual Release Reporting Requirements Under SARA Title III, Section 313 (40 CFR 372): Methylene Chloride CAS# 75-09-2 at < 1%

16. Other Information

NFPA Rating (NFPA 704):	Health: 1	Fire: 0	Instability: 0
HMIS Rating:	Health: 1*	Fire: 0	Physical Hazard: 0

REVISION SUMMARY: New SDS

DATA SUPPLIED IS FOR USE ONLY IN CONNECTION WITH OCCUPATIONAL SAFETY AND HEALTH

Safety Data Sheet

IDQ Operating, Inc.
44 Old Ridgebury Road
Suite 300
Danbury, CT 06810
Tel. 1-203-205-2900

1. Product And Company Identification

Product Name: IDQ AF-3

Responsible Party: IDQ Operating, Inc.
44 Old Ridgebury Road
Suite 300
Danbury, CT 06810

Information Phone Number: +1 203-205-2900
Emergency Phone Number:
For Medical Emergencies, call 1-866-949-6465 / +1 303-389-1332 (Outside US and Canada)
For Transportation Emergencies, call 1-800-424-9300 (Chemtrec) +1-703-527-3887 for Outside US and Canada (call collect)
SDS Date Of Preparation: 05/27/2015
Product Use and Uses Advised Against: Automotive maintenance product – For consumer and professional use

2. Hazards Identification

Note: This product is a consumer product and is labeled in accordance with the Consumer Product Safety Commission regulations and not OSHA regulations. The requirements for the labeling of consumer products take precedence over OSHA labeling so the actual product label will not contain the OSHA label elements shown below on this SDS.

GHS Classification:

Physical:	Health:
Gases Under Pressure: Compressed Gas	Skin Irritant Category 2 Reproductive Toxicity Category 1B Carcinogen Category 1B Simple Asphyxiant

GHS Label Elements:

Danger!

Statements of Hazard	Prevention
Contains gas under pressure; may explode if heated. Causes skin irritation. May damage fertility or the unborn child. May cause cancer. Simple Asphyxiant: May displace oxygen and cause	Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Wash thoroughly after handling. Wear protective gloves. IF ON SKIN: Wash with plenty of soap and water.

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rapid suffocation.	If skin irritation occurs: Get medical attention. Take off contaminated clothing and wash it before reuse. IF exposed or concerned: Get medical attention. Store locked up. Protect from sunlight. Do not exposure to temperatures exceeding 50°C / 122°F. Dispose of contents and container in accordance with local and national regulations.

3. Composition/Information On Ingredients

Component	CAS No.	Amount
1,1,1,2-tetrafluoroethane	811-97-2	85-95%
Polyalkylene glycol monobutyl ether	Proprietary	1-10%
Additive Package	Proprietary	1-5%
Oil Additive	Proprietary	<1%
Methylene chloride	75-09-2	<1%

The exact concentrations are a trade secret.

4. First Aid Measures

Inhalation: If symptoms of exposure develop, remove to fresh air. Seek medical attention if breathing problem or irritation persists.

Skin Contact: Wash exposed skin with soap and water. If skin irritation or redness develops, seek medical attention.

Eye Contact: Flush eyes with large amounts of water for several minutes. If irritation or other symptoms develop, seek medical attention.

Ingestion: Ingestion is an unlikely route exposure for aerosol products.

Most Important Symptoms: May cause mild eye irritation. Mists may cause mild respiratory irritation. Exposure to high concentrations can induce anesthetic effects progressing from dizziness, weakness, nausea, to unconsciousness. Causes skin irritation. May damage fertility or the unborn child. May cause cancer.

Indication of Immediate Medical Attention/Special Treatment: None known.

5. Firefighting Measures

Suitable (and Unsuitable) Extinguishing Media: Use extinguishing media suitable for surrounding fire. Cool fire exposed containers with water.

Specific Hazards Arising from the Chemical: Contents under pressure. Exposure of containers to heat and flames can cause them to rupture often with violent force. Burning may produce oxides of carbon and fluoride; and hydrogen fluoride.

Special Fire Fighting Procedures: Firefighters should always wear positive pressure self-contained breathing apparatus and full protective clothing. Cool fire-exposed containers with water. Use shielding to protect against

bursting cans.

6: Accidental Release Measures

Personal Precautions, Protective Equipment, and Emergency Procedures: Ventilate the area. Wear appropriate protective clothing and equipment.

Methods and Materials for Containment and Clean-Up: Place leaking can in a pail in a well-ventilated area until pressure has dissipated. Collect residual liquid using inert absorbents and place into a suitable container for disposal.

Environmental Precautions: Report spill as required by local and national regulations.

7. Handling and Storage

Precautions for Safe Handling: Avoid contact with eyes and skin. Avoid breathing aerosol or gas. Use only with adequate ventilation. Wash thoroughly with soap and water after handling. Contents under pressure, do not puncture or incinerate containers. Refer to OSHA 1910.1052 (methylene chloride standard) for additional requirements.

Conditions for Safe Storage, Including any Incompatibilities: Store in a cool, well-ventilated area, away from incompatible materials. Do not store in direct sunlight or above 120°F.

8. Exposure Controls / Personal Protection

Exposure Guidelines:

CHEMICAL	EXPOSURE LIMIT
1,1,1,2-tetrafluoroethane	1000 ppm TWA AIHA WEELs
Polyalkylene glycol monobutyl ether	None established
Additive Package	None established
Oil Additive	None established
Methylene chloride	50 ppm TWA ACGIH TLV 25 ppm TWA, 125 STEL OSHA PEL

Appropriate Engineering Controls: General ventilation should be adequate for normal use. For operations where the exposure limits may be exceeded, forced ventilation such as local exhaust may be needed to maintain exposures below applicable limits.

Personal Protective Equipment

Respiratory Protection: None under normal use conditions. For operations where the exposure limits may be exceeded, a NIOSH approved supplied air respirators recommended. Equipment selection depends on contaminant type and concentration. Select in accordance with 29 CFR 1910.134 and 1910.1052; all applicable laws and regulations; and good industrial hygiene practice.

Gloves: Wear impervious gloves to avoid skin contact.

Eye Protection: Safety glasses are recommended if eye contact is possible.

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Other Protective Equipment/Clothing: None required.

9. Physical and Chemical Properties

Appearance And Odor: Clear liquid in aerosol can with ethereal odor.

Physical State: Liquid-based aerosol	**Odor Threshold:** Not determined
pH: < 7	**Specific Gravity:** Not determined
Initial Boiling Point/Range: -26.5°C @ 736 mm Hg (1,1,1,2-tetrafluoroethane)	**Vapor Pressure:** 4277 mm Hg at 20°C
Melting/Freezing Point: -15.7 °F (<-26.5°C)	**Vapor Density:** (Air = 1) 3.5
Solubility In Water: <15%	**Percent Volatile:** 84%
Viscosity: Not determined	**Evaporation Rate:** (butyl acetate = 1) >1
Decomposition Temperature: Not available	**VOC Content:** Not determined
Coefficient Of Water/Oil Distribution: Not determined	**Autoignition Temp:** >752°F (>400°C)
Flash Point: Non-Flammable	**Flame extension:** Not determined
Flammability Limits: LEL: Not determined UEL: Not determined	**Flammability (solid, gas):** Not applicable

10. Stability and Reactivity

Reactivity: Not normally reactive
Chemical Stability: Stable under normal storage and handling conditions
Conditions to Avoid: Keep away from excessive heat, and open flames. Containers may rupture at temperatures > 120°F (48.8°C)
Incompatible Materials: Strong oxidizing agents.
Hazardous Decomposition Products: Burning may produce oxides of carbon and fluoride; and hydrogen fluoride.

11. Toxicological Information

Potential Health Effects:

Acute Hazards:

Inhalation: Mist can irritate the throat and respiratory tract. Exposure to high concentrations can induce anesthetic effects progressing from dizziness, weakness, nausea, to unconsciousness.

Skin Contact: Causes skin irritation.

Eye Contact: Direct contact may cause mild eye irritation with redness, and tearing.

Ingestion: Ingestion is an unlikely route exposure for aerosol products. Swallowing may cause gastrointestinal disturbances.

Chronic Effects: Oil additive contains components that may damage fertility or the unborn child.

Carcinogenicity Listing: Contains methylene chloride which is classified as an OSHA carcinogen, ACGIH - Confirmed animal carcinogen with unknown relevance to humans, NTP - Reasonably anticipated to be a human carcinogen, and IARC 2B - Possibly carcinogenic to humans. None of the other components listed at 0.1% or greater is a carcinogen or potential carcinogen by IARC, NTP, ACGIH or OSHA

Numerical Measures of Toxicity:

1,1,1,2-tetrafluoroethane:	LC50 Inhalation Rat: >500,000/4h
Polyalkylene glycol monobutyl ether:	Not acutely toxic.
Additive Package:	LD50 Oral Rat > 5,000 mg/kg
	LD50 Dermal Rabbit > 10,000 mg/kg
Oil Additive:	LD50 Oral Rat 5,140 mg/kg
Methylene Chloride:	LD50 Oral Rat >2,000 mg/kg
	LD50 Dermal Rat >2,000 mg/kg

12. Ecological Information

Ecotoxicity: No ecotoxicity data is currently available for product.

Persistence and Degradability: Decomposes comparatively rapidly in the lower atmosphere (troposphere). Atmospheric lifetime is 15.6 years.

Bio accumulative Potential: No data available for product.
Will not bio concentrate in fish and aquatic organisms.

Mobility in Soil: No data available for product. If released to soil, 1,1,1,2-tetrafluoroethane will rapidly volatilize from either moist or dry soil to the atmosphere. It will display moderate to high mobility in soil.

Other Adverse Effects: Products of decomposition will be highly dispersed and hence will have a very low concentration. It is not a significant contributor to photochemical smog and is not considered to be a VOC. It is not considered as an ozone depleting chemical.

13. Disposal Considerations

Dispose of in accordance with all local, state/provincial and federal regulations. Offer empty containers for recycling.

14. Transport Information

DOT Hazardous Materials Description:

Proper Shipping Name: CONSUMER COMMODITY
Hazard Class: ORM-D
Identification Number: NA

15. Regulatory Information

United States:

EPA TSCA INVENTORY: All of the components of this material are listed on the Toxic Substances Control Act (TSCA) Chemical Substances Inventory.

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CERCLA Section 103: Spills of this product over the RQ (reportable quantity) must be reported to the National Response Center. The RQ for this product, based on the RQ for Methylene Chloride (<1% maximum) of 1,000 lbs, is 100,000 lbs. Many states have more stringent release reporting requirements. Report spills required under federal, state and local regulations.

SARA Hazard Category (311/312): Sudden Release of Pressure, Acute Health, Chronic Health

SARA 313: This product contains the following chemicals subject to Annual Release Reporting Requirements Under SARA Title III, Section 313 (40 CFR 372): Methylene Chloride CAS# 75-09-2 at < 1%

16. Other Information

NFPA Rating (NFPA 704):	Health: 1	Fire: 0	Instability: 0
HMIS Rating:	Health: 1*	Fire: 0	Physical Hazard: 0

REVISION SUMMARY: New SDS

DATA SUPPLIED IS FOR USE ONLY IN CONNECTION WITH OCCUPATIONAL SAFETY AND HEALTH

Safety Data Sheet

1 - Identification

Product Name: WD-40 Multi-Use Product Aerosol *NOT FOR SALE IN CALIFORNIA* **Product Use: Lubricant, Penetrant, Drives Out Moisture, Removes and Protects Surfaces From Corrosion** **Restrictions on Use: None identified** **SDS Date Of Preparation: 07/20/2014**	**Manufacturer: WD-40 Company** **Address: 1061 Cudahy Place (92110)** **P.O. Box 80607** **San Diego, California, USA** **92138 –0607** **Telephone:** **Emergency only: 1-888-324-7596 (PROSAR)** **Information: 1-888-324-7596** **Chemical Spills: 1-800-424-9300 (Chemtrec)** **1-703-527-3887 (International Calls)**

2 – Hazards Identification

Hazcom 2012/GHS Classification:
Flammable Aerosol Category 1
Gas Under Pressure: Compressed Gas
Aspiration Toxicity Category 1

Note: This product is a consumer product and is labeled in accordance with the US Consumer Product Safety Commission regulations which take precedence over OSHA Hazard Communication labeling. The actual container label will not include the label elements below. The labeling below applies to industrial/professional products.

Label Elements:

DANGER!
Extremely Flammable Aerosol.
Contains gas under pressure; may explode if heated.
May be fatal if swallowed and enters airways.
Prevention
Keep away from heat, sparks, open flames, hot surfaces – No smoking.
Do not spray on an open flame or other ignition source.
Pressurized container: Do not pierce or burn, even after use.
Response
IF SWALLOWED: Immediately call a POISON CENTER or physician. Do NOT induce vomiting.
Storage
Store locked up.
Protect from sunlight. Do not expose to temperatures exceeding 50°C/122°F. Store in a well-ventilated place.
Disposal
Dispose of contents and container in accordance with local and national regulations.

3 - Composition/Information on Ingredients

Ingredient	CAS #	Weight Percent	US Hazcom 2012/ GHS Classification
Aliphatic Hydrocarbon	64742-47-8	45-50	Flammable Liquid Category 3

			Aspiration Toxicity Category 1
Petroleum Base Oil	64742-56-9 64742-65-0 64742-53-6 64742-54-7 64742-71-8	<25	Not Hazardous
LVP Aliphatic Hydrocarbon	64742-47-8	12-18	Aspiration Toxicity Category 1
Carbon Dioxide	124-38-9	2-3	Simple Asphyxiant Gas Under Pressure, Compressed Gas
Non-Hazardous Ingredients	Mixture	<10	Not Hazardous

Note: The exact percentages are a trade secret.

4 – First Aid Measures

Ingestion (Swallowed): Aspiration Hazard. DO NOT induce vomiting. Call physician, poison control center or the WD-40 Safety Hotline at 1-888-324-7596 immediately.
Eye Contact: Flush thoroughly with water. Remove contact lenses if present after the first 5 minutes and continue flushing for several more minutes. Get medical attention if irritation persists.
Skin Contact: Wash with soap and water. If irritation develops and persists, get medical attention.
Inhalation (Breathing): If irritation is experienced, move to fresh air. Get medical attention if irritation or other symptoms develop and persist.
Signs and Symptoms of Exposure: May cause eye and respiratory irritation. Inhalation may cause coughing, headache and dizziness. Skin contact may cause drying of the skin.
Indication of Immediate Medical Attention/Special Treatment Needed: Immediate medical attention is needed for ingestion.

5 – Fire Fighting Measures

Suitable (and unsuitable) Extinguishing Media: Use water fog, dry chemical, carbon dioxide or foam. Do not use water jet or flooding amounts of water. Burning product will float on the surface and spread fire.
Specific Hazards Arising from the Chemical: Contents under pressure. Keep away from ignition sources and open flames. Exposure of containers to extreme heat and flames can cause them to rupture often with violent force. Vapors are heavier than air and may travel along surfaces to remote ignition sources and flash back. Combustion will produce oxides of carbon and hydrocarbons.
Special Protective Equipment and Precautions for Fire-Fighters: Firefighters should always wear positive pressure self-contained breathing apparatus and full protective clothing. Cool fire-exposed containers with water. Use shielding to protect against bursting containers.

6 – Accidental Release Measures

Personal Precautions, Protective Equipment and Emergency Procedures: Wear appropriate protective clothing (see Section 8). Eliminate all sources of ignition and ventilate area.
Methods and Materials for Containment/Cleanup: Leaking cans should be placed in a plastic bag or open pail until the pressure has dissipated. Contain and collect liquid with an inert absorbent and place in a container for disposal. Clean spill area thoroughly. Report spills to authorities as required.

7 – Handling and Storage

Precautions for Safe Handling: Avoid contact with eyes. Avoid prolonged contact with skin. Avoid breathing vapors or aerosols. Use only with adequate ventilation. Keep away from heat, sparks, pilot lights, hot surfaces and open flames. Unplug electrical tools, motors and appliances before spraying or bringing the can near any source of electricity. Electricity can burn a hole in the can and cause contents to burst into flames. To avoid serious burn injury, do not let the can touch battery terminals, electrical connections on motors or appliances or any other source of electricity. Wash thoroughly with soap and water after handling. Keep containers closed when not in use. Keep out of the reach of children. Do not puncture, crush or incinerate containers, even when empty.

Conditions for Safe Storage: Store in a cool, well-ventilated area, away from incompatible materials Do not store above 120°F or in direct sunlight. U.F.C (NFPA 30B) Level 3 Aerosol. Store away from oxidizers.

8 – Exposure Controls/Personal Protection

Chemical	Occupational Exposure Limits
Aliphatic Hydrocarbon	1200 mg/m3 TWA (manufacturer recommended)
Petroleum Base Oil	5 mg/m3 TWA, 10 mg/m3 STEL ACGIH TLV 5 mg/m3 TWA OSHA PEL
LVP Aliphatic Hydrocarbon	1200 mg/m3 TWA (manufacturer recommended)
Carbon Dioxide	5000 ppm TWA (OSHA/ACGIH), 30,000 ppm STEL (ACGIH)
Non-Hazardous Ingredients	None Established

The Following Controls are Recommended for Normal Consumer Use of this Product
Appropriate Engineering Controls: Use in a well-ventilated area.
Personal Protection:
Eye Protection: Avoid eye contact. Always spray away from your face.
Skin Protection: Avoid prolonged skin contact. Chemical resistant gloves recommended for operations where skin contact is likely.
Respiratory Protection: None needed for normal use with adequate ventilation.

For Bulk Processing or Workplace Use the Following Controls are Recommended
Appropriate Engineering Controls: Use adequate general and local exhaust ventilation to maintain exposure levels below that occupational exposure limits.
Personal Protection:
Eye Protection: Safety goggles recommended where eye contact is possible.
Skin Protection: Wear chemical resistant gloves.
Respiratory Protection: None required if ventilation is adequate. If the occupational exposure limits are exceeded, wear a NIOSH approved respirator. Respirator selection and use should be based on contaminant type, form and concentration. Follow OSHA 1910.134, ANSI Z88.2 and good Industrial Hygiene practice.
Work/Hygiene Practices: Wash with soap and water after handling.

9 – Physical and Chemical Properties

Appearance:	Light amber liquid	Flammable Limits: (Solvent Portion)	LEL: 0.6% UEL: 8%
Odor:	Mild petroleum odor	Vapor Pressure:	95-115 PSI @ 70°F
Odor Threshold:	Not established	Vapor Density:	Greater than 1 (air=1)
pH:	Not Applicable	Relative Density:	0.8 – 0.82 @ 60°F
Melting/Freezing Point	Not established	Solubilities:	Insoluble in water
Boiling Point/Range:	361 - 369°F (183 - 187°C)	Partition Coefficient; n-octanol/water:	Not established
Flash Point:	122°F (49°C) Tag Closed Cup (concentrate)	Autoignition Temperature:	Not established
Evaporation Rate:	Not established	Decomposition Temperature:	Not established
Flammability (solid, gas)	Flammable Aerosol	Viscosity:	2.79-2.96 cSt @ 100°F
VOC:	412 grams/liter (49.5%)	Pour Point:	-63°C (-81.4°F) ASTM D-97

10 – Stability and Reactivity

Reactivity: Not reactive under normal conditions
Chemical Stability: Stable

Possibility of Hazardous Reactions: May react with strong oxidizers generating heat.
Conditions to Avoid: Avoid heat, sparks, flames and other sources of ignition. Do not puncture or incinerate containers.
Incompatible Materials: Strong oxidizing agents.
Hazardous Decomposition Products: Carbon monoxide and carbon dioxide.

11 – Toxicological Information

Symptoms of Overexposure:
Inhalation: High concentrations may cause nasal and respiratory irritation and central nervous system effects such as headache, dizziness and nausea. Intentional abuse may be harmful or fatal.
Skin Contact: Prolonged and/or repeated contact may produce mild irritation and defatting with possible dermatitis.
Eye Contact: Contact may be irritating to eyes. May cause redness and tearing.
Ingestion: This product has low oral toxicity. Swallowing may cause gastrointestinal irritation, nausea, vomiting and diarrhea. This product is an aspiration hazard. If swallowed, can enter the lungs and may cause chemical pneumonitis, severe lung damage and death.
Chronic Effects: None expected.
Carcinogen Status: None of the components are listed as a carcinogen or suspect carcinogen by IARC, NTP, ACGIH or OSHA.
Reproductive Toxicity: None of the components is considered a reproductive hazard.

Numerical Measures of Toxicity:
The oral toxicity of this product is estimated to be greater than 5,000 mg/kg and the dermal toxicity greater than 2,000 mg/kg based on an assessment of the ingredients. This product is not classified as toxic by established criteria. It is an aspiration hazard.

12 – Ecological Information

Ecotoxicity: No specific aquatic toxicity data is currently available, however components of this product are not expected to be harmful to aquatic organisms
Persistence and Degradability: Component are readily biodegradable.
Bioaccumulative Potential: Bioaccumulation is not expected based on an assessment of the ingredients.
Mobility in Soil: No data available
Other Adverse Effects: None known

13 - Disposal Considerations

If this product becomes a waste, it would be expected to meet the criteria of a RCRA ignitable hazardous waste (D001). However, it is the responsibility of the generator to determine at the time of disposal the proper classification and method of disposal. Do not puncture or incinerate containers, even empty. Dispose in accordance with federal, state, and local regulations.

14 – Transportation Information

DOT Surface Shipping Description:
UN1950, Aerosols, 2.1 Ltd. Qty (Note: Shipping Papers are not required for Limited Quantities unless transported by air or vessel – each package must be marked with the Limited Quantity Mark)
IMDG Shipping Description: Un1950, Aerosols, 2.1, LTD QTY
ICAO Shipping Description: UN1950, Aerosols, flammable, 2.1 NOTE: WD-40 does not test aerosol cans to assure that they meet the pressure and other requirements for transport by air. We do not recommend that our aerosol products be transported by air.

15 – Regulatory Information

U.S. Federal Regulations:
CERCLA 103 Reportable Quantity: This product is not subject to CERCLA reporting requirements, however, oil spills are reportable to the National Response Center under the Clean Water Act and many

states have more stringent release reporting requirements. Report spills required under federal, state and local regulations.
SARA TITLE III:
Hazard Category For Section 311/312: Acute Health, Fire Hazard, Sudden Release of Pressure
Section 313 Toxic Chemicals: This product contains the following chemicals subject to SARA Title III Section 313 Reporting requirements: None
Section 302 Extremely Hazardous Substances (TPQ): None
EPA Toxic Substances Control Act (TSCA) Status: All of the components of this product are listed on the TSCA inventory.
VOC Regulations: This product complies with the consumer product VOC limits of the US EPA and states adopting the OTC VOC rules but does not comply with CARB.
California Safe Drinking Water and Toxic Enforcement Act (Proposition 65): This product does not contain chemicals regulated under California Proposition 65.
Canadian Environmental Protection Act: One of the components is listed on the NDSL. All of the other ingredients are listed on the Canadian Domestic Substances List or exempt from notification.
Canadian WHMIS Classification: Class A (Compressed gas), Class B-5 (Flammable Aerosol)
This MSDS has been prepared according to the criteria of the Controlled Products Regulation (CPR) and the MSDS contains all of the information required by the CPR.

16 – Other Information:

HMIS Hazard Rating:
Health – 1 (slight hazard), Fire Hazard – 4 (severe hazard), Reactivity – 0 (minimal hazard)

Revision Date: July 20, 2014 Supersedes: May 23, 2014

Revision Summary: Convert to Hazcom 2012. Changes in all sections.

Prepared by: Industrial Health & Safety Consultants, Inc. Shelton, CT, USA

APPROVED By: I. Kowalski Regulatory Affairs Dept.

5049000/No.0015205

SAFETY DATA SHEET

Section 1: IDENTIFICATION

1.1 PRODUCT IDENTIFIER

Product Name: PB Penetrating Catalyst (Aerosol)

Product Code: 16-PB, 8-PB, 8-PBS, PBTS, 20-PB, 16-PB-IND

1.2 RECOMMENDED USE OF CHEMICAL AND RESTRICTIONS ON USE

Use: Lubricant/Penetrant

1.3 DETAILS OF THE SUPPLIER OF THE SAFETY DATA SHEET

Name/Address: The Blaster Corporation
8500 Sweet Valley Drive
Valley View, Ohio 44125 – USA

Telephone Number: T (216) 901-5800
F (216) 901-5801

1.4 EMERGENCY TELEPHONE NUMBER

Emergency Telephone Number: CHEMTREC: (800) 424-9300

Date of Preparation: June 3, 2015 **Version #:** 1.0

Section 2: HAZARD(S) IDENTIFICATION

2.1 CLASSIFICATION OF THE CHEMICAL ACCORDING TO OSHA HAZCOM 2012

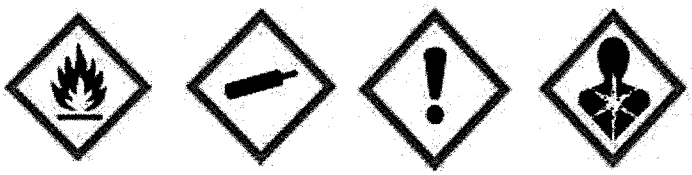
Hazard class

Flammable Aerosol 2
Gases Under Pressure (Dissolved Gas)
Serious Eye Irritation 2A
Carcinogenicity 2
Aspiration Hazard 1

2.2 LABEL ELEMENTS ACCORDING TO OSHA HAZCOM 2012

This product is a consumer product and is labeled in accordance with the US Consumer Product Safety Commission regulations which take precedence over OSHA Hazard Communication labeling. The actual container label will not include the label elements below. The labeling below applies to industrial/professional products.

Hazard Pictogram:



Signal Word: Danger

Hazard Statement: Flammable aerosol. Contains gas under pressure; may explode if heated. Causes serious eye irritation. Suspected of causing cancer. May be fatal if swallowed and enters airways.

Prevention: Keep away from heat/sparks/open flames/hot surfaces. -No smoking. Do not spray on an open flame or other ignition source. Pressurized container: Do not pierce or burn, even after use. Wash hands thoroughly after handling. Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Wear protective gloves/protective clothing/eye protection/face protection.

Response:	If exposed or concerned: Get medical advice/attention. If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention. If swallowed: Immediately call a poison center or doctor. Do NOT induce vomiting.
Storage:	Protect from sunlight. Do not expose to temperatures exceeding 50 °C/122 °F. Store in a well-ventilated place. Store locked up.
Disposal:	Dispose of contents and container in accordance with all local, regional, national and international regulations.

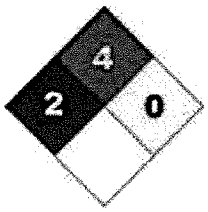
2.3 ADDITIONAL INFORMATION

Hazards not otherwise classified: Not applicable.

8 % of the mixture consists of ingredient(s) of unknown acute toxicity.

This product is a hazardous chemical as defined by NOM-018-STPS-2000.

Mexico Classification:



Blue = Health Red = Flammability Yellow = Reactivity White = Special

Hazard Rating: 0 = minimal, 1 = slight, 2 = moderate, 3 = severe, 4 = extreme

Section 3: COMPOSITION/INFORMATION ON INGREDIENTS

3.1 MIXTURES

Ingredient	UN #	H / F/ R / *	CAS No	Wt. %
Distillates (petroleum), hydrotreated light	Not available	Not available	64742-47-8	50 - 60
Solvent naphtha (petroleum), heavy aromatic	UN1270	Not available	64742-94-5	20 - 30
Distillates (petroleum), hydrotreated heavy naphthenic	Not available	Not available	64742-52-5	20 - 30
Carbon dioxide	UN1013	1/0/0	124-38-9	1 - 5
Naphthalene	UN1334/ UN2304	2/2/0	91-20-3	2 - 3
Dinonylphenol, ethoxylated, phosphated	Not available	Not available	39464-64-7	0.5 - 1.5

The exact percentage (concentration) of composition has been withheld as a trade secret in accordance with paragraph (i) of §1910.1200.

* Per NOM-018-STPS-2000

Section 4: FIRST- AID MEASURES

4.1 DESCRIPTION OF THE FIRST AID MEASURE

Eye: In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. If easy to do, remove contact lenses, if worn. If irritation persists, get medical attention.

Skin: In case of contact, immediately flush skin with plenty of water. Remove contaminated clothing and shoes. Wash clothing before reuse. Call a physician if irritation develops and persists.

Inhalation: If breathing is difficult, remove to fresh air and keep at rest in a position comfortable for breathing. Get medical advice/attention if you feel unwell.

Ingestion: If swallowed, do NOT induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. Get immediate medical advice/attention.

4.2 MOST IMPORTANT SYMPTOMS AND EFFECTS, BOTH ACUTE AND DELAYED

Eye: Causes serious eye irritation. Symptoms may include discomfort or pain, excess blinking and tear production, with marked redness and swelling of the conjunctiva.

Skin: May cause skin irritation. Symptoms may include redness, drying, defatting and cracking of the skin.

Inhalation: May be fatal if swallowed and enters airways. This product may be aspirated into the lungs and cause chemical pneumonitis. May cause stomach distress, nausea or vomiting.

Ingestion: May cause respiratory tract irritation.

4.3 INDICATION OF ANY IMMEDIATE MEDICAL ATTENTION AND SPECIAL TREATMENTS NEEDED

Note to Physicians: Symptoms may not appear immediately.

Specific Treatments: In case of accident or if you feel unwell, seek medical advice immediately (show the label or SDS where possible).

Section 5: FIRE-FIGHTING MEASURES

5.1 EXTINGUISHING MEDIA

Suitable Extinguishing Media: Dry chemical, carbon dioxide or foam.

Unsuitable Extinguishing Media: Water may be ineffective for extinguishing fire.

5.2 SPECIAL HAZARDS ARISING FROM THE CHEMICAL

Products of Combustion: May include, and are not limited to: oxides of carbon, hydrocarbons.

5.3 SPECIAL PROTECTIVE EQUIPMENT AND PRECAUTIONS FOR FIRE FIGHTERS

Keep upwind of fire. Wear full fire fighting turn-out gear (full Bunker gear) and respiratory protection (SCBA). Cool closed containers exposed to fire with water. Do not use a solid water stream as it may scatter and spread fire. Containers may explode when heated.

Section 6: ACCIDENTAL RELEASE MEASURES

6.1 PERSONAL PRECAUTIONS, PROTECTIVE EQUIPMENT AND EMERGENCY PROCEDURES

Use personal protection recommended in Section 8. Isolate the hazard area and deny entry to unnecessary and unprotected personnel. Eliminate sources of ignition.

6.2 METHODS AND MATERIALS FOR CONTAINMENT AND CLEANING - UP

Methods for Containment: Contain and/or absorb spill with inert material (e.g. sand, vermiculite), then place in a suitable container. Do not flush to sewer or allow to enter waterways. Use appropriate Personal Protective Equipment (PPE).

Methods for Cleaning-Up: Scoop up material and place in a disposal container. Vapors may be heavier than air and may travel along the ground to a distant ignition source and flash back. Provide ventilation.

Section 7: HANDLING AND STORAGE

7.1 PRECAUTIONS FOR SAFE HANDLING

Handling: Keep away from sources of ignition. - No smoking. Avoid contact with skin and eyes. Avoid breathing dust/fume/gas/mist/vapours/ spray. Do not swallow. When using do not eat, drink or smoke. Do not spray on an open flame or other ignition source. Use only outdoors or in a well-ventilated area. Pressurized container: Do not pierce or burn, even after use. (See section 8)

General Hygiene Advice: Launder contaminated clothing before reuse. Wash hands before eating, drinking, or smoking.

7.2 CONDITIONS FOR SAFE STORAGE, INCLUDING ANY INCOMPATIBILITIES

Storage: Keep locked up and out of reach of children. Do not expose to temperatures exceeding 50 °C/ 122 °F. Store in dry, cool, well-ventilated area. (See section 10)

Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 CONTROL PARAMETERS

Exposure Guidelines

Occupational Exposure Limits		
Ingredient	**OSHA-PEL**	**ACGIH-TLV**
Distillates (petroleum), hydrotreated light	100 ppm	200 mg/m³
Solvent naphtha (petroleum), heavy aromatic	Not available.	Not available.
Distillates (petroleum), hydrotreated heavy naphthenic	5 mg/m³ (mist)	5 mg/m³ (mist)
Carbon dioxide	5000 ppm; 9000 mg/m^3	5000 ppm
Naphthalene	10 ppm; 50 mg/m^3	10 ppm
Dinonylphenol, ethoxylated, phosphated	Not available.	Not available.

8.2 EXPOSURE CONTROLS

Engineering Controls: Use ventilation adequate to keep exposures (airborne levels of dust, fume, vapor, etc.) below recommended exposure limits.

8.3 INDIVIDUAL PROTECTIVE MEASURES

Personal Protective Equipment:

Eye/Face Protection: Safety glasses with side-shields.

Skin Protection:

Hand Protection: Wear chemically resistant protective gloves.

Body Protection: Wear suitable protective clothing.

Respiratory Protection: A NIOSH approved respirator is recommended in poorly ventilated areas or when permissible exposure limits may be exceeded. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator.

General Health and Safety Measures: Do not eat, smoke or drink where material is handled, processed or stored. Wash hands carefully before eating or smoking. Handle according to established industrial hygiene and safety practices. Ensure that eyewash stations and safety showers are close to the workstation location.

Section 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 INFORMATION ON BASIC PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Viscous / Oily.
Color:	Orange.
Odor:	Heavy aromatic.
Odor Threshold:	Not available.
Physical State:	Gas/pressurized liquid.
pH:	Not available.
Melting Point/Freezing Point:	Not available.
Initial Boiling Point and Boiling Range:	177.8 °C (352 °F)
Flash Point:	65.6 °C (150 °F)
Evaporation Rate:	<1 (n-butyl acetate = 1)
Flammability:	Flammable.
Lower Flammability/Explosive Limit:	Not available.
Upper Flammability/Explosive Limit:	Not available.
Vapor Pressure:	Not available.
Vapor Density:	>1 (Air = 1)
Relative Density/Specific Gravity:	0.91 (Water = 1)
Solubility:	Negligible.

Partition coefficient: n-octanol/water:	Not available.
Auto-ignition Temperature:	Not available.
Decomposition Temperature:	Not available.
Viscosity:	Not available.
Oxidizing Properties:	Not available.
Explosive Properties:	Not available.
VOC Content:	< 25%
Flame Projection:	0 cm
Heat of Combustion:	45.8 kJ/g

Section 10: STABILITY AND REACTIVITY

10.1 REACTIVITY

No dangerous reaction known under conditions of normal use.

10.2 CHEMICAL STABILITY

Stable under normal storage conditions. Flammable aerosol. Contents under pressure. Containermay explode if heated. Do not puncture. Do not burn.

10.3 POSSIBILITY OF HAZARDOUS REACTIONS

No dangerous reaction known under conditions of normal use.

10.4 CONDITIONS TO AVOID

Heat. Incompatible materials. Sources of ignition. Excessive water.

10.5 INCOMPATIBLE MATERIALS

Strong oxidizing agents. Strong reducing agents. Moisture.

10.6 HAZARDOUS DECOMPOSITION PRODUCTS

May include, and are not limited to: oxides of carbon, hydrocarbons.

Section 11: TOXICOLOGICAL INFORMATION

11.1 INFORMATION ON TOXICOLOGICAL EFFECTS

Likely Routes of Exposure: Skin contact, eye contact, inhalation, and ingestion.

Symptoms related to physical/chemical/toxicological characteristics:

Eye: Causes serious eye irritation. Symptoms may include discomfort or pain, excess blinking and tear production, with marked redness and swelling of the conjunctiva.

Skin: May cause skin irritation. Symptoms may include redness, drying, defatting and cracking of the skin.

Ingestion: May be fatal if swallowed and enters airways. This product may be aspirated into the lungs and cause chemical pneumonitis. May cause stomach distress, nausea or vomiting.

Inhalation: May cause respiratory tract irritation.

Acute Toxicity:

Ingredient	IDLH	LC50	LD50
Distillates (petroleum), hydrotreated light	Not available.	Inhalation >5.2 mg/L 4h rat	Oral >5000 mg/kg, rat; Dermal >2000 mg/kg, rabbit
Solvent naphtha (petroleum), heavy aromatic	Not available.	Inhalation >5.28 mg/L 4h, rat	Oral >5000 mg/kg, rat; Dermal >2000 mg/kg, rabbit
Distillates (petroleum), hydrotreated heavy naphthenic	Not available.	Inhalation >5.0 mg/L 4h, rat	Oral >5000 mg/kg, rat; Dermal >5000 mg/kg, rabbit
Carbon dioxide	40000 ppm	Not available.	Not available.
Naphthalene	250 ppm	Not available.	Oral 490 mg/kg, rat; Dermal >2500 mg/kg, rat; Dermal >20 g/kg, rabbit
Dinonylphenol, ethoxylated, phosphated	Not available.	Not available.	Not available.

Calculated overall Chemical Acute Toxicity Values		
LC50 (inhalation)	**LD50 (oral)**	**LD50 (dermal)**
> 5 mg/L 4h, rat	> 2000 mg/kg, rat	> 2000 mg/kg, rabbit

Ingredient	Chemical Listed as Carcinogen or Potential Carcinogen (NTP, IARC, OSHA, ACGIH, CP65)*
Distillates (petroleum), hydrotreated light	Not listed.
Solvent naphtha (petroleum), heavy aromatic	Not listed.
Distillates (petroleum), hydrotreated heavy naphthenic	Not listed.
Carbon dioxide	Not listed.
Naphthalene	G-A4, I-2B, N-2, CP65
Dinonylphenol, ethoxylated, phosphated	Not listed.

* See Section 15 for more information.

11.2 DELAYED, IMMEDIATE, AND CHRONIC EFFECTS OF SHORT- AND LONG-TERM EXPOSURE

Skin Corrosion/Irritation: Based on available data, the classification criteria are not met.

Serious Eye Damage/Irritation: Causes serious eye irritation.

Respiratory Sensitization: Based on available data, the classification criteria are not met.

Skin Sensitization: Based on available data, the classification criteria are not met.

STOT-Single Exposure: Based on available data, the classification criteria are not met.

Chronic Health Effects:

Carcinogenicity: Possible carcinogen.

Germ Cell Mutagenicity: Based on available data, the classification criteria are not met.

Reproductive Toxicity:

Developmental: Based on available data, the classification criteria are not met.

Fertility: Based on available data, the classification criteria are not met.

STOT-Repeated Exposure: Based on available data, the classification criteria are not met.

Aspiration Hazard: May be fatal if swallowed and enters airways.

Other Information: Not available.

Section 12: ECOLOGICAL INFORMATION

12.1 ECOTOXICITY

Acute/Chronic Toxicity: May cause long-term adverse effects in the aquatic environment.

12.2 PERSISTENCE AND DEGRADABILITY

Not available.

12.3 BIOACCUMULATIVE POTENTIAL

Bioaccumulation: Not available.

12.4 MOBILITY IN SOIL

Not available.

12.5 OTHER ADVERSE EFFECTS

Not available.

Section 13: DISPOSAL CONSIDERATIONS

13.1 WASTE TREATMENT METHODS

Disposal Method: This material must be disposed of in accordance with all local, state, provincial, and federal regulations. The generation of waste should be avoided or minimized wherever possible.

Other disposal recommendations: Flammable vapours may accumulate in the container. Do not incinerate empty containers.

Section 14: TRANSPORT INFORMATION

14.1 UN NUMBER

DOT	NOM-004-SCT2-1994
UN1950	UN1950

14.2 UN PROPER SHIPPING NAME

DOT	NOM-004-SCT2-1994
AEROSOLS, flammable, limited quantities	AEROSOLS, flammable, limited quantities

14.3 TRANSPORT HAZARD CLASS (ES)

DOT	NOM-004-SCT2-1994
2.1	2.1

14.4 PACKING GROUP

DOT	NOM-004-SCT2-1994
Not applicable.	Not applicable.

14.5 ENVIRONMENTAL HAZARDS

Not available.

14.6 TRANSPORT IN BULK ACCORDING TO ANNEX II OF MARPOL 73/78 AND THE IBC CODE

Not available.

14.7 SPECIAL PRECAUTIONS FOR USER

Do not handle until all safety precautions have been read and understood. The Blaster Corporation does not recommend shipping their aerosol products by air.

Section 15: REGULATORY INFORMATION

15.1 SAFETY, HEALTH AND ENVIRONMENTAL REGULATIONS/ LEGISLATIONS SPECIFIC FOR THE CHEMICAL

US: SDS prepared pursuant to the Hazard Communication Standard (CFR29 1910.1200) HazCom 2012

Mexico: SDS prepared pursuant to NOM-018-STPS-2000.

SARA Title III				
Ingredient	**Section 302 (EHS) TPQ (lbs.)**	**Section 304 EHS RQ (lbs.)**	**CERCLA RQ (lbs.)**	**Section 313**
Distillates (petroleum), hydrotreated light	Not listed.	Not listed.	Not listed.	Not listed.
Solvent naphtha (petroleum), heavy aromatic	Not listed.	Not listed.	Not listed.	Not listed.
Distillates (petroleum), hydrotreated heavy naphthenic	Not listed.	Not listed.	Not listed.	Not listed.
Carbon dioxide	Not listed.	Not listed.	Not listed.	Not listed.
Naphthalene	Not listed.	Not listed.	100	313
Dinonylphenol, ethoxylated, phosphated	Not listed.	Not listed.	Not listed.	Not listed.

State Regulations

California Proposition 65:

This product contains a chemical known to the State of California to cause cancer.

Global Inventories:

Ingredient	USA TSCA
Distillates (petroleum), hydrotreated light	Yes.
Solvent naphtha (petroleum), heavy aromatic	Yes.
Distillates (petroleum), hydrotreated heavy naphthenic	Yes.
Carbon dioxide	Yes.
Naphthalene	Yes.
Dinonylphenol, ethoxylated, phosphated	Yes.

SAFETY DATA SHEET

NFPA-National Fire Protection Association:	
Health:	2
Fire:	4
Reactivity:	0

HMIS-Hazardous Materials Identification System:	
Health:	2*
Fire:	4
Physical Hazard:	0

Hazard Rating: 0 = minimal, 1 = slight, 2 = moderate, 3 = severe, 4 = extreme

SOURCE AGENCY CARCINOGEN CLASSIFICATIONS:

CP65 **California Proposition 65**

OSHA (O) **Occupational Safety and Health Administration.**

ACGIH (G) **American Conference of Governmental Industrial Hygienists.**
A1 - Confirmed human carcinogen.
A2 - Suspected human carcinogen.
A3 - Animal carcinogen.
A4 - Not classifiable as a human carcinogen.
A5 - Not suspected as a human carcinogen.

IARC (I) **International Agency for Research on Cancer.**
1 - The agent (mixture) is carcinogenic to humans.
2A - The agent (mixture) is probably carcinogenic to humans; there is limited evidence of carcinogenicity in humans and sufficient evidence of carcinogenicity in experimental animals.
2B - The agent (mixture) is possibly carcinogenic to humans; there is limited evidence of carcinogenicity in humans in the absence of sufficient evidence of carcinogenicity in experimental animals.
3 - The agent (mixture, exposure circumstance) is not classifiable as to its carcinogenicity to humans.
4 - The agent (mixture, exposure circumstance) is probably not carcinogenic to humans.

NTP (N) **National Toxicology Program.**
1 - Known to be carcinogens.
2 - Reasonably anticipated to be carcinogens.

Section 16: OTHER INFORMATION

Date of Preparation: May 26, 2014

Version: 1.0

Revision Date: May 26, 2014

Disclaimer: We believe the statements, technical information and recommendations contained herein are reliable, but they are given without warranty or guarantee of any kind. The information contained in this document applies to this specific material as supplied. It may not be valid for this material if it is used in combination with any other materials. It is the user's responsibility to satisfy oneself as to the suitability and completeness of this information for the user's own particular use.

Prepared by: Nexreg Compliance Inc.
Phone: (519) 488-5126
www.nexreg.com

Prepared for: The Blaster Corporation

End of Safety Data Sheet

Sea Foam Sales Company
12987 Pioneer Trail
Eden Prairie, MN, USA 55347

SAFETY DATA SHEET

SECTION 1. IDENTIFICATION

Product identifier used on the label
: **Sea Foam Motor Treatment**

Product Code(s) : SF-16, SF-128, SF-55

Recommended use of the chemical and restrictions on use
: Fuel system treatment / Transmission treatment.
Use pattern: Consumer use; professional use.

Chemical family : Mixture.

Name, address, and telephone number of the supplier:

Sea Foam Sales Company

12987 Pioneer Trail
Eden Prairie, MN, USA
55347

Supplier's Telephone # : (952) 938-4811

24 Hr. Emergency Tel # : INFOTRAC - (800) 535-5053 (Within Continental US); (352) 323-3500 (Outside US)
NOTE: INFOTRAC emergency number is to be used only in the event of chemical emergencies involving a spill, leak, fire, exposure or accident involving chemicals.

Name, address, and telephone number of the manufacturer:

Refer to supplier

SECTION 2. HAZARDS IDENTIFICATION

Classification of the chemical

Clear liquid. Petroleum hydrocarbon odor.

Most important hazards: This material is classified as hazardous under OSHA regulations (29CFR 1910.1200) (Hazcom 2012). Hazardous classification:
- Flammable liquid - Category 2
- Serious eye damage/eye irritation - Category 2A
- Specific target organ toxicity - single exposure - Category 3
- Aspiration toxicity - Category 1

WHMIS information: This product is a WHMIS Controlled Product. It meets one or more of the criteria for a controlled product provided in Part IV of the Canadian Controlled Products Regulations (CPR). WHMIS Classification:
- Class B2 (Flammable Liquids)
- Class D2B (Materials Causing Other Toxic Effects, Toxic Material)

Label elements

The following label information is applicable only to the United States according to OSHA Regulations (29 CFR 1910.1200) (Hazcom 2012):

Signal Word

DANGER!

Hazard statement(s)

Highly flammable liquid and vapor.
Causes serious eye irritation.
May cause drowsiness and dizziness.
May be fatal if swallowed and enters airways.

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Precautionary statement(s)

Keep away from heat, sparks and open flame. - 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/clothing and eye/face protection.
Wash hands and face thoroughly after handling.
Avoid breathing vapor or mist.
Use only outdoors or in a well-ventilated area.

IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.
In case of fire: Use water fog, dry chemical, CO2 or 'alcohol' foam for extinction.
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do.
Continue rinsing. If eye irritation persists, get medical advice/attention.
IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.
Call a POISON CENTER or doctor/physician if you feel unwell.
IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician.
Do NOT induce vomiting.
Store in a well-ventilated place. Keep cool.
Store locked up.
Dispose of contents/container in accordance with local regulation.

The following label information is applicable only to Canada according to the Canadian Controlled Products Regulations (CPR/WHMIS):

Danger! Flammable liquid and vapor. Vapors may cause flash fire. Harmful or fatal if swallowed. Can enter the lungs and cause damage. Harmful if inhaled. May cause nausea, vomiting, headache and other central nervous system effects. May cause respiratory irritation. Causes eye irritation. May cause mild skin irritation.

Precautions: Use only in well-ventilated areas. Wear suitable protective equipment during handling. Avoid breathing vapors or mists. Avoid contact with skin, eyes and clothing. Keep away from heat, sparks and open flame. - No smoking. Ground all equipment during handling. Avoid contact with strong oxidizing agents. Wash thoroughly after handling. Keep containers tightly closed when not in use. Store in a cool, dry, well-ventilated area, away from heat and ignition sources.

FIRST AID: If inhaled, move to fresh air. If breathing is difficult, give oxygen by qualified medical personnel only. If breathing stopped, begin artificial respiration. Get medical attention. For skin contact, wash with soap and water while removing contaminated clothing. If irritation persists, seek prompt medical attention. For eye contact, flush with running water for at least 15 minutes. If irritation persists, seek prompt medical attention. If ingested, do not induce vomiting. If vomiting occurs spontaneously, keep head below hips to prevent aspiration of liquid into lungs. Get medical attention.

Refer To Material Safety Data Sheet for further information.

Other hazards

SAFETY DATA SHEET

Other hazards which do not result in classification:
Burning produces noxious and toxic fumes. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea. Prolonged skin contact may cause dermatitis (rash), characterized by red, dry, itching skin. Toxic to aquatic life with long lasting effects.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical name	CAS #	Concentration
Hydrocarbon blend*	Blend	< 95%
Isopropanol	67-63-0	< 25%

*Note: The exact composition of the above listed chemicals are being withheld as a trade secret.

SECTION 4. FIRST-AID MEASURES

Description of first aid measures

Ingestion : Seek immediate medical attention/advice. Do not induce vomiting. Never give anything by mouth to an unconscious person. If vomiting occurs spontaneously, keep victim's head lowered (forward) to reduce the risk of aspiration.

Inhalation : Immediately remove person to fresh air. If breathing has stopped, give artificial respiration. If breathing is difficult, give oxygen by qualified medical personnel only. Get medical attention.

Skin contact : Immediately remove/take off all contaminated clothing. Wash exposed area thoroughly with soap and water for at least 15 minutes. If irritation or symptoms develop, seek medical attention.

Eye contact : Immediately flush eyes with plenty of water for at least 15 minutes. Get medical attention.

Most important symptoms and effects, both acute and delayed

: Causes serious eye irritation.
Causes respiratory tract irritation.
May cause drowsiness and dizziness.
May cause damage to the nervous system through prolonged or repeated exposure.
Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea.

Indication of any immediate medical attention and special treatment needed

: Treat symptomatically. This product is a CNS depressant.

SECTION 5. FIRE-FIGHTING MEASURES

Extinguishing media

Suitable extinguishing media

: Dry chemical, foam, carbon dioxide and water fog.

Unsuitable extinguishing media

: Do not use a solid water stream as it may scatter and spread fire.

Special hazards arising from the substance or mixture / Conditions of flammability

: Highly flammable liquid and vapor. May be ignited by open flame. Vapors are heavier than air and collect in confined and low-lying areas. The product is insoluble and floats on water. The pressure in sealed containers can increase under the influence of heat.

Flammability classification (OSHA 29 CFR 1910.106)

: Flammable liquid - Category 2

Explosion Data: Sensitivity to Mechanical Impact / Static Discharge:

: Not expected to be sensitive to mechanical impact. May be sensitive to static discharge. Vapors in the flammable range may be ignited by a static discharge of sufficient energy.

SAFETY DATA SHEET

Hazardous combustion products

: Carbon oxides; Nitrogen oxides (NOx); Sulphur oxides; Other unidentified organic compounds; irritating fumes and smoke.

Special protective equipment and precautions for firefighters

Protective equipment for fire-fighters

: Firefighters should wear proper protective equipment and self-contained breathing apparatus with full face piece, operated in positive pressure mode.

Special fire-fighting procedures

: Move containers from fire area, if safe to do so. Water spray may be useful in cooling equipment exposed to heat and flame. Direct water or foam spray may cause frothing which can increase the intensity and range of the fire.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

: All persons dealing with clean-up should wear the appropriate protective equipment including self-contained breathing apparatus. Keep all other personnel upwind and away from the spill/release. Restrict access to area until completion of clean-up. Refer to protective measures listed in sections 7 and 8.

Environmental precautions

: Do not allow material to contaminate ground water system. If necessary, dike well ahead of the spill to prevent runoff into drains, sewers, or any natural waterway or drinking supply.

Methods and material for containment and cleaning up

: Ventilate the area. Remove all sources of ignition. Prevent further leakage or spillage if safe to do so. Use only non-sparking tools. Soak up with inert absorbent material. Do not use combustible absorbents, such as sawdust. Pick up and transfer to properly labeled containers. Contaminated absorbent material may pose the same hazards as the spilled product. Contact the proper local authorities.

Special spill response procedures

: If a spill/release in excess of the EPA reportable quantity is made into the environment, immediately notify the national response center in the United States (phone: 1-800-424-8802).
US CERCLA Reportable quantity (RQ): None.

SECTION 7. HANDLING AND STORAGE

Precautions for safe handling

: Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Wear protective gloves and eye/face protection. Use only in well-ventilated areas. Avoid breathing vapor or mist. Avoid contact with eyes, skin and clothing. Keep away from heat, sparks and open flame. - No smoking. Ground/Bond container and receiving equipment. Take precautionary measures against static discharges. Use explosion-proof ventilating equipment. Keep container tightly closed. Do not eat, drink or smoke when using this product. Empty containers retain residue (liquid and/or vapor) and can be dangerous. Wash thoroughly after handling.

Conditions for safe storage

: Store in a cool, dry, well-ventilated area. Store locked up. Storage area should be clearly identified, clear of obstruction and accessible only to trained and authorized personnel. No smoking. Protect from sunlight. Have appropriate fire extinguishers and spill clean-up equipment in or near storage area.

SECTION 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

SAFETY DATA SHEET

Exposure Limits:

Chemical Name	ACGIH TLV		OSHA PEL	
	TWA	STEL	PEL	STEL
Hydrocarbon Blend	5 mg/m³ (inhalable fraction, mineral oil mists)	N/Av	5 mg/m³ (As 'Oil mist, mineral')	N/Av
Isopropanol	200 ppm	400 ppm	400 ppm ; 980 mg/m³	N/Av

Exposure controls

Ventilation and engineering measures
: Provide mechanical ventilation in confined spaces. Use explosion-proof equipment.

Respiratory protection : If the TLV is exceeded, a NIOSH/MSHA-approved respirator is advised.

Skin protection : Impervious gloves must be worn when using this product. Advice should be sought from glove suppliers. Wear long sleeved shirt and pants to minimize exposed skin.

Eye / face protection : Chemical safety glasses with side shields or splash proof goggles. A full face shield may also be necessary.

Other protective equipment : Depending on conditions of use, an impervious apron should be worn. An eyewash station and safety shower should be made available in the immediate working area.

General hygiene considerations
: Avoid breathing vapor or mist. Avoid contact with eyes, skin and clothing. Do not eat, drink or smoke when using this product. Wash thoroughly after handling. Remove and wash contaminated clothing before re-use. Handle in accordance with good industrial hygiene and safety practice.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance : Clear liquid.

Odor : Typical odor.

Odor threshold : No information available.

pH : No information available.

Melting/Freezing point : No information available.

Initial boiling point and boiling range
: No information available.

Flash point : 12.8°C / 55°F

Flashpoint (Method) : TCC

Evaporation rate (BuAe = 1) : <1

Flammability (solid, gas) : Not applicable.

Lower flammable limit (% by vol.)
: No information available.

Upper flammable limit (% by vol.)
: No information available.

Oxidizing properties : None known.

Explosive properties : Not explosive

Vapor pressure : No information available.

Vapor density : >1

Relative density / Specific gravity : 0.819

Solubility in water : Insoluble.

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Other solubility(ies)	:	No information available.
Partition coefficient: n-octanol/water or Coefficient of water/oil distribution	:	No information available.
Auto-ignition temperature	:	No information available.
Decomposition temperature	:	No information available.
Viscosity	:	No information available.
Volatiles (% by weight)	:	No information available.
Volatile organic Compounds (VOC's)	:	367g/l
Absolute pressure of container	:	Not applicable.
Flame projection length	:	Not applicable.
Other physical/chemical comments	:	No additional information.

SECTION 10. STABILITY AND REACTIVITY

Reactivity	:	Not normally reactive.
Chemical stability	:	Stable under normal conditions.
Possibility of hazardous reactions	:	Hazardous polymerisation does not occur.
Conditions to avoid	:	Avoid heat and open flame. Do not use in areas without adequate ventilation. Avoid contact with incompatible materials.
Incompatible materials	:	Strong oxidizing agents; Acids; Caustics.
Hazardous decomposition products	:	None known, Refer to hazardous combustion products in Section 5.

SECTION 11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure:

Routes of entry inhalation	:	YES
Routes of entry skin & eye	:	YES
Routes of entry Ingestion	:	YES
Routes of exposure skin absorption	:	YES

Potential Health Effects:

Signs and symptoms of short-term (acute) exposure

Sign and symptoms Inhalation

: Inhalation of vapors can cause nasal and respiratory irritation. Exposure to high vapor concentration can cause dizziness, nausea and central nervous system depression. Saturated vapors can be encountered in confined spaces and/or under conditions of poor ventilation.

Sign and symptoms ingestion

: Swallowing may cause irritation, nausea and vomiting. May cause central nervous system depression. May be absorbed and cause symptoms similar to those for inhalation. Symptoms may include burning pain, vomiting and diarrhea. Aspiration into the lungs during swallowing or subsequent vomiting may cause chemical pneumonitis, which can be fatal.

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Sign and symptoms skin	:	May cause mild skin irritation. May be absorbed and cause symptoms similar to those for inhalation.
Sign and symptoms eyes	:	May cause moderate eye irritation.
Potential Chronic Health Effects	:	Prolonged skin contact may cause dermatitis (rash), characterized by red, dry, itching skin. Prolonged overexposure to product can result in permanent central nervous system changes. May cause lung inflammation and lung damage with extreme exposures.
Mutagenicity	:	Not expected to be mutagenic in humans.
Carcinogenicity	:	No components are listed as carcinogens by ACGIH, IARC, OSHA or NTP.
Reproductive effects & Teratogenicity	:	Not expected to have other reproductive effects.
Sensitization to material	:	Not expected to be a skin or respiratory sensitizer.
Specific target organ effects	:	Eyes, skin, respiratory system, digestive system, central nervous system. The substance or mixture is classified as specific target organ toxicant, single exposure, category 3 with narcotic effects. The substance or mixture is not classified as specific target organ toxicant, repeated exposure.
Irritancy	:	Moderate eye irritant. Irritating to respiratory system. Mild skin irritant.
Medical conditions aggravated by overexposure	:	None known or reported by the manufacturer.
Synergistic materials	:	None known or reported by the manufacturer.
Toxicological data	:	The calculated ATE values for this mixture are: ATE oral = 23,600 mg/kg ATE dermal = 8343 mg/kg ATE inhalation (mists) = 65.7 mg/L/4H

See below for individual ingredient acute toxicity data.

Chemical name	LC_{50}(4hr) inh, rat	LD_{50} (Oral, rat)	LD_{50} (Rabbit, dermal)
Hydrocarbon Blend	N/Av	>15000 mg/kg	>5000 mg/kg
Isopropanol	17000 ppm	4720 mg/kg	12890 mg/kg

Other important toxicological hazards
: None known or reported by the manufacturer.

SECTION 12. ECOLOGICAL INFORMATION

Ecotoxicity : No data is available on the product itself.

SAFETY DATA SHEET

Persistence and degradability

: The product itself has not been tested. Contains: Isopropanol. Isopropanol is considered to be readily biodegradable.

Bioaccumulation potential : The product itself has not been tested.

Mobility in soil : The product itself has not been tested.

Other Adverse Environmental effects

: None known.

SECTION 13. DISPOSAL CONSIDERATIONS

Handling for Disposal : Handle in accordance with good industrial hygiene and safety practice. Refer to protective measures listed in sections 7 and 8. Empty containers retain residue (liquid and/or vapor) and can be dangerous. Do not cut, weld, drill or grind on or near this container.

Methods of Disposal : Dispose of in accordance with federal, provincial and local hazardous waste laws. Contact your local, state or federal environmental agency for specific rules. For assistance with your waste management needs, contact EMCO's Waste Services Division at (262) 658-4000.

RCRA : If this product, as supplied, becomes a waste in the United States, it may meet the criteria of a hazardous waste as defined under RCRA, Title 40 CFR 261. It is the responsibility of the waste generator to determine the proper waste identification and disposal method. For disposal of unused or waste material, check with local, state and federal environmental agencies.

SECTION 14. TRANSPORTATION INFORMATION

Regulatory Information	UN Number	UN proper shipping name	Transport hazard class(es)	Packing Group	Label
TDG	UN1993	FLAMMABLE LIQUID, N.O.S. (Hydrocarbon Blend; Isopropanol)	3	II	
TDG Additional information	ERG #128 The listed transportation information applies only to ground transport and does not address regulatory variations due to changes in package size, mode of shipment, or other regulatory descriptors.				
49CFR/DOT	UN1993	Flammable Liquids, n.o.s. (Hydrocarbon Blend; Isopropanol)	ORM-D	II	
49CFR/DOT Additional information	ERG #128 The listed transportation information applies only to ground transport and does not address regulatory variations due to changes in package size, mode of shipment, or other regulatory descriptors.				

Special precautions for user : Appropriate advice on safety must accompany the package. Keep away from heat, sparks and open flame. - No smoking.

Environmental hazards : This mixture meets the criteria for an environmentally hazardous material according to the IMDG Code. See ECOLOGICAL INFORMATION, Section 12.

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

: This information is not available.

SECTION 15. REGULATORY INFORMATION

US Federal Information:

TSCA: All listed ingredients appear on the Toxic Substances Control Act (TSCA) inventory.

US CERCLA Reportable quantity (RQ): None.

SAFETY DATA SHEET

SARA TITLE III: Sec. 302, Extremely Hazardous Substances, 40 CFR 355: No Extremely Hazardous Substances are present in this material.

SARA TITLE III: Sec. 311 and 312, MSDS Requirements, 40 CFR 370 Hazard Classes: Fire Hazard; Immediate (Acute) health hazard; Chronic Health Hazard. Under SARA Sections 311 and 312, the EPA has established threshold quantities for the reporting of hazardous chemicals. The current thresholds are 500 pounds for the threshold planning quantity (TPQ), whichever is lower, for extremely hazardous substances and 10,000 pounds for all other hazardous chemicals.

SARA TITLE III: Sec. 313, Toxic Chemicals Notification, 40 CFR 372: This product may be subject to SARA notification requirements, since it contains Toxic Chemical constituents above their de minimus concentrations. This product contains: Isopropanol.

US State Right to Know Laws:

California Proposition 65: To the best of our knowledge, this product does not contain any chemicals known to the State of California to cause cancer or reproductive harm.

Other U.S. State "Right to Know" Lists: The following chemicals are specifically listed by individual States: Isopropanol (MA, MN, NJ, CA, PA, RI)

Canadian Information:

Canadian Environmental Protection Act (CEPA) information: All ingredients listed appear on the Domestic Substances List (DSL).

WHMIS information: Refer to Section 2 for a WHMIS Classification for this product.
This product has been classified according to the hazard criteria of the CPR and the MSDS contains all of the information required by the CPR.

International Information:

European EINECs information: All ingredients listed appear on the European EINECs inventory.

SECTION 16. OTHER INFORMATION

Legend : ACGIH: American Conference of Governmental Industrial Hygienists
ATE: Acute Toxicity Estimate
CAS: Chemical Abstract Services
IARC: International Agency for Research on Cancer
Inh: Inhalation
N/Ap: Not Applicable
N/Av: Not Available
NIOSH: National Institute of Occupational Safety and Health
OSHA: Occupational Safety and Health Administration
PEL: Permissible exposure limit
RTECS: Registry of Toxic Effects of Chemical Substances
STEL: Short Term Exposure Limit
TDG: Canadian Transportation of Dangerous Goods Act & Regulations
TLV: Threshold Limit Values TWA:
Time Weighted Average TSCA:
Toxic Substance Control Act
WHMIS: Workplace Hazardous Materials Identification System

References : 1. ACGIH, Threshold Limit Values and Biological Exposure Indices for 2012.
2. International Agency for Research on Cancer Monographs, searched 2012.
3. Canadian Centre for Occupational Health and Safety, CCInfoWeb databases (Chempendium, HSDB and RTECs). (2012)
4. Material Safety Data Sheets from manufacturer.
5. US EPA Title III List of Lists - July 2011.
6. California Proposition 65 List - 20 July 2012.

Preparation Date

: 06/20/2007

SAFETY DATA SHEET

Reviewed Date SDS

: 02/17/2015

Revision No. : 3

Revision Information : (M)SDS sections updated: All (format change)

Other special considerations for handling

: Provide adequate information, instruction and training for operators.

HMIS Rating : *- Chronic hazard 0 - Minimal 1 - Slight 2 - Moderate 3 - Serious 4 - Severe
Health: 1 *Flammability:* 3 *Reactivity:* 0

NFPA Rating : 0 - Minimal 1 - Slight 2 - Moderate 3 - Serious 4 - Severe
Health: 1 *Flammability:* 3 *Instability:* 0 *Special Hazards:* X

Prepared for: Direct all enquiries to: Sea Foam Sales Company 12987 Pioneer Trail Eden Prairie, MN, USA 55347 Telephone: (952) 938-4811	
Prepared by: ICC The Compliance Center Inc. http://www.thecompliancecenter.com	

DISCLAIMER

This Safety Data Sheet was prepared by ICC The Compliance Center Inc using information provided by Sea Foam Sales Company and CCOHS' Web Information Service. The information in the Safety Data Sheet is offered for your consideration and guidance when exposed to this product. ICC The Compliance Center Inc and Sea Foam Sales Company expressly disclaim all expressed or implied warranties and assume no responsibilities for the accuracy or completeness of the data contained herein. The data in this SDS does not apply to use with any other product or in any other process.

This Safety Data Sheet may not be changed, or altered in any way without the expressed knowledge and permission of ICC The Compliance Center Inc. and Sea Foam Sales Company.

END OF DOCUMENT

ZECOL™

Effective Date: June 1, 2015

Product #(s) - 104

Safety Data Sheet

For Emergency Call:
CHEM-TEL (800) 255-3924 24 Hour Assistance

1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Name: Zeco Mendtite Heavy Duty Radiator Sealer

CAS Number: 7732-18-5 / 9004-34-6 / 67-63-0
Recommended Uses: Radiator Sealer
Company Identification
Manufacturer's Name: ZECOL PRODUCTS COMPANY
Address: 4635 Willow Drive, Medina, MN 55340
Telephone – General Information: (763) 478-3438

2. HAZARDS IDENTIFICATION

Hazard Classes: None

Signal Word: None

Hazard Statements: None

Precautionary Statements:

P101	If medical advice is needed, have product container or label at hand.
P102	Keep out of reach of children,
P103	Read label before use.

Hazard Pictograms: None

3. COMPOSITION/INFORMATION ON INGREDIENTS

Components	Typical Weight Percentage	CAS Number
Water	94-95%	7732-18-5
Powdered Cellulose	2-3%	9004-34-6
Isopropyl Alcohol	1%	67-63-0

4. FIRST AID

Eyes: If irritation or redness develops, move victim away from exposure and into fresh air. Flush eyes with clean water. If symptoms persist, seek medical attention.

Skin: First aid is not normally required. However, it is good practice to wash any chemical from the skin.
Inhalation: First aid is not normally required. If breathing difficulties develop, move victim away from source of exposure and into fresh air. Seek immediate medical attention

Ingestion: First aid is not normally required. However, if swallowed and symptoms develop, seek medical attention.

Medical Conditions: None known.

5. FIRE FIGHTING MEASURES

Suitable Extinguishing Media: Use material that is appropriate for the surrounding fire.

Specific Hazards: None known.

Hazardous Combustion Products: None anticipated.

Special Firefighting Procedures: For fires beyond the initial stage, emergency responders in the immediate hazard area should wear bunker gear. When the potential chemical hazard is unknown, in enclosed or confined spaces, or when explicitly required by DOT, a self-contained breathing apparatus should be worn. In addition, wear other appropriate protective equipment as conditions warrant (see Section 8). Isolate immediate hazard area and keep unauthorized personnel out. Cool equipment exposed to fire with water, if it can be done with minimal risk.

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions: None anticipated

Environmental Precautions: Stop spill/release if it can be done with minimal risk. Prevent spilled material from entering sewers, storm drains, other unauthorized treatment drainage systems, and natural waterways.

Methods for Containment and Clean-Up: Immediate cleanup of any spill is recommended. Dike far ahead of spill for later recovery or disposal. Absorb spill with inert material such as sand, earth or other non-combustible material, and place in suitable container for disposal.

7. HANDLING AND STORAGE

Precautions for Safe Handling: Use good personal hygiene practice.

Conditions for Safe Storage: Store only in approved containers. Protect container(s) against physical damage.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Exposure Guidelines

Component	ACGIH TLV	ACGIH STEL	OSHA PEL	OSHA STEL
Isopropyl Alcohol	200 ppm	400 ppm	400 ppm	---

Engineering Controls: If current ventilation practices are not adequate to maintain airborne concentrations below the established exposure limits, additional ventilation or exhaust systems may be required.

Specific Personal Protective Equipment

Eye/Face Protection: While contact with this material is no expected to cause irritation, the use of approved eye protection to safeguard against potential eye contact is considered good practice.

Skin: Not required based on the hazards of the material. However, it is considered good practice to wear gloves when handling chemicals.

Respiratory Protection: Respiratory protection is not usually required.

A respiratory protection program that meets OSHA's 29 CFR 1910.134 and ANSI Z88.2 requirements must be followed whenever workplace conditions warrant a respirator's use. Air-purifying respirators provide limited protection and cannot be used in atmospheres that exceed the maximum use concentration as directed by regulation or the manufacturer's instructions, in oxygen deficient (less than 19.5% oxygen) situations or under conditions that are immediately dangerous to life and health (IDLH).

Use a positive pressure air supplied respirator if there is potential for uncontrolled release, exposure levels are unknown, or any other circumstances where air-purifying respirators may not provide adequate protection.

Other Protective Equipment: A source of clean water should be available in the work area for flushing eyes and skin. Impervious clothing should be worn as needed.

Suggestions provided in this section for exposure control and specific types of protective equipment are based on readily available information. Users should consult with the specific manufacturer to confirm the performance of their protective equipment. Specific situations may require consultation with industrial hygiene, safety, or engineering professionals.

9. PHYSICAL AND CHEMICAL PROPERTIES (approximate values)

Appearance: Clear liquid
Odor: Mild alcohol
Odor threshold: No data
pH: Not applicable
Melting/Freezing Point: 0°C / 32°F
Boiling point (at 1 atm): 82-100°C / 180-212 °F
Flash Point: Non-flammable (>200 °F)
Auto-Ignition Temperature: Non-flammable
Evaporation rate (butyl acetate = 1): No data
Flammability (solid, gas): Not applicable
Explosive Limits: Non-flammable
Vapor Pressure: No data
Vapor Density (air = 1): >1
Specific gravity (H_20 = 1): 1 @ 20°C / 68 °F
Solubility in water: Soluble
Partition Coefficient: No data

Decomposition Temperature: No data
Viscosity: No data

10. STABILITY AND REACTIVITY

Stability (thermal, light, etc.): Stable under normal conditions of storage and handling.

Conditions to Avoid: None known

Incompatibility (materials to avoid): Avoid contact with nitric and sulfuric acids, strong oxidizing agents, aldehydes, halogens and halogen compounds.

Hazardous Decomposition Products: Carbon oxides.

Hazardous Polymerization: Will not occur.

11. TOXICOLOGICAL INFORMATION

Acute Toxicity:

Product/Ingredient Name	Result	Species	Dose
Mendtite Heavy Duty Sealer	LD50 Oral LD50 Dermal LC50 Inhalation (vapor)	_____ _____ _____	>5 g/kg >2 g/kg > 20 mg/l (vapor)
Isopropyl Alcohol	LD50 Oral LD50 Dermal LC50 Inhalation (vapor)	Rat Rabbit Rat	5.84 g/kg 12.8 g/kg 19000 ppm – 8hr

Skin Corrosion/Irritation: Not an irritant.

Serious Eye Damage/Irritation: Not an irritant.

Signs and Symptoms: High concentrations may cause irritation of nose, throat and digestive tract, nausea, vomiting, diarrhea, drowsiness, cramps and loss of consciousness.

Skin Sensitization: None reported

Respiratory Sensitization: None reported

Germ Cell Mutagenicity: None reported

Carcinogenicity: None reported. It is not listed by NTP, IARC or OSHA.

Reproductive Toxicity: Although it is not classified, Isopropyl alcohol has produced developmental effects but only at high doses.

Specific Target Organ Toxicity (Single Exposure): None reported.

Specific Target Organ Toxicity (Repeated Exposure): None reported

Product #(s) - 104

12. ECOLOGICAL INFORMATION

Toxicity: Material is primarily water and therefore is aquatically non-toxic.

Ingredient Name	Result	Species	Exposure
Isopropyl Alcohol	Acute EC50 = 9714 mg/L Fresh Water	Invertebrate	24 hrs
	Acute LC50 = >10,000 mg/L Fresh Water	Invertebrate	24 hrs

Persistence and Degradability: Material does not persist or degrade.

Bioaccumulative Potential: Will not bioaccumulate.

Mobility in Soil: Not applicable

Other Adverse Effects: None known

13. DISPOSAL CONSIDERATIONS

The generator of a waste is always responsible for making proper hazardous waste determinations and needs to consider state and local requirements in addition to federal regulations.

Recycle wherever possible. Large volumes may be suitable for re-distillation or, if contaminated, incinerated. Can be disposed of in a sewage treatment facility.

This material, if discarded as produced would not be a federally regulated RCRA hazardous waste . Use which results in chemical or physical change of this material could subject it to additional regulation as a hazardous waste.

14. TRANSPORT INFORMATION

DOT/TDG Proper Shipping Name: Not Regulated
DOT/TDG Identification Number: Not Regulated
DOT Hazard Class: None / **TDG Hazard Class:** None
DOT/TDG Packing Group: Not Regulated
ERG Guide Number: None
Marine Pollutant: No

15. REGULATORY INFORMATION

TSCA: Components are listed on the TSCA inventory.

DSL: Components are listed on the DSL inventory.

OSHA (Occupational Safety and Health Administration): This material is NOT considered to be hazardous as defined by the OSHA Hazard Communication Standard.

This material has not been identified as a carcinogen by NTP, IARC or OSHA

CERCLA/SARA – Section 302 Extremely Hazardous Substances and TPQ (in pounds): This material does NOT contain chemicals subject to the reporting requirements of SARA 302 and 40 CFR 355 Appendix A and B.

EPA (CERCLA) Reportable Quantity (in pounds): This material does NOT contain chemicals subject to the reporting requirements of 40 CFR 302.4.

CERCLA/SARA - Sections 311/312 (Title III Hazard Categories):
Acute: No Chronic: No Fire: No Reactivity: No

CERCLA/SARA – Section 313 and 40 CFR 372: This material does NOT contain chemicals subject to the reporting requirements of SARA 313 and SARA Title III and 40 CFR:

California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material does NOT contain detectable chemicals known to the State of California to cause cancer and/or reproductive toxicity.

Canada:
This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the SDS contains all the information required by the Regulations.

WHMIS Hazard Class: None

16. OTHER INFORMATION

Issue Date: June 1, 2015
Previous Issue Date: June 16, 2012
Change: Minor wording changes.

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