Material Safety Data Sheet

SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: Safest Stripper(TM) Paint and Varnish Remover, Catalog Nos. 10100, 10101, 10102, and 10103
MANUFACTURER: 3M
DIVISION: Construction and Home Improvement Markets

ADDRESS: 3M Center
St. Paul, MN 55144-1000

EMERGENCY PHONE: 1-800-364-3577 or (651) 737-6501 (24 hours)

Issue Date: 10/29/10
Supercedes Date: 10/29/10

Document Group: 11-1756-3

Product Use:
Intended Use: paint and varnish remover

SECTION 2: INGREDIENTS

Ingredient	C.A.S. No.	% by Wt
WATER	7732-18-5	65 - 75
DIMETHYL ADIPATE	627-93-0	20 - 30
DIMETHYL GLUTARATE	1119-40-0	1 - 5
SMECTITE	12199-37-0	1 - 5

SECTION 3: HAZARDS IDENTIFICATION

3.1 EMERGENCY OVERVIEW

Odor, Color, Grade: off white, slight ester odor.
General Physical Form: Liquid
Immediate health, physical, and environmental hazards:

3.2 POTENTIAL HEALTH EFFECTS

Eye Contact:
Mild Eye Irritation: Signs/symptoms may include redness, pain, and tearing.

Skin Contact:
Mild Skin Irritation: Signs/symptoms may include localized redness, swelling, and itching.

Inhalation:
Respiratory Tract Irritation: Signs/symptoms may include cough, sneezing, nasal discharge, headache, hoarseness, and nose and throat pain.

Ingestion:
Gastrointestinal Irritation: Signs/symptoms may include abdominal pain, stomach upset, nausea, vomiting and diarrhea.

SECTION 4: FIRST AID MEASURES

4.1 FIRST AID PROCEDURES

The following first aid recommendations are based on an assumption that appropriate personal and industrial hygiene practices are followed.

Eye Contact: Flush eyes with large amounts of water. If signs/symptoms persist, get medical attention.

Skin Contact: Wash affected area with soap and water. If signs/symptoms develop, get medical attention.

Inhalation: Remove person to fresh air. If signs/symptoms develop, get medical attention.

If Swallowed: Do not induce vomiting unless instructed to do so by medical personnel. Give victim two glasses of water. Never give anything by mouth to an unconscious person. Get medical attention.

SECTION 5: FIRE FIGHTING MEASURES

5.1 FLAMMABLE PROPERTIES

Autoignition temperature	*No Data Available*
Flash Point	*Not Applicable*
Flammable Limits - LEL	*No Data Available*
Flammable Limits - UEL	*No Data Available*

5.2 EXTINGUISHING MEDIA
Material will not burn.

5.3 PROTECTION OF FIRE FIGHTERS

Special Fire Fighting Procedures: Wear full protective equipment (Bunker Gear) and a self-contained breathing apparatus (SCBA).

Unusual Fire and Explosion Hazards: Not applicable.

Note: See STABILITY AND REACTIVITY (SECTION 10) for hazardous combustion and thermal decomposition information.

SECTION 6: ACCIDENTAL RELEASE MEASURES

Personal precautions
Evacuate unprotected and untrained personnel from hazard area. The spill should be cleaned up by qualified personnel. Ventilate the area with fresh air. For large spill, or spills in confined spaces, provide mechanical ventilation to disperse or exhaust vapors, in accordance with good industrial hygiene practice. Warning! A motor could be an ignition source and could cause flammable gases or vapors in the spill area to burn or explode.

Environmental procedures
For larger spills, cover drains and build dikes to prevent entry into sewer systems or bodies of water. Place in a closed container approved for transportation by appropriate authorities.

Clean-up methods
Contain spill. Working from around the edges of the spill inward, cover with bentonite, vermiculite, or commercially available inorganic absorbent material. Mix in sufficient absorbent until it appears dry. Collect as much of the spilled material as possible. Seal the container.

In the event of a release of this material, the user should determine if the release qualifies as reportable according to local, state, and federal regulations.

SECTION 7: HANDLING AND STORAGE

7.1 HANDLING
Do not eat, drink or smoke when using this product. Wash exposed areas thoroughly with soap and water. Avoid breathing of vapors, mists or spray. Avoid eye contact with vapors, mists, or spray. Keep out of the reach of children. Avoid contact with oxidizing agents.

7.2 STORAGE
Store away from acids. Store away from oxidizing agents.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 ENGINEERING CONTROLS
Use with appropriate local exhaust ventilation. Provide local exhaust ventilation at transfer points. Use in a well-ventilated area. If exhaust ventilation is not available, use appropriate respiratory protection. Use general dilution ventilation and/or local exhaust ventilation to control airborne exposures to below Occupational Exposure Limits and/or control mist, vapor, or spray. If ventilation is not adequate, use respiratory protection equipment.

8.2 PERSONAL PROTECTIVE EQUIPMENT (PPE)

8.2.1 Eye/Face Protection
Avoid eye contact with vapors, mists, or spray.

8.2.2 Skin Protection
Avoid skin contact. Select and use gloves and/or protective clothing to prevent skin contact based on the results of an exposure assessment. Consult with your glove and/or protective clothing manufacturer for selection of appropriate compatible materials.

If irritation of the skin occurs, discontinue use. The use of gloves is recommended for removal of the stripper and paint residue if prolonged contact may occur. Wash thoroughly after use.

8.2.3 Respiratory Protection
Avoid breathing of vapors, mists or spray. Consult the current 3M Respirator Selection Guide for additional information or call 1-800-243-4630 for 3M technical assistance.

8.2.4 Prevention of Swallowing
Do not eat, drink or smoke when using this product. Wash exposed areas thoroughly with soap and water.

8.3 EXPOSURE GUIDELINES

Ingredient	Authority	Type	Limit	Additional Information
DIMETHYL ADIPATE	CMRG	TWA, as Dimethyl Esters	1.5 ppm	
DIMETHYL GLUTARATE	CMRG	TWA, as Dimethyl Esters	1.5 ppm	

SOURCE OF EXPOSURE LIMIT DATA:
ACGIH: American Conference of Governmental Industrial Hygienists
CMRG: Chemical Manufacturer Recommended Guideline
OSHA: Occupational Safety and Health Administration
AIHA: American Industrial Hygiene Association Workplace Environmental Exposure Level (WEEL)

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Odor, Color, Grade:	off white, slight ester odor.
General Physical Form:	Liquid
Autoignition temperature	*No Data Available*
Flash Point	*Not Applicable*
Flammable Limits - LEL	*No Data Available*
Flammable Limits - UEL	*No Data Available*
Boiling point	>=100 ºC
Density	*No Data Available*
Vapor Density	*No Data Available*
Vapor Pressure	Approximately 8 mmHg [*Details:* CONDITIONS: 77 degrees F]

Specific Gravity	1.00 - 1.03 [*Ref Std:* WATER=1]
pH	Approximately 7
Melting point	*No Data Available*
Solubility In Water	*No Data Available*
Evaporation rate	Approximately 1 [*Ref Std:* WATER=1] [*Details:* CONDITIONS: Estimated, based on formulation.]
Volatile Organic Compounds	Approximately 216 g/l [*Test Method:* South Cost Air Qual Mgmt Dist]
Kow - Oct/Water partition coef	*No Data Available*
Percent volatile	94 - 97 % weight
VOC Less H2O & Exempt Solvents	*No Data Available*
Viscosity	60000.0 - 110000.0 centipoise

SECTION 10: STABILITY AND REACTIVITY

Stability: Stable.

Materials and Conditions to Avoid:
10.1 Conditions to avoid
Temperatures above the boiling point

10.2 Materials to avoid
Strong acids
Strong bases
Strong oxidizing agents

Hazardous Polymerization: Hazardous polymerization will not occur.

Hazardous Decomposition or By-Products

Substance	Condition
Carbon monoxide	Not Specified
Carbon dioxide	Not Specified

SECTION 11: TOXICOLOGICAL INFORMATION

Please contact the address listed on the first page of the MSDS for Toxicological Information on this material and/or its components.

SECTION 12: ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION

Not determined.

CHEMICAL FATE INFORMATION

Not determined.

SECTION 13: DISPOSAL CONSIDERATIONS

Waste Disposal Method: Incinerate in an industrial or commercial facility in the presence of a combustible material.

EPA Hazardous Waste Number (RCRA): Not regulated

Since regulations vary, consult applicable regulations or authorities before disposal.

SECTION 14:TRANSPORT INFORMATION

ID Number(s):
70-0702-4874-8, 70-0702-4875-5, 70-0702-4876-3, 70-0702-5448-0, 70-0702-5449-8, 70-0702-5450-6, 70-0703-1086-0, 70-0703-1087-8, 70-0703-5787-9, 70-0703-6043-6, 70-0703-6073-3, 70-0703-6149-1, 70-0703-8518-5, 70-0703-8789-2, 70-0704-1340-9, 70-0704-1382-1, 70-0704-1931-5, 70-0704-1932-3, 70-0704-6281-0, 70-0704-7032-6, 70-0704-7033-4, 70-0704-7034-2, 70-0704-7104-3, 70-0705-2898-2, 70-0705-5395-6, 70-0705-8855-6, 70-0705-8856-4, 70-0705-8857-2, 70-0706-3646-2, 70-0707-9597-9, 70-0707-9598-7, 70-0707-9599-5, 70-0711-8727-5, 70-0714-9458-0, XT-0004-4414-8

For Transport Information, please visit http://3M.com/Transportinfo or call 1-800-364-3577 or 651-737-6501.

SECTION 15: REGULATORY INFORMATION

US FEDERAL REGULATIONS
Contact 3M for more information.

311/312 Hazard Categories:
Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No Immediate Hazard - Yes Delayed Hazard - No

STATE REGULATIONS
Contact 3M for more information.

CHEMICAL INVENTORIES
The components of this product are in compliance with the chemical notification requirements of TSCA.

All applicable chemical ingredients in this material are listed on the European Inventory of Existing Chemical Substances (EINECS), or are exempt polymers whose monomers are listed on EINECS.

Contact 3M for more information.

INTERNATIONAL REGULATIONS

Contact 3M for more information.

This MSDS has been prepared to meet the U.S. OSHA Hazard Communication Standard, 29 CFR 1910.1200.

SECTION 16: OTHER INFORMATION

NFPA Hazard Classification

Health: 1 **Flammability:** 0 **Reactivity:** 0 **Special Hazards:** None

National Fire Protection Association (NFPA) hazard ratings are designed for use by emergency response personnel to address the hazards that are presented by short-term, acute exposure to a material under conditions of fire, spill, or similar emergencies. Hazard ratings are primarily based on the inherent physical and toxic properties of the material but also include the toxic properties of combustion or decomposition products that are known to be generated in significant quantities.

HMIS Hazard Classification

Health: 1 **Flammability:** 0 **Reactivity:** 0 **Protection:** B

Hazardous Material Identification System (HMIS(r)) hazard ratings are designed to inform employees of chemical hazards in the workplace. These ratings are based on the inherent properties of the material under expected conditions of normal use and are not intended for use in emergency situations. HMIS(r) ratings are to be used with a fully implemented HMIS(r) program. HMIS(r) is a registered mark of the National Paint and Coatings Association (NPCA).

Reason for Reissue: The MSDS has been revised because 3M has adopted the 16-section ANSI/ISO format. The potential hazards of the product have not changed. We encourage you to reread the MSDS and review the information.

Revision Changes:
Section 2: Ingredient table was modified.
Copyright was modified.
Section 6: Release measures information was deleted.
Section 6: Release measures heading was deleted.
Section 8: Engineering controls information was modified.
Section 8: Skin protection phrase was modified.
Section 8: Prevention of swallowing information was modified.
Section 10: Materials and conditions to avoid physical property was deleted.
Section 14: Transportation legal text was modified.
Section 9: Property description for optional properties was modified.
Section 14: ID Number(s) Template 1 was modified.
Section 6: Environmental procedures heading was added.
Section 6: Personal precautions heading was added.
Section 10.1 Conditions to avoid heading was added.
Section 10.2 Materials to avoid heading was added.

Section 6: Personal precautions information was added.
Section 6: Environmental procedures information was added.
Section 6: Methods for cleaning up information was added.
Section 10: Materials to avoid physical property was added.
Section 10: Conditions to avoid physical property was added.
Section 8: Hand protection information was added.
Section 6: Clean-up methods heading was added.

DISCLAIMER: The information in this Material Safety Data Sheet (MSDS) is believed to be correct as of the date issued. 3M MAKES NO WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR COURSE OF PERFORMANCE OR USAGE OF TRADE. User is responsible for determining whether the 3M product is fit for a particular purpose and suitable for user's method of use or application. Given the variety of factors that can affect the use and application of a 3M product, some of which are uniquely within the user's knowledge and control, it is essential that the user evaluate the 3M product to determine whether it is fit for a particular purpose and suitable for user's method of use or application.

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3M MSDSs are available at www.3M.com

Material Safety Data Sheet

SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: 3M(TM) Super 77(TM) Multipurpose Adhesive (Aerosol)
MANUFACTURER: 3M
DIVISION: Construction and Home Improvement Markets

ADDRESS: 3M Center, St. Paul, MN 55144-1000

EMERGENCY PHONE: 1-800-364-3577 or (651) 737-6501 (24 hours)

Issue Date: 09/07/12
Supercedes Date: 08/23/12

Document Group: 22-4025-7

Product Use:
Intended Use: Adhesive aerosol
Specific Use: General Purpose Aerosol adhesive

SECTION 2: INGREDIENTS

Ingredient	C.A.S. No.	% by Wt
NON-VOLATILE COMPONENTS (NJ TRADE SECRET # 04499600-6433P)	Trade Secret	20 - 30
ACETONE	67-64-1	20 - 30
PROPANE	74-98-6	15 - 25
2-METHYLPENTANE	107-83-5	10 - 20
CYCLOHEXANE	110-82-7	3 - 7
3-METHYLPENTANE	96-14-0	3 - 7
2,3-DIMETHYLBUTANE	79-29-8	1 - 3
2,2-DIMETHYLBUTANE	75-83-2	1 - 3
HEXANE	110-54-3	< 0.8

SECTION 3: HAZARDS IDENTIFICATION

3.1 EMERGENCY OVERVIEW

Specific Physical Form: Aerosol
Odor, Color, Grade: clear, sweet fruity odor
General Physical Form: Liquid

Immediate health, physical, and environmental hazards: Closed containers exposed to heat from fire may build pressure and explode. Extremely flammable liquid and vapor. Vapors may travel long distances along the ground or floor to an ignition source and flash back. Aerosol container contains flammable material under pressure. May cause target organ effects. Contains a chemical or chemicals which can cause birth defects or other reproductive harm.

3.2 POTENTIAL HEALTH EFFECTS

Eye Contact:
Moderate Eye Irritation: Signs/symptoms may include redness, swelling, pain, tearing, and blurred or hazy vision.

Skin Contact:
Prolonged or repeated exposure may cause:
Mild Skin Irritation: Signs/symptoms may include localized redness, swelling, and itching.

Inhalation:
Intentional concentration and inhalation may be harmful or fatal.

Respiratory Tract Irritation: Signs/symptoms may include cough, sneezing, nasal discharge, headache, hoarseness, and nose and throat pain.

May be absorbed following inhalation and cause target organ effects.

Ingestion:
Gastrointestinal Irritation: Signs/symptoms may include abdominal pain, stomach upset, nausea, vomiting and diarrhea.

May be absorbed following ingestion and cause target organ effects.

Target Organ Effects:
Central Nervous System (CNS) Depression: Signs/symptoms may include headache, dizziness, drowsiness, incoordination, nausea, slowed reaction time, slurred speech, giddiness, and unconsciousness.

Prolonged or repeated exposure may cause:
Peripheral Neuropathy: Signs/symptoms may include tingling or numbness of the extremities, incoordination, weakness of the hands and feet, tremors and muscle atrophy.

Contains a chemical or chemicals which can cause birth defects or other reproductive harm.

SECTION 4: FIRST AID MEASURES

4.1 FIRST AID PROCEDURES

The following first aid recommendations are based on an assumption that appropriate personal and industrial hygiene practices are followed.

Eye Contact: Flush eyes with large amounts of water. If signs/symptoms persist, get medical attention.
Skin Contact: Wash affected area with soap and water. If signs/symptoms develop, get medical attention.
Inhalation: Remove person to fresh air. If signs/symptoms develop, get medical attention.
If Swallowed: Do not induce vomiting unless instructed to do so by medical personnel. Give victim two glasses of water. Never give anything by mouth to an unconscious person. Get medical attention.

SECTION 5: FIRE FIGHTING MEASURES

5.1 FLAMMABLE PROPERTIES

Autoignition temperature	*No Data Available*
Flash Point	-42.00 ºF [*Test Method:* Tagliabue Closed Cup]
Flammable Limits(LEL)	*No Data Available*
Flammable Limits(UEL)	*No Data Available*
OSHA Flammability Classification:	Class IA Flammable Liquid

5.2 EXTINGUISHING MEDIA
Use fire extinguishers with class B extinguishing agents (e.g., dry chemical, carbon dioxide).

5.3 PROTECTION OF FIRE FIGHTERS

Special Fire Fighting Procedures: Wear full protective equipment (Bunker Gear) and a self-contained breathing apparatus (SCBA).

Unusual Fire and Explosion Hazards: Closed containers exposed to heat from fire may build pressure and explode. Extremely flammable liquid and vapor. Vapors may travel long distances along the ground or floor to an ignition source and flash back. Aerosol container contains flammable material under pressure.

Note: See STABILITY AND REACTIVITY (SECTION 10) for hazardous combustion and thermal decomposition information.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures
Evacuate unprotected and untrained personnel from hazard area. The spill should be cleaned up by qualified personnel. Read and follow safety precautions on the solvent label and MSDS.

6.2. Environmental precautions
Place in a metal container approved for transportation by appropriate authorities. Dispose of collected material as soon as possible.

Clean-up methods
Refer to other sections of this MSDS for information regarding physical and health hazards, respiratory protection, ventilation, and personal protective equipment. Call 3M-HELPS line (1-800-364-3577) for more information on handling and managing the spill. Working from around the edges of the spill inward, cover with bentonite, vermiculite, or commercially available inorganic absorbent material. Mix in sufficient absorbent until it appears dry. Collect as much of the spilled material as possible using non-sparking tools. Clean up residue with an appropriate organic solvent. Seal the container.

In the event of a release of this material, the user should determine if the release qualifies as reportable according to local, state, and federal regulations.

SECTION 7: HANDLING AND STORAGE

7.1 HANDLING
Do not eat, drink or smoke when using this product. Wash exposed areas thoroughly with soap and water. Keep away from heat, sparks, open flame, pilot lights and other sources of ignition. Do not pierce or burn container, even after use. No smoking while handling this material. Do not spray near flames or sources of ignition. Avoid breathing of vapors, mists or spray. Avoid eye contact with vapors, mists, or spray. Keep out of the reach of children. Vapors may ignite explosively. May cause flash fire. Prevent build-up of vapors - open all windows and doors. Maintain vapor concentrations below recommended exposure limits. Use only with cross-ventilation. Without adequate ventilation, vapors may settle in low-lying areas. Keep away from heat, sparks, and open flame. Do not smoke or ignite matches, lighters, etc.

7.2 STORAGE
Store away from acids. Store away from heat. Store out of direct sunlight.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 ENGINEERING CONTROLS
Use with appropriate local exhaust ventilation. Use in an enclosed process area is recommended. Use with functioning spray booth or local exhaust. Use in a well-ventilated area. If exhaust ventilation is not available, use appropriate respiratory protection. Do not use in a confined area or areas with little or no air movement. Use general dilution ventilation and/or local exhaust ventilation to control airborne exposures to below Occupational Exposure Limits and/or control mist, vapor, or spray. If ventilation is not adequate, use respiratory protection equipment. Do not use in a confined area or areas with little or no air movement. If exhaust ventilation is not adequate, use appropriate respiratory protection. Provide ventilation adequate to control vapor concentrations below recommended exposure limits and/or control spray or mist.

8.2 PERSONAL PROTECTIVE EQUIPMENT (PPE)

8.2.1 Eye/Face Protection
Avoid eye contact with vapors, mists, or spray.
The following eye protection(s) are recommended: Safety Glasses with side shields
.

8.2.2 Skin Protection
Avoid skin contact.

Select and use gloves and/or protective clothing to prevent skin contact based on the results of an exposure assessment. Consult with your glove and/or protective clothing manufacturer for selection of appropriate compatible materials.
Gloves made from the following material(s) are recommended: Polymer laminate
.

8.2.3 Respiratory Protection
Avoid breathing of vapors, mists or spray.
An exposure assessment may be needed to decide if a respirator is required. If a respirator is needed, use respirators as part of a full respiratory protection program. Based on the results of the exposure assessment, select from the following respirator type(s) to reduce inhalation exposure:
Half facepiece or full facepiece air-purifying respirator suitable for organic vapors

For questions about suitability for a specific application, consult with your respirator manufacturer.

8.2.4 Prevention of Swallowing
Do not eat, drink or smoke when using this product. Wash exposed areas thoroughly with soap and water.

8.3 EXPOSURE GUIDELINES

Ingredient	Authority	Type	Limit	Additional Information
2,3-DIMETHYLBUTANE	ACGIH	TWA	500 ppm	
2,3-DIMETHYLBUTANE	ACGIH	STEL	1000 ppm	
2-METHYLPENTANE	ACGIH	TWA	500 ppm	
2-METHYLPENTANE	ACGIH	STEL	1000 ppm	
3-METHYLPENTANE	ACGIH	TWA	500 ppm	
3-METHYLPENTANE	ACGIH	STEL	1000 ppm	
ACETONE	ACGIH	TWA	500 ppm	
ACETONE	ACGIH	STEL	750 ppm	
ACETONE	OSHA	TWA	2400 mg/m3	

CYCLOHEXANE	ACGIH	TWA	100 ppm	
CYCLOHEXANE	OSHA	TWA	1050 mg/m3	
HEXANE	ACGIH	TWA	50 ppm	Skin Notation*
HEXANE	OSHA	TWA	1800 mg/m3	
HEXANE (ISOMERS OTHER THAN N-HEXANE)	ACGIH	TWA	500 ppm	
HEXANE (ISOMERS OTHER THAN N-HEXANE)	ACGIH	STEL	1000 ppm	
2,2-DIMETHYLBUTANE	ACGIH	TWA	500 ppm	
2,2-DIMETHYLBUTANE	ACGIH	STEL	1000 ppm	
PROPANE	OSHA	TWA	1800 mg/m3	

* Substance(s) refer to the potential contribution to the overall exposure by the cutaneous route including mucous membrane and eye, either by airborne or, more particularly, by direct contact with the substance. Vehicles can alter skin absorption.

SOURCE OF EXPOSURE LIMIT DATA:
ACGIH: American Conference of Governmental Industrial Hygienists
CMRG: Chemical Manufacturer Recommended Guideline
OSHA: Occupational Safety and Health Administration
AIHA: American Industrial Hygiene Association Workplace Environmental Exposure Level (WEEL)

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Specific Physical Form:	Aerosol
Odor, Color, Grade:	clear, sweet fruity odor
General Physical Form:	Liquid
Autoignition temperature	*No Data Available*
Flash Point	-42.00 ºF [*Test Method:* Tagliabue Closed Cup]
Flammable Limits(LEL)	*No Data Available*
Flammable Limits(UEL)	*No Data Available*
Boiling Point	*Not Applicable*
Vapor Density	2.97 [*Ref Std:* AIR=1]
Specific Gravity	0.726 [*Ref Std:* WATER=1]
pH	*No Data Available*
Melting point	*No Data Available*
Solubility in Water	Nil
Evaporation rate	1.90 [*Ref Std:* ETHER=1]
Hazardous Air Pollutants	0.4 % weight [*Test Method:* Calculated]
Hazardous Air Pollutants	0.016 lb HAPS/lb solids
Hazardous Air Pollutants	0.02 lb HAPS/gal [*Test Method:* Calculated]
Volatile Organic Compounds	Approximately 51 % [*Test Method:* calculated SCAQMD rule 443.1]
Kow - Oct/Water partition coef	*No Data Available*
Percent volatile	<=75 % weight
VOC Less H2O & Exempt Solvents	468 g/l
Viscosity	*Not Applicable*

SECTION 10: STABILITY AND REACTIVITY

Stability: Stable.

Materials and Conditions to Avoid:
10.1 Conditions to avoid
Heat

10.2 Materials to avoid
Not determined

Hazardous Polymerization: Hazardous polymerization will not occur.

Hazardous Decomposition or By-Products

Substance	Condition
Aldehydes	During Combustion
Carbon monoxide	During Combustion
Carbon dioxide	During Combustion

SECTION 11: TOXICOLOGICAL INFORMATION

Please contact the address listed on the first page of the MSDS for Toxicological Information on this material and/or its components.

SECTION 12: ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION

Not determined.

CHEMICAL FATE INFORMATION

Not determined.

SECTION 13: DISPOSAL CONSIDERATIONS

Waste Disposal Method: Incinerate uncured product in a permitted hazardous waste incinerator.
Incinerate in a permitted hazardous waste incinerator. As a disposal alternative, dispose of waste product in a permitted hazardous waste facility.
The facility should be equipped to handle gaseous waste.
Facility must be capable of handling aerosol cans. Dispose of empty product containers in a sanitary landfill.
RECYCLE EMPTY AEROSOL CONTAINERS WHERE AVAILABLE.

EPA Hazardous Waste Number (RCRA): D001 (Ignitable)

Since regulations vary, consult applicable regulations or authorities before disposal.

SECTION 14:TRANSPORT INFORMATION

ID Number(s):

LN-A100-0323-8, LN-A100-0323-9, LN-A100-0324-0, 62-4977-4030-8, 62-4977-4920-0, 62-4977-4926-7, 62-4977-4977-0, 70-0065-8412-5, 70-0714-1653-4, 70-0714-1654-2, 70-0714-1656-7, 70-0714-7444-2, 70-0714-7572-0, 70-0714-7640-5, 70-0714-7930-0, 70-0714-8259-3, 70-0714-8947-3

For Transport Information, please visit http://3M.com/Transportinfo or call 1-800-364-3577 or 651-737-6501.

SECTION 15: REGULATORY INFORMATION

US FEDERAL REGULATIONS

Contact 3M for more information.

311/312 Hazard Categories:

Fire Hazard - Yes Pressure Hazard - Yes Reactivity Hazard - No Immediate Hazard - Yes Delayed Hazard - Yes

Section 313 Toxic Chemicals subject to the reporting requirements of that section and 40 CFR part 372 (EPCRA):

Ingredient	C.A.S. No	% by Wt
CYCLOHEXANE	110-82-7	3 - 7

STATE REGULATIONS

Contact 3M for more information.

CHEMICAL INVENTORIES

The components of this product are in compliance with the chemical notification requirements of TSCA.

All applicable chemical ingredients in this material are listed on the European Inventory of Existing Chemical Substances (EINECS), or are exempt polymers whose monomers are listed on EINECS. Contact 3M for more information.

INTERNATIONAL REGULATIONS

This material contains one or more ingredients that may be regulated by the International Traffic in Arms Regulation (ITAR), an export control of US military technology and chemicals. Prior to export of this material or any product containing this material, determine whether a proper license from the Department of State must be obtained. See 22CFR 120-130 for any specific requirements.

Contact 3M for more information.

This MSDS has been prepared to meet the U.S. OSHA Hazard Communication Standard, 29 CFR 1910.1200.

SECTION 16: OTHER INFORMATION

NFPA Hazard Classification

Health: 2 **Flammability:** 4 **Reactivity:** 0 **Special Hazards:** None
Aerosol Storage Code: 3

National Fire Protection Association (NFPA) hazard ratings are designed for use by emergency response personnel to address the hazards that are presented by short-term, acute exposure to a material under conditions of fire, spill, or similar emergencies. Hazard ratings are primarily based on the inherent physical and toxic properties of the material but also include the toxic properties of combustion or decomposition products that are known to be generated in significant quantities.

HMIS Hazard Classification

Health: 2 **Flammability:** 4 **Reactivity:** 0 **Protection:** X - See PPE section.

Hazardous Material Identification System (HMIS®) hazard ratings are designed to inform employees of chemical hazards in the workplace. These ratings are based on the inherent properties of the material under expected conditions of normal use and are not intended for use in emergency

situations. HMIS® ratings are to be used with a fully implemented HMIS® program. HMIS® is a registered mark of the National Paint and Coatings Association (NPCA).

Revision Changes:
Section 2: Ingredient table was modified.

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MATERIAL SAFETY DATA SHEET

17003A00
01 00

DATE OF PREPARATION
Apr 7, 2009

SECTION 1 — PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NUMBER
17003A00
PRODUCT NAME
ACE® Premium Enamel, Black Flat
MANUFACTURER'S NAME
Mfd. for:
ACE HARDWARE COPORATION
Oak Brook, IL 60521

Telephone Numbers and Websites

Regulatory Information	(216) 566-2902 www.paintdocs.com
Medical Emergency	(216) 566-2917
Transportation Emergency*	(800) 424-9300
**for Chemical Emergency ONLY (spill, leak, fire, exposure, or accident)*	

SECTION 2 — COMPOSITION/INFORMATION ON INGREDIENTS

% by Weight	CAS Number	Ingredient	Units	Vapor Pressure
14	**74-98-6**	**Propane**		
		ACGIH TLV	2500 PPM	760 mm
		OSHA PEL	1000 PPM	
13	**106-97-8**	**Butane**		
		ACGIH TLV	800 PPM	760 mm
		OSHA PEL	800 PPM	
17	**108-88-3**	**Toluene**		
		ACGIH TLV	20 PPM	22 mm
		OSHA PEL	100 PPM (Skin)	
		OSHA PEL	150 PPM (Skin) STEL	
33	**67-64-1**	**Acetone**		
		ACGIH TLV	500 PPM	180 mm
		ACGIH TLV	750 PPM STEL	
		OSHA PEL	1000 PPM	
2	**763-69-9**	**Ethyl 3-Ethoxypropionate**		
		ACGIH TLV	Not Available	1.11 mm
		OSHA PEL	Not Available	
7	**14807-96-6**	**Talc**		
		ACGIH TLV	2 mg/m3 as Resp. Dust	
		OSHA PEL	2 mg/m3 as Resp. Dust	
3	**471-34-1**	**Calcium Carbonate**		
		ACGIH TLV	10 mg/m3 as Dust	
		OSHA PEL	10 mg/m3 Total Dust	
		OSHA PEL	5 mg/m3 Respirable Fraction	
0.5	**1333-86-4**	**Carbon Black**		
		ACGIH TLV	3.5 MG/M3	
		OSHA PEL	3.5 MG/M3	

SECTION 3 — HAZARDS IDENTIFICATION

ROUTES OF EXPOSURE
INHALATION of vapor or spray mist.
EYE or SKIN contact with the product, vapor or spray mist.
EFFECTS OF OVEREXPOSURE
EYES: Irritation.
SKIN: Prolonged or repeated exposure may cause irritation.
INHALATION: Irritation of the upper respiratory system.

HMIS Codes

Health	2*
Flammability	3
Reactivity	0

May cause nervous system depression. Extreme overexposure may result in unconsciousness and possibly death.
Prolonged overexposure to solvent ingredients in Section 2 may cause adverse effects to the liver, urinary, cardiovascular and reproductive systems.

SIGNS AND SYMPTOMS OF OVEREXPOSURE

Headache, dizziness, nausea, and loss of coordination are indications of excessive exposure to vapors or spray mists.
Redness and itching or burning sensation may indicate eye or excessive skin exposure.

MEDICAL CONDITIONS AGGRAVATED BY EXPOSURE

None generally recognized.

CANCER INFORMATION

For complete discussion of toxicology data refer to Section 11.

SECTION 4 — FIRST AID MEASURES

EYES: Flush eyes with large amounts of water for 15 minutes. Get medical attention.
SKIN: Wash affected area thoroughly with soap and water.
Remove contaminated clothing and launder before re-use.
INHALATION: If affected, remove from exposure. Restore breathing. Keep warm and quiet.
INGESTION: Do not induce vomiting. Get medical attention immediately.

SECTION 5 — FIRE FIGHTING MEASURES

FLASH POINT	LEL	UEL	EXTINGUISHING MEDIA
Propellant < 0 °F	1.0	12.8	Carbon Dioxide, Dry Chemical, Foam

UNUSUAL FIRE AND EXPLOSION HAZARDS

Containers may explode when exposed to extreme heat.
Application to hot surfaces requires special precautions.
During emergency conditions overexposure to decomposition products may cause a health hazard. Symptoms may not be immediately apparent. Obtain medical attention.

SPECIAL FIRE FIGHTING PROCEDURES

Full protective equipment including self-contained breathing apparatus should be used.
Water spray may be ineffective. If water is used, fog nozzles are preferable. Water may be used to cool closed containers to prevent pressure build-up and possible autoignition or explosion when exposed to extreme heat.

SECTION 6 — ACCIDENTAL RELEASE MEASURES

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED

- Remove all sources of ignition. Ventilate the area.
- Remove with inert absorbent.

SECTION 7 — HANDLING AND STORAGE

STORAGE CATEGORY

Not Available

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE

Keep away from heat, sparks, and open flame. Vapors will accumulate readily and may ignite explosively.
During use and until all vapors are gone: Keep area ventilated - Do not smoke - Extinguish all flames, pilot lights, and heaters - Turn off stoves, electric tools and appliances, and any other sources of ignition.
Consult NFPA Code. Use approved Bonding and Grounding procedures.
Contents under pressure. Do not puncture, incinerate, or expose to temperature above 120F. Heat from sunlight, radiators, stoves, hot water, and other heat sources could cause container to burst. Do not take internally. Keep out of the reach of children.

SECTION 8 — EXPOSURE CONTROLS/PERSONAL PROTECTION

PRECAUTIONS TO BE TAKEN IN USE

Use only with adequate ventilation.
Avoid contact with skin and eyes. Avoid breathing vapor and spray mist.
Wash hands after using.
This coating may contain materials classified as nuisance particulates (listed "as Dust" in Section 2) which may be present at hazardous levels only during sanding or abrading of the dried film. If no specific dusts are listed in Section 2, the applicable limits for nuisance dusts are ACGIH TLV 10 mg/m3 (total dust), 3 mg/m3 (respirable fraction), OSHA PEL 15 mg/m3 (total dust), 5 mg/m3 (respirable fraction).

VENTILATION

Local exhaust preferable. General exhaust acceptable if the exposure to materials in Section 2 is maintained below applicable exposure limits. Refer to OSHA Standards 1910.94, 1910.107, 1910.108.

RESPIRATORY PROTECTION

If personal exposure cannot be controlled below applicable limits by ventilation, wear a properly fitted organic vapor/particulate respirator approved by NIOSH/MSHA for protection against materials in Section 2.
When sanding or abrading the dried film, wear a dust/mist respirator approved by NIOSH/MSHA for dust which may be generated from this product, underlying paint, or the abrasive.

PROTECTIVE GLOVES

None required for normal application of aerosol products where minimal skin contact is expected. For long or repeated contact, wear chemical resistant gloves.

EYE PROTECTION

Wear safety spectacles with unperforated sideshields.

OTHER PRECAUTIONS

Intentional misuse by deliberately concentrating and inhaling the contents can be harmful or fatal.

SECTION 9 — PHYSICAL AND CHEMICAL PROPERTIES

PRODUCT WEIGHT	6.51 lb/gal	779 g/l
SPECIFIC GRAVITY	0.78	
BOILING POINT	<0 - 342 °F	<-18 - 172 °C
MELTING POINT	Not Available	
VOLATILE VOLUME	90%	
EVAPORATION RATE	Faster than ether	
VAPOR DENSITY	Heavier than air	
SOLUBILITY IN WATER	N.A.	
pH	7.0	

VOLATILE ORGANIC COMPOUNDS (VOC Theoretical - As Packaged)

Volatile Weight 47.14% Less Water and Federally Exempt Solvents

SECTION 10 — STABILITY AND REACTIVITY

STABILITY — Stable

CONDITIONS TO AVOID

None known.

INCOMPATIBILITY

None known.

HAZARDOUS DECOMPOSITION PRODUCTS

By fire: Carbon Dioxide, Carbon Monoxide

HAZARDOUS POLYMERIZATION

Will not occur

SECTION 11 — TOXICOLOGICAL INFORMATION

CHRONIC HEALTH HAZARDS

Reports have associated repeated and prolonged overexposure to solvents with permanent brain and nervous system damage.

Carbon Black is classified by IARC as possibly carcinogenic to humans (group 2B) based on experimental animal data, however, there is insufficient evidence in humans for its carcinogenicity.

TOXICOLOGY DATA

CAS No.	Ingredient Name			
74-98-6	**Propane**			
		LC50 RAT	4HR	Not Available
		LD50 RAT		Not Available
106-97-8	**Butane**			
		LC50 RAT	4HR	Not Available
		LD50 RAT		Not Available
108-88-3	**Toluene**			
		LC50 RAT	4HR	4000 ppm
		LD50 RAT		5000 mg/kg
67-64-1	**Acetone**			
		LC50 RAT	4HR	Not Available
		LD50 RAT		5800 mg/kg
763-69-9	**Ethyl 3-Ethoxypropionate**			
		LC50 RAT	4HR	Not Available
		LD50 RAT		5000 mg/kg
14807-96-6	**Talc**			
		LC50 RAT	4HR	Not Available
		LD50 RAT		Not Available
471-34-1	**Calcium Carbonate**			
		LC50 RAT	4HR	Not Available
		LD50 RAT		Not Available
1333-86-4	**Carbon Black**			
		LC50 RAT	4HR	Not Available
		LD50 RAT		Not Available

SECTION 12 — ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION

No data available.

SECTION 13 — DISPOSAL CONSIDERATIONS

WASTE DISPOSAL METHOD

Waste from this product may be hazardous as defined under the Resource Conservation and Recovery Act (RCRA) 40 CFR 261.
Waste must be tested for ignitability to determine the applicable EPA hazardous waste numbers.
Do not incinerate. Depressurize container. Dispose of in accordance with Federal, State/Provincial, and Local regulations regarding pollution.

SECTION 14 — TRANSPORT INFORMATION

US Ground (DOT)

May be classed as Consumer Commodity, ORM-D
UN1950, AEROSOLS, 2.1, LIMITED QUANTITY, (ERG#126)

Canada (TDG)

May be classed as Consumer Commodity, ORM-D
UN1950, AEROSOLS, CLASS 2.1, LIMITED QUANTITY, (ERG#126)

IMO

May be shipped as Limited Quantity
UN1950, AEROSOLS, CLASS 2.1, LIMITED QUANTITY, EmS F-D, S-U

SECTION 15 — REGULATORY INFORMATION

SARA 313 *(40 CFR 372.65C)* SUPPLIER NOTIFICATION

CAS No.	CHEMICAL/COMPOUND	% by WT	% Element
108-88-3	Toluene	17	

CALIFORNIA PROPOSITION 65

WARNING: This product contains chemicals known to the State of California to cause cancer and birth defects or other reproductive harm.

TSCA CERTIFICATION

All chemicals in this product are listed, or are exempt from listing, on the TSCA Inventory.

SECTION 16 — OTHER INFORMATION

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

The above information pertains to this product as currently formulated, and is based on the information available at this time. Addition of reducers or other additives to this product may substantially alter the composition and hazards of the product. Since conditions of use are outside our control, we make no warranties, express or implied, and assume no liability in connection with any use of this information.

Material Safety Data Sheet

Essence Interior Flat Latex Wall Paint

1. Product and company identification

Product name : Essence Interior Flat Latex Wall Paint

Material uses : Coatings: Waterborne paint.

Code : 184A100, 120, 129, 310, 320, 330

Manufacturer : Ace Hardware Paint Division
21901 South Central Avenue,
Matteson, IL 60443-2800
Phone #: (800) 311-8324

Supplier : Ace Hardware Corporation
2200 Kensington Court,
Oak Brook, IL 60523-2100
(800) 311-8324

Validation date : 1/25/2012.

Prepared by : Atrion Regulatory Services, Inc.

In case of emergency : Infotrac (800) 535-5053
Outside USA (352) 323-3500

2. Hazards identification

Physical state : Liquid.

Color : Various

Odor : Characteristic.

Emergency overview

Hazard statements : MAY CAUSE RESPIRATORY TRACT, EYE AND SKIN IRRITATION. CONTAINS MATERIAL THAT MAY CAUSE TARGET ORGAN DAMAGE, BASED ON ANIMAL DATA. CANCER HAZARD - CAN CAUSE CANCER. BIRTH DEFECT HAZARD - CAN CAUSE BIRTH DEFECTS. DEVELOPMENTAL HAZARD - CAN CAUSE ADVERSE DEVELOPMENTAL EFFECTS.

Precautions : Avoid exposure - obtain special instructions before use. Do not breathe vapor or mist. Do not get on skin or clothing. Avoid contact with eyes. Avoid exposure during pregnancy. Use only with adequate ventilation. Keep container tightly closed and sealed until ready for use. Wash thoroughly after handling.

OSHA/HCS status : This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).

Routes of entry : Dermal contact. Eye contact. Inhalation. Ingestion.

Potential acute health effects

Inhalation : Slightly irritating to the respiratory system.

Ingestion : No known significant effects or critical hazards.

Skin : Slightly irritating to the skin.

Eyes : Slightly irritating to the eyes.

Potential chronic health effects

Chronic effects : Contains material that may cause target organ damage, based on animal data.

Carcinogenicity : Can cause cancer. Risk of cancer depends on duration and level of exposure.

Mutagenicity : No known significant effects or critical hazards.

Teratogenicity : Can cause birth defects.

Developmental effects : Can cause developmental abnormalities.

Fertility effects : No known significant effects or critical hazards.

2. Hazards identification

Target organs : Contains material which may cause damage to the following organs: kidneys, lungs, upper respiratory tract, skin, eyes, testes.

Over-exposure signs/symptoms

Inhalation : Adverse symptoms may include the following:
respiratory tract irritation
coughing

Ingestion : No specific data.

Skin : Adverse symptoms may include the following:
irritation
redness

Eyes : Adverse symptoms may include the following:
irritation
watering
redness

Medical conditions aggravated by over-exposure : Pre-existing disorders involving any target organs mentioned in this MSDS as being at risk may be aggravated by over-exposure to this product.

3. Composition/information on ingredients

United States

Name	CAS number	%
Titanium dioxide	13463-67-7	10-30
Limestone	1317-65-3	5-10
Silica, amorphous - diatomaceous earth	61790-53-2	1-5
Quartz (SiO2)	14808-60-7	1-5
Palygorskite	12174-11-7	0.1-1

Canada

Name	CAS number	%
Titanium dioxide	13463-67-7	10-30
Limestone	1317-65-3	5-10
Silica, amorphous - diatomaceous earth	61790-53-2	1-5
Quartz (SiO2)	14808-60-7	1-5
Ethylene glycol	107-21-1	0.1-1
Palygorskite	12174-11-7	0.1-1

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment and hence require reporting in this section.

4. First aid measures

Eye contact : Check for and remove any contact lenses. Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Get medical attention if symptoms occur.

Skin contact : In case of contact, immediately flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Wash clothing before reuse. Clean shoes thoroughly before reuse. Get medical attention if symptoms occur.

Inhalation : Move exposed person to fresh air. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. Loosen tight clothing such as a collar, tie, belt or waistband. Get medical attention if symptoms occur.

4. First aid measures

Ingestion : Wash out mouth with water. Do not induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. Get medical attention if symptoms occur.

Protection of first-aiders : No action shall be taken involving any personal risk or without suitable training. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

Notes to physician : No specific treatment. Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.

5. Fire-fighting measures

Flammability of the product : In a fire or if heated, a pressure increase will occur and the container may burst.

Extinguishing media

Suitable : Use an extinguishing agent suitable for the surrounding fire.

Not suitable : None known.

Special exposure hazards : Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.

Hazardous thermal decomposition products : Decomposition products may include the following materials:
carbon dioxide
carbon monoxide
metal oxide/oxides

Special protective equipment for fire-fighters : Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

6. Accidental release measures

Personal precautions : No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Avoid breathing vapor or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment (see Section 8).

Environmental precautions : Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

Methods for cleaning up

Small spill : Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

Large spill : Stop leak if without risk. Move containers from spill area. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations (see section 13). Dispose of via a licensed waste disposal contractor. Contaminated absorbent material may pose the same hazard as the spilled product. Note: see section 1 for emergency contact information and section 13 for waste disposal.

7. Handling and storage

Handling : Put on appropriate personal protective equipment (see Section 8). Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. Avoid exposure - obtain special instructions before use. Do not get in eyes or on skin or clothing. Do not ingest. Avoid breathing vapor or mist. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Empty containers retain product residue and can be hazardous. Do not reuse container.

Storage : Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

8. Exposure controls/personal protection

United States

Ingredient	Exposure limits
Titanium dioxide	**ACGIH TLV (United States, 2/2010).** TWA: 10 mg/m³ 8 hour(s). **OSHA PEL 1989 (United States, 3/1989).** TWA: 10 mg/m³ 8 hour(s). Form: Total dust **OSHA PEL (United States, 6/2010).** TWA: 15 mg/m³ 8 hour(s). Form: Total dust
Limestone	**OSHA PEL 1989 (United States, 3/1989).** TWA: 5 mg/m³ 8 hour(s). Form: Respirable fraction TWA: 15 mg/m³ 8 hour(s). Form: Total dust **NIOSH REL (United States, 6/2009).** TWA: 5 mg/m³ 10 hour(s). Form: Respirable fraction TWA: 10 mg/m³ 10 hour(s). Form: Total **OSHA PEL (United States, 6/2010).** TWA: 5 mg/m³ 8 hour(s). Form: Respirable fraction TWA: 15 mg/m³ 8 hour(s). Form: Total dust
Silica, amorphous - diatomaceous earth	**OSHA PEL 1989 (United States, 3/1989).** TWA: 6 mg/m³ 8 hour(s). **OSHA PEL Z3 (United States, 9/2005).** TWA: 20 mppcf 8 hour(s). **NIOSH REL (United States, 6/2009).** TWA: 6 mg/m³ 10 hour(s). **OSHA PEL Z3 (United States, 9/2005). Notes: 80/(%SiO2)** TWA: 80 mg/m³ 8 hour(s).
Quartz (SiO2)	**OSHA PEL Z3 (United States, 9/2005). Notes: 250/(%SiO2+5)** TWA: 250 mppcf 8 hour(s). Form: Respirable **OSHA PEL Z3 (United States, 9/2005). Notes: 10/(SiO2+2)** TWA: 10 mg/m³ 8 hour(s). Form: Respirable **OSHA PEL 1989 (United States, 3/1989).** TWA: 0.1 mg/m³, (as quartz) 8 hour(s). Form: Respirable dust **ACGIH TLV (United States, 2/2010).** TWA: 0.025 mg/m³ 8 hour(s). Form: Respirable fraction **NIOSH REL (United States, 6/2009).** TWA: 0.05 mg/m³ 10 hour(s). Form: respirable dust **OSHA PEL Z3 (United States, 9/2005). Notes: 30/(%SiO2+2)** TWA: 30 mg/m³ 8 hour(s). Form: Total dust.

Canada

Occupational exposure limits		TWA (8 hours)			STEL (15 mins)			Ceiling			
Ingredient	List name	ppm	mg/m³	Other	ppm	mg/m³	Other	ppm	mg/m³	Other	Notations

8. Exposure controls/personal protection

Quartz (SiO2)	US ACGIH 2/2010	-	0.025	-	-	-	-	-	-	-	[a]
	AB 4/2009	-	0.025	-	-	-	-	-	-	-	[b]
	BC 9/2010	-	0.025	-	-	-	-	-	-	-	[c]
	ON 7/2010	-	0.1	-	-	-	-	-	-	-	[d]
	QC 6/2008	-	0.1	-	-	-	-	-	-	-	[e]
Titanium dioxide	US ACGIH 2/2010	-	10	-	-	-	-	-	-	-	
	AB 4/2009	-	10	-	-	-	-	-	-	-	[3]
	BC 9/2010	-	3	-	-	-	-	-	-	-	[f]
		-	10	-	-	-	-	-	-	-	[g]
	ON 7/2010	-	10	-	-	-	-	-	-	-	[h]
	QC 6/2008	-	10	-	-	-	-	-	-	-	[i]
Limestone	AB 4/2009	-	10	-	-	-	-	-	-	-	[3]
	BC 9/2010	-	3	-	-	-	-	-	-	-	[f]
		-	10	-	-	-	-	-	-	-	[g]
		-	-	-	-	20	-	-	-	-	
	QC 6/2008	-	10	-	-	-	-	-	-	-	[i]
Palygorskite		-	-	1 f/cc	-	-	-	-	-	-	[j]
Ethylene glycol	US ACGIH 2/2010	-	-	-	-	-	-	-	100	-	[k][A]
	AB 4/2009	-	-	-	-	-	-	-	100	-	[3] [l]
	BC 9/2010	-	-	-	-	-	-	-	100	-	[k]
		-	10	-	-	20	-	-	-	-	[m]
		-	-	-	-	-	-	50	-	-	[n]
	ON 7/2010	-	-	-	-	-	-	-	100	-	[l]
	QC 6/2008	-	-	-	50	127	-	-	-	-	[o]
Silica, amorphous - diatomaceous earth	BC 9/2010	-	1.5	-	-	-	-	-	-	-	[c]
		-	4	-	-	-	-	-	-	-	
	ON 7/2010	-	10	-	-	-	-	-	-	-	[p]
		-	3	-	-	-	-	-	-	-	[d]
		-	3	-	-	-	-	-	-	-	[q]
	QC 6/2008	-	6	-	-	-	-	-	-	-	[i]

[3]Skin sensitization

Form: [a]Respirable fraction [b]Respirable particulate [c]Respirable [d]Respirable fraction: means that size fraction of the airborne particulate deposited in the gas-exchange region of the respiratory tract and collected during air sampling with a particle size-selective device that, (a) meets the ACGIH particle size–selective sampling criteria for airborne particulate matter; and (b) has the cut point of 4 µm at 50 per cent collection efficiency. [e]Respirable dust. [f]Respirable dust [g]Total dust [h]total dust [i]Total dust. [j]RESPIRABLE FIBRES (other than respirable asbestos fibres) : Objects, other than respirable asbestos fibres, longer than 5 µm, having a diameter of less than 3 µm and a ratio of length to diameter of more than 3 :1. [k]Aerosol [l]aerosol [m]Particulate [n]Vapour [o]vapour and mist [p]Inhalable fraction: means that size fraction of the airborne particulate deposited anywhere in the respiratory tract and collected during air sampling with a particle size-selective device that, (a) meets the ACGIH particle size-selective sampling criteria for airborne particulate matter; and (b) has the cut point of 100 µm at 50 per cent collection efficiency. [q]The value is for particulate matter containing no asbestos and < 1 per cent crystalline silica.

Notes: [A]Refers to Appendix A -- Carcinogens. See Notice of Intended changes.

Consult local authorities for acceptable exposure limits.

Recommended monitoring procedures : If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment.

Engineering measures : Use only with adequate ventilation. If user operations generate dust, fumes, gas, vapor or mist, use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits.

Hygiene measures : Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking, using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.

Personal protection

Respiratory : Use a properly fitted, air-purifying or air-fed respirator complying with an approved standard if a risk assessment indicates this is necessary. 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.

8. Exposure controls/personal protection

Hands : Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.

Eyes : Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists or dusts.

Skin : Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.

Environmental exposure controls : Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

9. Physical and chemical properties

Physical state : Liquid.

Flash point : Not available.

Auto-ignition temperature : Not available.

Flammable limits : Not available.

Color : Various

Odor : Characteristic.

pH : Not available.

Boiling/condensation point : Not available.

Melting/freezing point : Not available.

Relative density : 1.178 to 1.43

Density : 1.176 to 1.427 g/cm^3

Vapor pressure : Not available.

Vapor density : Not available.

VOC content : 0.267 to 0.367 lbs/gal (32 to 44 g/l)

Odor threshold : Not available.

Evaporation rate : Not available.

Viscosity : Not available.

Solubility : Not available.

LogK_{ow} : Not available.

10. Stability and reactivity

Chemical stability : The product is stable.

Conditions to avoid : No specific data.

Incompatible materials : Reactive or incompatible with the following materials: oxidizing materials, reducing materials, metals and acids.

Hazardous decomposition products : Under normal conditions of storage and use, hazardous decomposition products should not be produced.

Possibility of hazardous reactions : Under normal conditions of storage and use, hazardous reactions will not occur.

Under normal conditions of storage and use, hazardous polymerization will not occur.

11. Toxicological information

Acute toxicity

Product/ingredient name	Result	Species	Dose	Exposure
Titanium dioxide	TDLo Oral	Rat	60 g/kg	-
Ethylene glycol	LD50 Oral	Rat	4700 mg/kg	-

Chronic toxicity

Not available.

Irritation/Corrosion

Product/ingredient name	Result	Species	Score	Exposure	Observation
Ethylene glycol	Eyes - Mild irritant	Rabbit	-	-	-
	Eyes - Moderate irritant	Rabbit	-	-	-
	Skin - Mild irritant	Rabbit	-	-	-

Sensitizer

Not available.

Carcinogenicity

Classification

Product/ingredient name	ACGIH	IARC	EPA	NIOSH	NTP	OSHA
Titanium dioxide	A4	2B	-	+	-	-
Silica, amorphous - diatomaceous earth	-	3	-	-	-	-
Quartz (SiO2)	A2	1	-	+	Proven.	-
Palygorskite	-	2B	-	-	-	-

Mutagenicity

Not available.

Teratogenicity

Not available.

Reproductive toxicity

Not available.

12. Ecological information

Ecotoxicity : No known significant effects or critical hazards.

Aquatic ecotoxicity

Product/ingredient name	Result	Species	Exposure
Titanium dioxide	Acute EC50 5.83 mg/L Fresh water	Algae - Pseudokirchneriella subcapitata - Exponential growth phase	72 hours
	Acute EC50 >1000000 ug/L Fresh water	Daphnia - Daphnia magna - <24 hours	48 hours
	Acute LC50 >10 mg/L Fresh water	Crustaceans - Ceriodaphnia dubia - Neonate - <24 hours	48 hours
	Acute LC50 5.5 ppm Fresh water	Daphnia - Daphnia magna - Juvenile (Fledgling, Hatchling, Weanling) - <24 hours	48 hours
	Acute LC50 >1000000 ug/L Marine water	Fish - Fundulus heteroclitus	96 hours
Ethylene glycol	Acute LC50 >100000 ug/L Marine water	Crustaceans - Crangon crangon - Adult	48 hours

12. Ecological information

	Acute LC50 6900000 ug/L Fresh water	Daphnia - Ceriodaphnia dubia - Neonate	48 hours
	Acute LC50 8050000 ug/L Fresh water	Fish - Pimephales promelas - <=7 days	96 hours
	Chronic NOEC 11610000 ug/L Fresh water	Daphnia - Ceriodaphnia dubia - <=24 hours	48 hours
	Chronic NOEC 6090000 ug/L Fresh water	Fish - Pimephales promelas - <=7 days	96 hours

Persistence/degradability

Not available.

13. Disposal considerations

Waste disposal : The generation of waste should be avoided or minimized wherever possible. Significant quantities of waste product residues should not be disposed of via the foul sewer but processed in a suitable effluent treatment plant. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

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

Refer to Section 7: HANDLING AND STORAGE and Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION for additional handling information and protection of employees.

14. Transport information

Regulatory information	UN number	Proper shipping name	Classes	PG*	Label	Additional information
DOT Classification	Not regulated.	-	-	-		-
TDG Classification	Not regulated.	-	-	-		-
IMDG Class	Not regulated.	-	-	-		-
IATA-DGR Class	Not regulated.	-	-	-		-

PG* : Packing group

15. Regulatory information

United States

HCS Classification : Carcinogen
Target organ effects

15. Regulatory information

U.S. Federal regulations : **TSCA 4(a) final test rules**: Acetaldehyde
TSCA 8(a) PAIR: Glycols, polyethylene, mono((1,1,3,3-tetramethylbutyl)phenyl) ether; Acetaldehyde
TSCA 8(a) IUR: Not determined
United States inventory (TSCA 8b): All components are listed or exempted.
TSCA 8(d) H and S data reporting: Acetaldehyde

SARA 302/304/311/312 extremely hazardous substances: No products were found.
SARA 302/304 emergency planning and notification: No products were found.
SARA 302/304/311/312 hazardous chemicals: Limestone; Titanium dioxide; Quartz (SiO2)
SARA 311/312 MSDS distribution - chemical inventory - hazard identification: Limestone: Immediate (acute) health hazard; Titanium dioxide: Immediate (acute) health hazard; Quartz (SiO2): Immediate (acute) health hazard, Delayed (chronic) health hazard

Clean Water Act (CWA) 311: Acetaldehyde; Vinyl acetate; ammonia
Clean Air Act (CAA) 112 accidental release prevention: No products were found.

Clean Air Act Section 112(b) Hazardous Air Pollutants (HAPs) : Not listed

Clean Air Act Section 602 Class I Substances : Not listed

Clean Air Act Section 602 Class II Substances : Not listed

DEA List I Chemicals (Precursor Chemicals) : Not listed

DEA List II Chemicals (Essential Chemicals) : Not listed

SARA 313

Form R - Reporting requirements Not applicable.

Supplier notification Not applicable.

State regulations

Massachusetts : The following components are listed: SILICA, CRYSTALLINE, QUARTZ; TITANIUM DIOXIDE; CALCIUM CARBONATE

New York : None of the components are listed.

New Jersey : The following components are listed: SILICA, AMORPHOUS DIATOMACEOUS EARTH; KIESELGUHR; SILICA, QUARTZ; QUARTZ (SiO2); TITANIUM DIOXIDE; TITANIUM OXIDE (TiO2); CALCIUM CARBONATE; LIMESTONE

Pennsylvania : The following components are listed: QUARTZ (SIO2); TITANIUM OXIDE (TIO2); LIMESTONE

California Prop. 65

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

Ingredient name	Cancer	Reproductive	No significant risk level	Maximum acceptable dosage level

15. Regulatory information

Quartz (SiO2)	Yes.	No.	No.	No.
Palygorskite	Yes.	No.	No.	No.
Acetaldehyde	Yes.	No.	90 µg/day (inhalation)	No.

Canada

WHMIS (Canada) : Class D-2A: Material causing other toxic effects (Very toxic).

Canadian lists

Canadian NPRI : None of the components are listed.

CEPA Toxic substances : None of the components are listed.

Canada inventory : At least one component is not listed in DSL but all such components are listed in NDSL.

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all the information required by the Controlled Products Regulations.

International regulations

International lists : **Australia inventory (AICS)**: All components are listed or exempted.
China inventory (IECSC): All components are listed or exempted.
Japan inventory: Not determined.
Korea inventory: Not determined.
New Zealand Inventory of Chemicals (NZIoC): All components are listed or exempted.
Philippines inventory (PICCS): All components are listed or exempted.

Chemical Weapons Convention List Schedule I Chemicals : Not listed

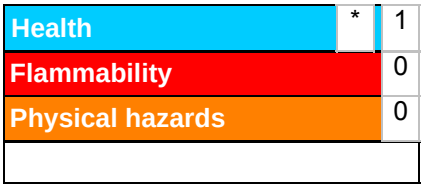
Chemical Weapons Convention List Schedule II Chemicals : Not listed

Chemical Weapons Convention List Schedule III Chemicals : Not listed

16. Other information

Label requirements : MAY CAUSE RESPIRATORY TRACT, EYE AND SKIN IRRITATION. CONTAINS MATERIAL THAT MAY CAUSE TARGET ORGAN DAMAGE, BASED ON ANIMAL DATA. CANCER HAZARD - CAN CAUSE CANCER. BIRTH DEFECT HAZARD - CAN CAUSE BIRTH DEFECTS. DEVELOPMENTAL HAZARD - CAN CAUSE ADVERSE DEVELOPMENTAL EFFECTS.

Hazardous Material Information System (U.S.A.) :



Caution: HMIS® ratings are based on a 0-4 rating scale, with 0 representing minimal hazards or risks, and 4 representing significant hazards or risks Although HMIS® ratings are not required on MSDSs under 29 CFR 1910.1200, the preparer may choose to provide them. HMIS® ratings are to be used with a fully implemented HMIS® program. HMIS® is a registered mark of the National Paint & Coatings Association (NPCA). HMIS® materials may be purchased exclusively from J. J. Keller (800) 327-6868.

The customer is responsible for determining the PPE code for this material.

National Fire Protection Association (U.S.A.) :

16. Other information

Reprinted with permission from NFPA 704-2001, Identification of the Hazards of Materials for Emergency Response Copyright ©1997, National Fire Protection Association, Quincy, MA 02269. This reprinted material is not the complete and official position of the National Fire Protection Association, on the referenced subject which is represented only by the standard in its entirety.

Date of issue : 1/25/2012.

Date of previous issue : No previous validation.

Version : 1

Indicates information that has changed from previously issued version.

Notice to reader

To the best of our knowledge, the information contained herein is accurate. However, neither the above-named supplier, nor any of its subsidiaries, assumes any liability whatsoever for the accuracy or completeness of the information contained herein.
Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist.

Section 1 -- PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NUMBER
11655

HMIS CODES
Health 2
Flammability 3
Reactivity 0

PRODUCT NAME
ACE® Gold Plate Paint, Gold

MANUFACTURER'S NAME
Mfd. for:
ACE HARDWARE COPORATION
Oak Brook, IL 60521

Medical Emergency Phone No.
(216) 566-2917
Transportation Emergency
(800) 424-9300
Regulatory Information
(216) 566-2902

DATE OF PREPARATION
19-AUG-07

Section 2 -- COMPOSITION/INFORMATION ON INGREDIENTS

% by WT	CAS No.	INGREDIENT			UNITS	VAPOR PRESSURE
16	74-98-6	Propane				
			ACGIH TLV	2500	ppm	760 mm
			OSHA PEL	1000	ppm	
16	106-97-8	Butane				
			ACGIH TLV	800	ppm	760 mm
			OSHA PEL	800	ppm	
38	108-88-3	Toluene				
			ACGIH TLV	20	ppm	22 mm
			OSHA PEL	100	ppm (Skin)	
			OSHA PEL	150	ppm (Skin) STEL	
14	67-64-1	Acetone				
			ACGIH TLV	500	ppm	180 mm
			ACGIH TLV	750	ppm STEL	
			OSHA PEL	1000	ppm	
5	Proprietary	Bronze Pigment				
			ACGIH TLV	Not Available		
			OSHA PEL	Not Available		

Section 3 -- HAZARDS IDENTIFICATION

ROUTES OF EXPOSURE
INHALATION of vapor or spray mist.
EYE or SKIN contact with the product, vapor or spray mist.

EFFECTS OF OVEREXPOSURE
EYES: Irritation.
SKIN: Prolonged or repeated exposure may cause irritation.
INHALATION: Irritation of the upper respiratory system.
May cause nervous system depression. Extreme overexposure may result in unconsciousness and possibly death.

Continued on page 2

SIGNS AND SYMPTOMS OF OVEREXPOSURE

Headache, dizziness, nausea, and loss of coordination are indications of excessive exposure to vapors or spray mists.

Redness and itching or burning sensation may indicate eye or excessive skin exposure.

MEDICAL CONDITIONS AGGRAVATED BY EXPOSURE

None generally recognized.

CANCER INFORMATION

For complete discussion of toxicology data refer to Section 11.

Section 4 -- FIRST AID MEASURES

EYES:	Flush eyes with large amounts of water for 15 minutes. Get medical attention.
SKIN:	Wash affected area thoroughly with soap and water. Remove contaminated clothing and launder before re-use.
INHALATION:	If affected, remove from exposure. Restore breathing. Keep warm and quiet.
INGESTION:	Do not induce vomiting. Get medical attention immediately.

Section 5 -- FIRE FIGHTING MEASURES

FLASH POINT	LEL	UEL
Propellant < 0 F	1.0	12.8

EXTINGUISHING MEDIA

Carbon Dioxide, Dry Chemical, Foam

UNUSUAL FIRE AND EXPLOSION HAZARDS

Containers may explode when exposed to extreme heat.

Application to hot surfaces requires special precautions.

During emergency conditions overexposure to decomposition products may cause a health hazard. Symptoms may not be immediately apparent. Obtain medical attention.

SPECIAL FIRE FIGHTING PROCEDURES

Full protective equipment including self-contained breathing apparatus should be used.

Water spray may be ineffective. If water is used, fog nozzles are preferable. Water may be used to cool closed containers to prevent pressure build-up and possible autoignition or explosion when exposed to extreme heat.

Section 6 -- ACCIDENTAL RELEASE MEASURES

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED

Remove all sources of ignition. Ventilate the area.

Remove with inert absorbent.

Section 7 -- HANDLING AND STORAGE

STORAGE CATEGORY

Not Available

Continued on page 3

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE

Keep away from heat, sparks, and open flame. Vapors will accumulate readily and may ignite explosively.

During use and until all vapors are gone: Keep area ventilated - Do not smoke - Extinguish all flames, pilot lights, and heaters - Turn off stoves, electric tools and appliances, and any other sources of ignition.

Consult NFPA Code. Use approved Bonding and Grounding procedures.

Contents under pressure. Do not puncture, incinerate, or expose to temperature above 120F. Heat from sunlight, radiators, stoves, hot water, and other heat sources could cause container to burst. Do not take internally. Keep out of the reach of children.

Section 8 -- EXPOSURE CONTROLS/PERSONAL PROTECTION

PRECAUTIONS TO BE TAKEN IN USE

Use only with adequate ventilation.

Avoid contact with skin and eyes. Avoid breathing vapor and spray mist.

Wash hands after using.

This coating may contain materials classified as nuisance particulates (listed "as Dust" in Section 2) which may be present at hazardous levels only during sanding or abrading of the dried film. If no specific dusts are listed in Section 2, the applicable limits for nuisance dusts are ACGIH TLV 10 mg/m3 (total dust), 3 mg/m3 (respirable fraction), OSHA PEL 15 mg/m3 (total dust), 5 mg/m3 (respirable fraction).

Removal of old paint by sanding, scraping or other means may generate dust or fumes that contain lead. Exposure to lead dust or fumes may cause brain damage or other adverse health effects, especially in children or pregnant women. Controlling exposure to lead or other hazardous substances requires the use of proper protective equipment, such as a properly fitted respirator (NIOSH approved) and proper containment and cleanup. For more information, call the National Lead Information Center at 1-800-424-LEAD (in US) or contact your local health authority.

VENTILATION

Local exhaust preferable. General exhaust acceptable if the exposure to materials in Section 2 is maintained below applicable exposure limits. Refer to OSHA Standards 1910.94, 1910.107, 1910.108.

RESPIRATORY PROTECTION

If personal exposure cannot be controlled below applicable limits by ventilation, wear a properly fitted organic vapor/particulate respirator approved by NIOSH/MSHA for protection against materials in Section 2.

When sanding or abrading the dried film, wear a dust/mist respirator approved by NIOSH/MSHA for dust which may be generated from this product, underlying paint, or the abrasive.

PROTECTIVE GLOVES

None required for normal application of aerosol products where minimal skin contact is expected. For long or repeated contact, wear chemical resistant gloves.

EYE PROTECTION

Wear safety spectacles with unperforated sideshields.

OTHER PRECAUTIONS

Intentional misuse by deliberately concentrating and inhaling the contents can be harmful or fatal.

Continued on page 4

Section 9 -- PHYSICAL AND CHEMICAL PROPERTIES

PRODUCT WEIGHT	6.29 lb/gal	753 g/l
SPECIFIC GRAVITY	0.76	
BOILING POINT	<0 - 238 F	<-18 - 114 C
MELTING POINT	Not Available	
VOLATILE VOLUME	92 %	
EVAPORATION RATE	Faster than ether	
VAPOR DENSITY	Heavier than air	
SOLUBILITY IN WATER	N.A.	
pH	7.0	

VOLATILE ORGANIC COMPOUNDS (VOC Theoretical - As Packaged)
Volatile Weight 70.03% Less Water and Federally Exempt Solvents

Section 10 -- STABILITY AND REACTIVITY

STABILITY -- Stable

CONDITIONS TO AVOID

None known.

INCOMPATIBILITY

None known.

HAZARDOUS DECOMPOSITION PRODUCTS

By fire: Carbon Dioxide, Carbon Monoxide

HAZARDOUS POLYMERIZATION

Will not occur

Section 11 -- TOXICOLOGICAL INFORMATION

CHRONIC HEALTH HAZARDS

No ingredient in this product is an IARC, NTP or OSHA listed carcinogen.

Prolonged overexposure to solvent ingredients in Section 2 may cause adverse effects to the liver, urinary, cardiovascular and reproductive systems.

Reports have associated repeated and prolonged overexposure to solvents with permanent brain and nervous system damage.

TOXICOLOGY DATA

CAS No.	Ingredient Name					
74-98-6	Propane					
		LC50	RAT	4HR	Not Available	
		LD50	RAT		Not Available	
106-97-8	Butane					
		LC50	RAT	4HR	Not Available	
		LD50	RAT		Not Available	
108-88-3	Toluene					
		LC50	RAT	4HR	4000	ppm
		LD50	RAT		5000	mg/kg
67-64-1	Acetone					
		LC50	RAT	4HR	Not Available	
		LD50	RAT		5800	mg/kg
Proprietary	Bronze Pigment					
		LC50	RAT	4HR	Not Available	
		LD50	RAT		Not Available	

Continued on page 5

Section 12 -- ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION
No data available.

Section 13 -- DISPOSAL CONSIDERATIONS

WASTE DISPOSAL METHOD
Waste from this product may be hazardous as defined under the Resource Conservation and Recovery Act (RCRA) 40 CFR 261.
Waste must be tested for ignitability to determine the applicable EPA hazardous waste numbers.
Do not incinerate. Depressurize container. Dispose of in accordance with Federal, State/Provincial, and Local regulations regarding pollution.

Section 14 -- TRANSPORT INFORMATION

US Ground (DOT)
May be classed as Consumer Commodity, ORM-D
UN1950, AEROSOLS, 2.1, LIMITED QUANTITY, (ERG#126)

Canada (TDG)
May be classed as Consumer Commodity, ORM-D
UN1950, AEROSOLS, CLASS 2.1, LIMITED QUANTITY, (ERG#126)

IMO
May be shipped as Limited Quantity
UN1950, AEROSOLS, CLASS 2, LIMITED QUANTITY, EmS F-D, S-U

Section 15 -- REGULATORY INFORMATION

SARA 313 (40 CFR 372.65C) SUPPLIER NOTIFICATION

CAS No.	CHEMICAL/COMPOUND	% by WT	% Element
108-88-3	Toluene	38	
	Copper		4

CALIFORNIA PROPOSITION 65
WARNING: This product contains chemicals known to the State of California to cause cancer and birth defects or other reproductive harm.
TSCA CERTIFICATION
All chemicals in this product are listed, or are exempt from listing, on the TSCA Inventory.

Section 16 -- OTHER INFORMATION

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

Continued on page 6

The above information pertains to this product as currently formulated, and is based on the information available at this time. Addition of reducers or other additives to this product may substantially alter the composition and hazards of the product. Since conditions of use are outside our control, we make no warranties, express or implied, and assume no liability in connection with any use of this information.

MATERIAL SAFETY DATA SHEET

17028
02 00

Section 1 -- PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NUMBER	DATE OF PREPARATION	HMIS CODES	
		Health	2*
17028	01-SEP-07	Flammability	3
		Reactivity	0

PRODUCT NAME
ACE® Instant Drying Lacquer, Gloss Black

MANUFACTURER'S NAME
Mfd. for:
ACE HARDWARE COPORATION
Oak Brook, IL 60521

TELEPHONE NUMBERS and WEBSITES
Regulatory Information
(216) 566-2902 www.paintdocs.com
Medical Emergency
(216) 566-2917
Transportation Emergency for Chemical Emergency ONLY (spill, leak,
(800) 424-9300 fire, exposure, or accident)

Section 2 -- COMPOSITION/INFORMATION ON INGREDIENTS

% by WT	CAS No.	INGREDIENT			UNITS	VAPOR PRESSURE
11	74-98-6	Propane				
			ACGIH	TLV 2500	ppm	760 mm
			OSHA	PEL 1000	ppm	
11	106-97-8	Butane				
			ACGIH	TLV 800	ppm	760 mm
			OSHA	PEL 800	ppm	
2	64742-89-8	V. M. & P. Naphtha				
			ACGIH	TLV 300	ppm	12 mm
			OSHA	PEL 300	ppm	
			OSHA	PEL 400	ppm STEL	
3	108-88-3	Toluene				
			ACGIH	TLV 20	ppm	22 mm
			OSHA	PEL 100	ppm (Skin)	
			OSHA	PEL 150	ppm (Skin) STEL	
1	100-41-4	Ethylbenzene				
			ACGIH	TLV 100	ppm	7.1 mm
			ACGIH	TLV 125	ppm STEL	
			OSHA	PEL 100	ppm	
			OSHA	PEL 125	ppm STEL	
6	1330-20-7	Xylene				
			ACGIH	TLV 100	ppm	5.9 mm
			ACGIH	TLV 150	ppm STEL	
			OSHA	PEL 100	ppm	
			OSHA	PEL 150	ppm STEL	

Continued on page 2

2	67-63-0	2-Propanol				
		ACGIH TLV	400	ppm		33 mm
		ACGIH TLV	500	ppm STEL		
		OSHA PEL	400	ppm		
		OSHA PEL	500	ppm STEL		
3	123-42-2	Diacetone Alcohol				
		ACGIH TLV	50	ppm		1.2 mm
		OSHA PEL	50	ppm		
2	111-76-2	2-Butoxyethanol				
		ACGIH TLV	20	ppm		0.88 mm
		OSHA PEL	25	ppm		
33	67-64-1	Acetone				
		ACGIH TLV	500	ppm		180 mm
		ACGIH TLV	750	ppm STEL		
		OSHA PEL	1000	ppm		
1	78-93-3	Methyl Ethyl Ketone				
		ACGIH TLV	200	ppm		70 mm
		ACGIH TLV	300	ppm STEL		
		OSHA PEL	200	ppm		
		OSHA PEL	300	ppm STEL		
3	108-10-1	Methyl Isobutyl Ketone				
		ACGIH TLV	50	ppm		16 mm
		ACGIH TLV	75	ppm STEL		
		OSHA PEL	50	ppm		
		OSHA PEL	75	ppm STEL		
6	108-21-4	Isopropyl Acetate				
		ACGIH TLV	250	ppm		47.5 mm
		ACGIH TLV	310	ppm STEL		
		OSHA PEL	250	ppm		
		OSHA PEL	310	ppm STEL		
4	628-63-7	Amyl Acetate				
		ACGIH TLV	100	ppm		4 mm
		OSHA PEL	100	ppm		
0.4	1333-86-4	Carbon Black				
		ACGIH TLV	3.5	mg/m3		
		OSHA PEL	3.5	mg/m3		

Section 3 -- HAZARDS IDENTIFICATION

ROUTES OF EXPOSURE

INHALATION of vapor or spray mist.

EYE or SKIN contact with the product, vapor or spray mist.

EFFECTS OF OVEREXPOSURE

EYES: Irritation.

SKIN: Prolonged or repeated exposure may cause irritation.

INHALATION: Irritation of the upper respiratory system.

May cause nervous system depression. Extreme overexposure may result in unconsciousness and possibly death.

SIGNS AND SYMPTOMS OF OVEREXPOSURE

Headache, dizziness, nausea, and loss of coordination are indications of excessive exposure to vapors or spray mists.

Redness and itching or burning sensation may indicate eye or excessive skin exposure.

MEDICAL CONDITIONS AGGRAVATED BY EXPOSURE

None generally recognized.

Continued on page 3

CANCER INFORMATION
For complete discussion of toxicology data refer to Section 11.

Section 4 -- FIRST AID MEASURES

EYES: Flush eyes with large amounts of water for 15 minutes. Get medical attention.
SKIN: Wash affected area thoroughly with soap and water. Remove contaminated clothing and launder before re-use.
INHALATION: If affected, remove from exposure. Restore breathing. Keep warm and quiet.
INGESTION: Do not induce vomiting. Get medical attention immediately.

Section 5 -- FIRE FIGHTING MEASURES

FLASH POINT	LEL	UEL
Propellant < 0 F	0.9	12.8

EXTINGUISHING MEDIA
Carbon Dioxide, Dry Chemical, Foam
UNUSUAL FIRE AND EXPLOSION HAZARDS
Containers may explode when exposed to extreme heat.
Application to hot surfaces requires special precautions.
During emergency conditions overexposure to decomposition products may cause a health hazard. Symptoms may not be immediately apparent. Obtain medical attention.
SPECIAL FIRE FIGHTING PROCEDURES
Full protective equipment including self-contained breathing apparatus should be used.
Water spray may be ineffective. If water is used, fog nozzles are preferable. Water may be used to cool closed containers to prevent pressure build-up and possible autoignition or explosion when exposed to extreme heat.

Section 6 -- ACCIDENTAL RELEASE MEASURES

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED
Remove all sources of ignition. Ventilate the area.
Remove with inert absorbent.

Section 7 -- HANDLING AND STORAGE

STORAGE CATEGORY
Not Available

Continued on page 4

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE

Keep away from heat, sparks, and open flame. Vapors will accumulate readily and may ignite explosively.

During use and until all vapors are gone: Keep area ventilated - Do not smoke - Extinguish all flames, pilot lights, and heaters - Turn off stoves, electric tools and appliances, and any other sources of ignition.

Consult NFPA Code. Use approved Bonding and Grounding procedures.

Contents under pressure. Do not puncture, incinerate, or expose to temperature above 120F. Heat from sunlight, radiators, stoves, hot water, and other heat sources could cause container to burst. Do not take internally. Keep out of the reach of children.

Section 8 -- EXPOSURE CONTROLS/PERSONAL PROTECTION

PRECAUTIONS TO BE TAKEN IN USE

Use only with adequate ventilation.

Avoid contact with skin and eyes. Avoid breathing vapor and spray mist.

Wash hands after using.

This coating may contain materials classified as nuisance particulates (listed "as Dust" in Section 2) which may be present at hazardous levels only during sanding or abrading of the dried film. If no specific dusts are listed in Section 2, the applicable limits for nuisance dusts are ACGIH TLV 10 mg/m3 (total dust), 3 mg/m3 (respirable fraction), OSHA PEL 15 mg/m3 (total dust), 5 mg/m3 (respirable fraction).

Removal of old paint by sanding, scraping or other means may generate dust or fumes that contain lead. Exposure to lead dust or fumes may cause brain damage or other adverse health effects, especially in children or pregnant women. Controlling exposure to lead or other hazardous substances requires the use of proper protective equipment, such as a properly fitted respirator (NIOSH approved) and proper containment and cleanup. For more information, call the National Lead Information Center at 1-800-424-LEAD (in US) or contact your local health authority.

VENTILATION

Local exhaust preferable. General exhaust acceptable if the exposure to materials in Section 2 is maintained below applicable exposure limits. Refer to OSHA Standards 1910.94, 1910.107, 1910.108.

RESPIRATORY PROTECTION

If personal exposure cannot be controlled below applicable limits by ventilation, wear a properly fitted organic vapor/particulate respirator approved by NIOSH/MSHA for protection against materials in Section 2.

When sanding or abrading the dried film, wear a dust/mist respirator approved by NIOSH/MSHA for dust which may be generated from this product, underlying paint, or the abrasive.

PROTECTIVE GLOVES

None required for normal application of aerosol products where minimal skin contact is expected. For long or repeated contact, wear chemical resistant gloves.

EYE PROTECTION

Wear safety spectacles with unperforated sideshields.

OTHER PRECAUTIONS

Intentional misuse by deliberately concentrating and inhaling the contents can be harmful or fatal.

Continued on page 5

Section 9 -- PHYSICAL AND CHEMICAL PROPERTIES

PRODUCT WEIGHT	6.25 lb/gal	749 g/l
SPECIFIC GRAVITY	0.75	
BOILING POINT	<0 - 343 F	<-18 - 172 C
MELTING POINT	Not Available	
VOLATILE VOLUME	91 %	
EVAPORATION RATE	Faster than ether	
VAPOR DENSITY	Heavier than air	
SOLUBILITY IN WATER	N.A.	
pH	7.0	

VOLATILE ORGANIC COMPOUNDS (VOC Theoretical - As Packaged)
Volatile Weight 55.41% Less Water and Federally Exempt Solvents

Section 10 -- STABILITY AND REACTIVITY

STABILITY -- Stable

CONDITIONS TO AVOID

None known.

INCOMPATIBILITY

None known.

HAZARDOUS DECOMPOSITION PRODUCTS

By fire: Carbon Dioxide, Carbon Monoxide

HAZARDOUS POLYMERIZATION

Will not occur

Section 11 -- TOXICOLOGICAL INFORMATION

CHRONIC HEALTH HAZARDS

Ethylbenzene is classified by IARC as possibly carcinogenic to humans (2B) based on inadequate evidence in humans and sufficient evidence in laboratory animals. Lifetime inhalation exposure of rats and mice to high ethylbenzene concentrations resulted in increases in certain types of cancer, including kidney tumors in rats and lung and liver tumors in mice. These effects were not observed in animals exposed to lower concentrations. There is no evidence that ethylbenzene causes cancer in humans.

Carbon Black is classified by IARC as possibly carcinogenic to humans (group 2B) based on experimental animal data, however, there is insufficient evidence in humans for its carcinogenicity.

Methyl Ethyl Ketone may increase the nervous system effects of other solvents.

Prolonged overexposure to solvent ingredients in Section 2 may cause adverse effects to the liver, urinary, blood forming, cardiovascular and reproductive systems.

Reports have associated repeated and prolonged overexposure to solvents with permanent brain and nervous system damage.

TOXICOLOGY DATA

Continued on page 6

CAS No.	Ingredient Name				
74-98-6	Propane				
		LC50	RAT	4HR	Not Available
		LD50	RAT		Not Available
106-97-8	Butane				
		LC50	RAT	4HR	Not Available
		LD50	RAT		Not Available
64742-89-8	V. M. & P. Naphtha				
		LC50	RAT	4HR	Not Available
		LD50	RAT		Not Available
108-88-3	Toluene				
		LC50	RAT	4HR	4000 ppm
		LD50	RAT		5000 mg/kg
100-41-4	Ethylbenzene				
		LC50	RAT	4HR	Not Available
		LD50	RAT		3500 mg/kg
1330-20-7	Xylene				
		LC50	RAT	4HR	5000 ppm
		LD50	RAT		4300 mg/kg
67-63-0	2-Propanol				
		LC50	RAT	4HR	Not Available
		LD50	RAT		5045 mg/kg
123-42-2	Diacetone Alcohol				
		LC50	RAT	4HR	Not Available
		LD50	RAT		4000. mg/kg
111-76-2	2-Butoxyethanol				
		LC50	RAT	4HR	Not Available
		LD50	RAT		470 mg/kg
67-64-1	Acetone				
		LC50	RAT	4HR	Not Available
		LD50	RAT		5800 mg/kg
78-93-3	Methyl Ethyl Ketone				
		LC50	RAT	4HR	Not Available
		LD50	RAT		2740 mg/kg
108-10-1	Methyl Isobutyl Ketone				
		LC50	RAT	4HR	Not Available
		LD50	RAT		2080 mg/kg
108-21-4	Isopropyl Acetate				
		LC50	RAT	4HR	Not Available
		LD50	RAT		3000 mg/kg
628-63-7	Amyl Acetate				
		LC50	RAT	4HR	Not Available
		LD50	RAT		6500 mg/kg
1333-86-4	Carbon Black				
		LC50	RAT	4HR	Not Available
		LD50	RAT		Not Available

Section 12 -- ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION
No data available.

Continued on page 7

Section 13 -- DISPOSAL CONSIDERATIONS

WASTE DISPOSAL METHOD

Waste from this product may be hazardous as defined under the Resource Conservation and Recovery Act (RCRA) 40 CFR 261.

Waste must be tested for ignitability to determine the applicable EPA hazardous waste numbers.

Do not incinerate. Depressurize container. Dispose of in accordance with Federal, State/Provincial, and Local regulations regarding pollution.

Section 14 -- TRANSPORT INFORMATION

US Ground (DOT)

May be classed as Consumer Commodity, ORM-D
UN1950, AEROSOLS, 2.1, LIMITED QUANTITY, (ERG#126)

Canada (TDG)

May be classed as Consumer Commodity, ORM-D
UN1950, AEROSOLS, CLASS 2.1, LIMITED QUANTITY, (ERG#126)

IMO

May be shipped as Limited Quantity
UN1950, AEROSOLS, CLASS 2, LIMITED QUANTITY, EmS F-D, S-U

Section 15 -- REGULATORY INFORMATION

SARA 313 (40 CFR 372.65C) SUPPLIER NOTIFICATION

CAS No.	CHEMICAL/COMPOUND	% by WT	% Element
108-88-3	Toluene	3	
100-41-4	Ethylbenzene	1	
1330-20-7	Xylene	6	
108-10-1	Methyl Isobutyl Ketone	3	
	Glycol Ethers	2	

CALIFORNIA PROPOSITION 65

WARNING: This product contains chemicals known to the State of California to cause cancer and birth defects or other reproductive harm.

TSCA CERTIFICATION

All chemicals in this product are listed, or are exempt from listing, on the TSCA Inventory.

Section 16 -- OTHER INFORMATION

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

The above information pertains to this product as currently formulated, and is based on the information available at this time. Addition of reducers or other additives to this product may substantially alter the composition and hazards of the product. Since conditions of use are outside our control, we make no warranties, express or implied, and assume no liability in connection with any use of this information.

Franklin International
MATERIAL SAFETY DATA SHEET

MSDS Name: Ace Project and Repair Adhesive
MSDS Number: 401131

SECTION 1 - CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Name: Ace Project and Repair Adhesive
CAS Number: none
HMIS Hazard Rating: Health: 2 Fire: 3 Reactivity: 0

Company Identification: **Franklin International**
2020 Bruck Street
Columbus OH 43207

Contact: Franklin Technical Services
Telephone/Fax: (800) 877-4583 (614) 445-1493
Emergency Phone (24 Hour): Franklin Security
(614) 445-1300
Chemtrec (24 Hour): (800) 424-9300
Chemtrec International: (703) 527-3887

Product Class: solvent based
Product Use: construction adhesive
Product Code: 53103

Division: **Construction Adhesives & Sealants**

SECTION 2 - COMPOSITION AND INFORMATION ON INGREDIENTS

Hazardous Ingredients	CAS Number	Percent
hexane	110-54-3	20.03

OSHA PELs & ACGIH TLVs are listed in Section 8 where applicable.

SECTION 3 - HAZARD IDENTIFICATION

NOTE:
Repeated and prolonged overexposure to the mixture of solvent(s) listed in Section 2 can result in systemic effects including permanent brain, nervous system, liver, and kidney damage. Intentional misuse by deliberately concentrating & inhaling the contents may be harmful or fatal.

EMERGENCY OVERVIEW:
Product is beige, medium viscosity mastic with a strong solvent odor. DANGER: EXTREMELY FLAMMABLE, VAPOR HARMFUL. CONTAINS HEXANE. Vapors can cause flash fire. Vapors may ignite explosively. Prevent buildup of vapors by opening all windows & doors to create cross-ventilation. Keep away from heat, sparks & open flame. Do not smoke. Extinguish all flames & pilot lights. Turn off stoves, heaters & sparking electric motors. Keep away from all sources of ignition until all vapors are gone. Keep container tightly closed when not in use. Avoid prolonged breathing of vapor. KEEP OUT OF THE REACH OF CHILDREN.

ROUTES OF ENTRY:
Ingestion: Yes
Inhalation: Yes
Skin: Yes
Eye: Yes

INHALATION:
Avoid breathing vapor or mists.
May cause headaches and dizziness.
High vapor concentrations are irritating to the nose, throat and lungs and can cause systemic effects.
Vapors can readily accumulate in confined or poorly ventilated areas.

INGESTION:

MEDICAL CONDITIONS AGGRAVATED BY EXPOSURE:
Preexisting neurological conditions, skin disorders, and respiratory diease.
CARCINOGENICITY:
IARC: No
NTP: No
OSHA: No
TARGET ORGANS:
Prolonged or repeated overexposure may cause eye, skin, respiratory system, central nervous system, and peripheral nervous system damage.

SECTION 4 - FIRST AID MEASURES

Epinepherine and other sympathomimetic drugs may initiate cardiac arrhythmias (irregular beating) in persons exposed to high concentrations of hexane (e.g. in enclosed spaces or with deliberate abuse). If used, monitor heart action closely. Consider use of other drugs with less arrhythmogenic potential.
INHALATION:
Remove to fresh air. If difficulty persists seek medical attention.
INGESTION:
Call poison control center immediately. Follow their specific instructions. Do not induce vomiting.
SKIN:
Wash with soap and water. Contact a physician if irritation develops or persists.
EYE:
Hold eyelids apart and flush with plenty of water for at least 15 minutes. Seek medical attention.

SECTION 5 - FIRE-FIGHTING MEASURES

Flammability Class (OSHA)	IB
Flash Point:	< 0 F Setaflash
Explosive Range:	Lower explosive limit 1.2% Upper expolsive limit 7.5%

Vapors can travel back to the source of ignition.
Flammable liquid. Can form explosive mixtures at temperatures at or above the flashpoint
EXTINGUISHING MEDIA:
Use alcohol foam, carbon dioxide, dry chemical, or ABC dry chemical when fighting fires involving this product.
HAZARDOUS COMBUSTION PRODUCTS:
Carbon monoxide may be released during combustion.
FIRE FIGHTING PROCEDURES:
Can burn in a fire, releasing toxic vapors.
Wear a NIOSH approved self-contained breathing apparatus.

SECTION 6 - ACCIDENTAL RELEASE MEASURES

CONTAINMENT TECHNIQUES:
Use inert absorbent to dike the spill. Keep away from drains.
CLEAN-UP:
If possible pump liquid into an approved container or spread absorbent over spill and shovel (use non-sparking equipment) product/ absorbent mixture into an approved container. If product has dried, scrape up and place in an approved container.
EMERGENCY MEASURES:
Isolate hazard area. Keep unnecessary and unprotected personnel from entering area. Wear all appropriate personal protection equipment (PPE) (see Section 8).

Use only in well ventilated area.
Follow all MSDS/label precautions even after container is emptied.
Containers may retain product residues and vapors.
Avoid prolonged or repeated contact with the skin.
STORAGE:
Keep away from sources of ignition.
Do not store above 110F. Store large quantities in buildings designed & protected for storage of NFPA Class 1-B flammable materials.

SECTION 8 - EXPOSURE CONTROLS AND PERSONAL PROTECTION

Occupational Exposure Limits

	ACGIH TLV	ACGIH TLV-C	ACGIH STEL	OSHA STEL	OSHA PEL
hexane	50.00 PPM	N/est	N/est	N/est	500.00 PPM

ENGINEERING CONTROLS:
Use local exhaust as needed to maintain occupational exposure limits.
Maintain standard plant ventilation.
OTHER:
Facilities storing or utilizing any chemical should be equipped with an eyewash facility and a safety shower.
RESPIRATORY PROTECTION:
Where exposure limits may be exceeded select a NIOSH approved respirator with appropriate Protection Factor and cartridge for the specific contaminents. Follow requirements for respiratory protection in OSHA 1910.134.
EYE PROTECTION:
Chemical splash goggles (ANSI Z87.1 or approved equivalent).
SKIN PROTECTION:
Where skin contact can occur, wear impervious gloves.

SECTION 9 - PHYSICAL AND CHEMICAL PROPERTIES

Form:	medium viscosity mastic
Appearance/Color:	beige
Odor:	mild solvent odor
Solubility (in water):	nil
pH Value:	Not Applicable
Boiling Range/Point:	143.°F
Evaporation Rate:	Faster than n-Butyl Acetate
% Volatile:	20.39%
Specific Gravity:	1.26
VOC:	247 g/l

SECTION 10 - STABILITY AND REACTIVITY

Stability:	This product is stable
Hazardous Polymerization:	Hazardous polymerization will not occur

CONDITIONS TO AVOID:
Heat, sparks, open flame
INCOMPATIBLITY:
Strong oxidizing agents, acids and bases.
HAZARDOUS DECOMPOSITION PRODUCTS:
Not applicable

SECTION 11 - TOXICOLOGICAL INFORMATION

Hexane - Acute:
Ingestion of hexane can cause nausea, vomiting, stomach pain, and diarrhea. Hexane can irritate the skin and the eyes. Acutely, the most

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peripheral nervous system damage (polyneuropathy) are common traits of sustained overexposure.

SECTION 12 - ECOLOGICAL INFORMATION

This formulation has not been tested for environmental effects.

SECTION 13 - DISPOSAL CONSIDERATIONS

WASTE DISPOSAL:
Disposal of this product must comply with all applicable federal, state and local regulations.
CONTAINER DISPOSAL:
Disposal of this container should comply with all applicable federal, state and local regulations.

SECTION 14 - TRANSPORT INFORMATION

For any 10.5-ounce size of this product and for all 29-ounce to 1 gallon sizes of this product not shipped by air:

DOT:

UN Number:	None
UN Pack Group:	Not applicable
UN Class:	ORM-D
Shipping Name:	Consumer Commodity

AIR:

UN Number:	ID8000
UN Pack Group:	Not applicable
UN Class:	9
ICAO/IATA Class:	9
Shipping Name:	Consumer Commodity

MARITIME:

UN Number:	UN1133
UN Pack Group:	III
UN Class:	3
IMDG Class:	Limited Quantity
Shipping Name:	Adhesives, containing a Flammable Liquid, Limited Quantity

For air shipments of 29-ounce to 1 gallon sizes of this product or any shipment of this product in a 1 gal to 5 gal container:

UN Number:	UN1133
UN Pack Group:	III
UN Class:	3
ICAO/IATA Class:	3
IMDG Class:	3
Shipping Name:	Adhesives containing a Flammable Liquid

Packaging may not be approved for shipping by air. Please contact Franklin International for further information.

SECTION 15 - REGULATORY INFORMATION

SARA TITLE III SECTION 313:
This product contains the following toxic chemicals 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:

Chemical Name	CAS Number	Percent
hexane	110-54-3	20.03

TSCA (Toxic Substances Control Act Inventory):

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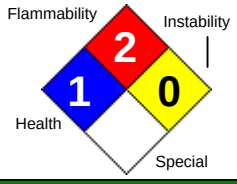
hexane; hexane; 110-54-3
Non-hazardous components required to be listed at 3% or more:
styrene-butadiene rubber 9003-55-8; polymerized rosin 65997-05-9;
petroleum hydrocarbon resin 68527-25-3
NEW JERSEY:
clay 1332-58-7; petroleum hydrocarbon resin 68527-25-3; styrene-
butadiene rubber 9003-55-8; polymerized rosin 65997-05-9;
hexane 110-54-3

SECTION 16 - OTHER INFORMATION

DISCLAIMER:
While the information and recommendations set forth herein are
believed to be accurate as of the data hereof, Franklin International
makes no warranty, express or implied, with respect thereto and
disclaims all liability from reliance thereon.

MATERIAL SAFETY DATA SHEET
ACE PAINT THINNER

HEALTH	2
FLAMMABILITY	2
PHYSICAL HAZ.	0
PPE	G



Printed: 03/24/2009
Revision: 10/03/2005

Date Created: 10/03/2005

1. Product and Company Identification

Product Code: ACE1677
Product Name: ACE PAINT THINNER
Reference #: ACE1677
Manufacturer Information
Company Name: W. M. Barr
2105 Channel Avenue
Memphis, TN 38113
Phone Number: (901)775-0100
Emergency Contact: 3E 24 Hour Emergency Contact (800)451-8346
Information: W.M. Barr Customer Service (800)398-3892
Web site address: www.wmbarr.com

2. Composition/Information on Ingredients

Hazardous Components (Chemical Name)	CAS #	Concentration	OSHA TWA	ACGIH TWA	Other Limits
1. Stoddard solvent {Mineral spirits; Aliphatic Petroleum Distillates; White spirits}	8052-41-3	95.0 -100.0 %	500 ppm	100 ppm	No data.
2. 1,2,4-Trimethylbenzene {Pseudocumene}	95-63-6	1.0 -2.0 %	200 ppm	50 ppm	No data.
3. Raffinates (petroleum), sorption process	64741-85-1	95.0 -100.0 %	1000 ppm	500 ppm	No data.

Hazardous Components (Chemical Name)	CAS #	OSHA STEL	OSHA CEIL	ACGIH STEL	ACGIH CEIL
1. Stoddard solvent {Mineral spirits; Aliphatic Petroleum Distillates; White spirits}	8052-41-3	No data.	No data.	250 ppm	No data.
2. 1,2,4-Trimethylbenzene {Pseudocumene}	95-63-6	500 ppm/(10min)	300 ppm	No data.	No data.
3. Raffinates (petroleum), sorption process	64741-85-1	No data.	No data.	750 ppm	No data.

3. Hazards Identification

Emergency Overview

Caution! Combustible. Keep away from heat, sparks, flame and all other sources of ignition. Vapors may cause fire. Vapors may travel long distances to other areas and rooms away from work site. Do not smoke. Extinguish all flames and pilot lights, and turn off stoves, heaters, electric motors and all other sources of ignition anywhere in the structure, dwelling or building during use and until all vapors are gone from work site and all areas away from work site. Keep away from electrical outlets and switches. Beware of static electricity that may be generated by synthetic clothing and other sources.

OSHA Regulatory Status:

This material is classified as hazardous under OSHA regulations.

Health Hazards (Acute and Chronic)

Inhalation Acute Exposure Effects:
May cause dizziness; headache; watering of eyes; eye irritation; weakness; nausea; muscle twitches, and depression of central nervous system. Severe overexposure may cause convulsions; unconsciousness; and death. Intentional misuse of this product by deliberately concentrating and inhaling can be harmful or fatal.

Skin Contact Acute Exposure Effects:
May cause irritation; numbness in the fingers and arms; drying of skin; and dermatitis. May cause increased severity of symptoms listed under inhalation.

Eye Contact Acute Exposure Effects:
This material is an eye irritant. May cause irritation; burns; conjunctivitis of eyes; and corneal ulcerations of the

eye. Vapors may irritate eyes.

Ingestion Acute Exposure Effects:
Harmful or fatal if swallowed. May cause nausea; weakness; muscle twitches; gastrointestinal irritation; and diarrhea. Severe overexposure may cause convulsions; unconsciousness; and death.

Chronic Exposure Effects:
Reports have associated repeated and prolonged overexposure to solvents with neurological and other physiological damage. Prolonged or repeated contact may cause dermatitis. May cause jaundice; bone marrow damage; liver damage; anemia; and skin irritation.

Signs and Symptoms Of Exposure

Inhalation, ingestion, and dermal are possible routes of exposure.

Medical Conditions Generally Aggravated By Exposure

Diseases of the skin, eyes, liver, kidneys, central nervous system and respiratory system.

4. First Aid Measures

Emergency and First Aid Procedures

Inhalation:
If user experiences breathing difficulty, move to air free of vapors, Administer oxygen or artificial medical assistance can be rendered.

Skin Contact:
Wash with soap and large quantities of water and seek medical attention if irritation from contact persists.

Eye Contact:
Flush with large quantities of water for at least 15 minutes and seek immediate medical attention.

Ingestion:
Do not induce vomiting. Call your local poison control center, hospital emergency room or physician immediately for instructions to induce vomiting.

Note to Physician

Call your local poison control center for further information.

5. Fire Fighting Measures

Flammability Classification: Class II
Flash Pt: 105.00 F Method Used: Unknown
Explosive Limits: LEL: 1.00 UEL: No data.

Special Fire Fighting Procedures

Self-contained respiratory protection should be provided for fire fighters fighting fires in buildings or confined areas. Storage containers exposed to fire should be kept cool with water spray to prevent pressure build-up. Stay away from heads of containers that have been exposed to intense heat or flame.

Unusual Fire and Explosion Hazards

No data available.

Extinguishing Media

Use carbon dioxide, dry powder, or foam.

Unsuitable Extinguishing Media

No data available.

6. Accidental Release Measures

Steps To Be Taken In Case Material Is Released Or Spilled

Clean up:

Keep unnecessary people away; isolate hazard area and deny entry. Stay upwind, out of low areas, and ventilate closed spaces before entering. Shut off ignition sources; keep flares, smoking or flames out of hazard area.

Small spills:

Take up with sand, earth or other noncombustible absorbent material and place in a plastic container where applicable.

Large spills:

Dike far ahead of spill for later disposal.

Waste Disposal:

Dispose in accordance with applicable local, state and federal regulations.

7. Handling and Storage

Precautions To Be Taken in Handling

Read carefully all cautions and directions on product label before use. Since empty container retains residue, follow all label warnings even after container is empty. Dispose of empty container according to all regulations. Do not reuse this container.

Precautions To Be Taken in Storing

Keep container tightly closed when not in use. Store in a cool, dry place. Do not store near flames or at elevated temperatures.

8. Exposure Controls/Personal Protection

Respiratory Equipment (Specify Type)

For OSHA controlled work place and other regular users. Use only with adequate ventilation under engineered air control systems designed to prevent exceeding appropriate TLV. For occasional use, where engineered air control is not feasible, use properly maintained and properly fitted NIOSH approved respirator for organic solvent vapors. A dust mask does not provide protection against vapors.

Eye Protection

Safety glasses, goggles or face shields are recommended to safeguard against potential eye contact, irritation, or injury. Contact lenses should not be worn while working with chemicals.

Protective Gloves

Wear impermeable gloves. Gloves contaminated with product should be discarded. Promptly remove clothing that becomes soiled with product.

Other Protective Clothing

Various application methods can dictate use of additional protective safety equipment, such as impermeable aprons, etc., to minimize exposure. A source of clean water should be available in the work area for flushing eyes and skin. Do not eat, drink, or smoke in the work area. Wash hands thoroughly after use. Before reuse, thoroughly clean any clothing or protective equipment that has been contaminated by prior use. Discard any clothing or other protective equipment that cannot be decontaminated, such as gloves or shoes.

Ventilation

Use only with adequate ventilation to prevent build-up of vapors. Open all windows and doors. Use only with a cross ventilation of moving fresh air across the work area. If strong odor is noticed or you experience slight dizziness, headache, nausea, or eye-watering - Stop - ventilation is inadequate. Leave area immediately.

9. Physical and Chemical Properties

Physical States: [ ] Gas [X] Liquid [ ] Solid
Melting Point: No data.
Boiling Point: > 310.00 F
Autoignition Pt: No data.
Flash Pt: 105.00 F Method Used: Unknown
Explosive Limits: LEL: 1.00 UEL: No data.
Specfic Gravity: No data.
Bulk density: 6.659 LB/GA
Vapor Presure: No data.
Vapor Density: No data.
Evaporation Rate: No data.
Solubility in Water: No data.
Percent Volatile: 100.0 % by weight.
VOC / Volume: 800.0000 G/L
Heat Value: No data.
Particle Size: No data.
Corrosion Rate: No data.
pH: No data.
Appearance and Odor

Water White / Free and Clear

10. Stability and Reactivity

Stability: Unstable [ ] Stable [X]
Conditions To Avoid - Instability

No data available.

Incompatibility - Materials To Avoid

Incompatible with strong oxidizing agents.

Hazardous Decomposition Or Byproducts

Decomposition may produce carbon monoxide and carbon dioxide.

Hazardous Polymerization: Will occur [ ] Will not occur [X]
Conditions To Avoid - Hazardous Polymerization

No data available.

11. Toxicological Information

No data available.

Carcinogenicity/Other Information

No data available.

Hazardous Components (Chemical Name)	CAS #	NTP	IARC	ACGIH	OSHA
1. Stoddard solvent {Mineral spirits; Aliphatic Petroleum Distillates; White spirits}	8052-41-3	n.a.	n.a.	n.a.	n.a.
2. 1,2,4-Trimethylbenzene {Pseudocumene}	95-63-6	n.a.	n.a.	n.a.	n.a.
3. Raffinates (petroleum), sorption process	64741-85-1	n.a.	n.a.	n.a.	n.a.

Carcinogenicity: NTP? No IARC Monographs? No OSHA Regulated? No

12. Ecological Information

No data available.

13. Disposal Considerations

Waste Disposal Method

Dispose in accordance with federal, state, and local regulations.

14. Transport Information

LAND TRANSPORT (US DOT)

DOT Proper Shipping Name No data available.

15. Regulatory Information

US EPA SARA Title III

Hazardous Components (Chemical Name)	CAS #	Sec.302 (EHS)	Sec.304 RQ	Sec.313 (TRI)	Sec.110
1. Stoddard solvent {Mineral spirits; Aliphatic Petroleum Distillates; White spirits}	8052-41-3	No	No	No	
2. 1,2,4-Trimethylbenzene {Pseudocumene}	95-63-6	No	No	Yes	
3. Raffinates (petroleum), sorption process	64741-85-1	No	No	No	

US EPA CAA, CWA, TSCA

Hazardous Components (Chemical Name)	CAS #	EPA CAA	EPA CWA NPDES	EPA TSCA	CA PROP 65
1. Stoddard solvent {Mineral spirits; Aliphatic Petroleum Distillates; White spirits}	8052-41-3	No		Inventory	
2. 1,2,4-Trimethylbenzene {Pseudocumene}	95-63-6	No		Inventory, 4 Test	
3. Raffinates (petroleum), sorption process	64741-85-1	No		Inventory	

SARA (Superfund Amendments and Reauthorization Act of 1986) Lists:

Sec.302: EPA SARA Title III Section 302 Extremely Hazardous Chemical with TPQ. * indicates 10000 LB TPQ if not volatile.

Sec.304: EPA SARA Title III Section 304: CERCLA Reportable + Sec.302 with Reportable Quantity. ** indicates statutory RQ.

Sec.313: EPA SARA Title III Section 313 Toxic Release Inventory. Note: -Cat indicates a member of a chemical category.

Sec.110: EPA SARA 110 Superfund Site Priority Contaminant List

TSCA (Toxic Substances Control Act) Lists:

Inventory: Chemical Listed in the TSCA Inventory.

5A(2): Chemical Subject to Significant New Rules (SNURS)

6A: Commercial Chemical Control Rules

8A: Toxic Substances Subject To Information Rules on Production

8A CAIR: Comprehensive Assessment Information Rules - (CAIR)

8A PAIR: Preliminary Assessment Information Rules - (PAIR)

8C: Records of Allegations of Significant Adverse Reactions

8D: Health and Safety Data Reporting Rules

8D TERM: Health and Safety Data Reporting Rule Terminations

12(b): Notice of Export

Other Important Lists:

CWA NPDES: EPA Clean Water Act NPDES Permit Chemical

CAA HAP: EPA Clean Air Act Hazardous Air Pollutant

CAA ODC: EPA Clean Air Act Ozone Depleting Chemical (1=CFC, 2=HCFC)

CA PROP 65: California Proposition 65

International Regulatory Lists:

EPA Hazard Categories:

This material meets the EPA 'Hazard Categories' defined for SARA Title III Sections 311/312 as indicated:

[ ] Yes [X] No Acute (immediate) Health Hazard
[ ] Yes [X] No Chronic (delayed) Health Hazard
[ ] Yes [X] No Fire Hazard
[ ] Yes [X] No Sudden Release of Pressure Hazard
[ ] Yes [X] No Reactive Hazard

16. Other Information

Company Policy or Disclaimer

The information contained herein is presented in good faith and believed to be accurate as of the effective date shown above. This information is furnished without warranty of any kind. Employers should use this information only as a supplement to other information gathered by them and must make independent determination of suitability and completeness of information from all sources to assure proper use of these materials and the safety and health of employees. Any use of this data and information must be determined by the user to be in accordance with applicable federal, state and local laws and regulations.

Material Safety Data Sheet

1. PRODUCT AND COMPANY IDENTIFICATION

Product Identification

Product ID:	**155.275A117**
Product Name:	GRTFN I/E LTX ACR POLY SG
Product Use:	Paint product.
Print date:	07/Jul/2013
Revision Date:	07/Jul/2013

Company Identification
The Valspar Corporation - Architectural Coatings Division
1191 Wheeling Road
Wheeling, IL 60090

Manufacturer's Phone: 1-847-520-8580

24-Hour Medical Emergency Phone: 1-888-345-5732

2. HAZARDS IDENTIFICATION

Primary Routes of Exposure:
Inhalation
Ingestion
Skin absorption

Eye Contact:

- Moderate eye irritation
- Risk of serious damage to eyes.

Skin Contact:

- Causes skin irritation.
- Dermatitis
- Harmful if absorbed through skin.
- May cause sensitization by skin contact.

Ingestion:

- Irritation of the mouth, throat, and stomach.

- Harmful if swallowed.

Inhalation:

- Causes respiratory tract irritation.
- Harmful by inhalation.
- May cause chemical pneumonia.
- May cause pulmonary edema.
- May cause sensitization by inhalation.
- May cause damage to nasal and respiratory passages.

Target Organ and Other Health Effects:
- Cardiac irregularities
- Unconsciousness
- Causes headache, drowsiness or other effects to the central nervous system.
- Kidney injury may occur.

This product contains ingredients that may contribute to the following potential chronic health effects:
- Overexposure may cause nervous system damage.
- Contains formaldehyde which is considered a potential carcinogen by the Occupational Health and Safety Administration.
- Notice: Reports have associated repeated and prolonged occupational overexposure to solvents with permanent brain and nervous system damage. Intentional misuse by deliberately concentrating and inhaling the contents may be harmful or fatal.
- Possible sensitization.

Teratogens:
- May cause birth defects.

Carcinogens:
- Cancer hazard. Contains material which can cause cancer.

3. COMPOSITION / INFORMATION ON HAZARDOUS INGREDIENTS

Ingredient Name CAS-No.	Approx. Weight %	Chemical Name
N-METHYLPYRROLIDONE 872-50-4	1 - 5	1-Methyl-2-pyrrolidone
ETHYLENE GLYCOL 107-21-1	1 - 5	1,2-Ethanediol
PROPRIETARY ADDITIVE	1 - 5	PROPRIETARY ADDITIVE
FORMALDEHYDE 50-00-0	0 - .099	Formaldehyde

If this section is blank there are no hazardous components per OSHA guidelines.

4. FIRST AID MEASURES

Eye Contact:
Remove any contact lenses and open eyes wide apart. In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. If medical assistance is not immediately available, flush an additional 15 minutes. Get medical attention immediately.

Skin Contact:
Remove contaminated clothing and shoes. Wash off immediately with plenty of water for at least 15 minutes. Get medical attention, if symptoms develop or persist.

Ingestion:
Rinse mouth with water. Give one or two glasses of water. Only induce vomiting at the instruction of medical personnel. Never give anything by mouth to an unconscious person. Do NOT induce vomiting. Get medical attention immediately.

Inhalation:
Move injured person into fresh air and keep person calm under observation. Get medical attention immediately. For breathing difficulties, oxygen may be necessary. If breathing stops, provide artificial respiration. Place unconscious person on the side in the recovery position and ensure breathing.

Medical conditions aggravated by exposure:
Any respiratory or skin condition.

5. FIRE FIGHTING MEASURES

Flash point (Fahrenheit):	205
Flash point (Celsius):	96
Lower explosive limit (%):	1
Upper explosive limit (%):	15
Autoignition temperature:	not determined
Sensitivity to impact:	no
Sensitivity to static discharge:	Sensitivity to static discharge is not expected.
Hazardous combustion products:	See Section 10.

Unusual fire and explosion hazards:
None known.

Extinguishing media:
Carbon dioxide, dry chemical, foam and/or water fog.

Fire fighting procedures:
Firefighters should be equipped with self-contained breathing apparatus and turn out gear. Keep containers and surroundings cool with water spray.

6. ACCIDENTAL RELEASE MEASURES

Action to be taken if material is released or spilled:
Ventilate the area. Avoid breathing dust or vapor. Use self-containing breathing apparatus or airmask for large spills in a confined area. Wipe, scrape or soak up in an inert material and put in a container for disposal. See section 7, "Handling and Storage", for proper container and storage procedures. Avoid contact with eyes.

7. HANDLING AND STORAGE

Precautions to be taken in handling and storage:
Keep container closed when not in use. Do not freeze. Since emptied containers may contain product residue, follow all label warnings, even after container is emptied. Do not cut, drill, grind, or weld on or near this container.

8. PERSONAL PROTECTIVE EQUIPMENT AND EXPOSURE CONTROLS

Personal Protective Equipment

Eye and face protection:
Wear chemical goggles with splash shields or face shield. Contact lenses should not be worn when working with chemicals because contact lenses may contribute to the severity of an eye injury in case of exposure.

Skin protection:
Appropriate chemical resistant gloves should be worn.

Other Personel Protection Data:
To prevent skin contact wear protective clothing covering all exposed areas. Ensure that eyewash stations and safety showers are close to the workstation location.

Respiratory protection:
If exposure cannot be controlled below applicable limits, use the appropriate NIOSH approved respirator such as an air purifying respirator with organic vapor cartridge and dust/mist filter. Consult the respirator manufacturer's literature to ensure that the respirator will provide adequate protection. Read and follow all respirator manufacturer's instructions.

Ventilation
Use only in well-ventilated areas. Ensure adequate ventilation, especially in confined areas. Ovens used for curing should contain a fresh air purge to prevent vapours from accumulating and creating a possible explosive mixture.

Exposure Guidelines

OSHA Permissible Exposure Limits (PEL's)

Ingredient Name CAS-No.	Approx. Weight %	TWA (final)	Ceilings limits (final)	Skin designations
FORMALDEHYDE 50-00-0	0 - .099	0.75 ppm TWA		

ACGIH Threshold Limit Value (TLV's)

Ingredient Name CAS-No.	Approx. Weight %	TWA	STEL	Ceiling limits	Skin designations
ETHYLENE GLYCOL 107-21-1	1 - 5			100 mg/m^3 Ceiling aerosol only	
PROPRIETARY ADDITIVE	1 - 5	5 mg/m^3 TWA			
FORMALDEHYDE 50-00-0	0 - .099			0.3 ppm Ceiling	

9. PHYSICAL PROPERTIES

Odor:	Normal for this product type.
Physical State:	liquid
pH:	not determined
Vapor pressure:	24 mmHg @ 77ºF (25ºC)
Vapor density (air = 1.0):	7.4
Boiling point:	212ºF (100ºC)
Solubility in water:	not determined
Coefficient of water/oil distribution:	not determined
Density (lbs per US gallon):	8.52
Evaporation rate (butyl acetate = 1.0):	0.1
Flash point (Fahrenheit):	205
Flash point (Celsius):	96
Lower explosive limit (%):	1
Upper explosive limit (%):	15
Autoignition temperature:	not determined

10. STABILITY AND REACTIVITY

Stability:	Stable under normal conditions.
Conditions to Avoid:	None known.

10. STABILITY AND REACTIVITY

Incompatibility: Avoid water-reactive materials, heat or contact with peroxides or other catalysts.

Hazardous Polymerization: None anticipated.

Hazardous Decomposition Products: Carbon monoxide and carbon dioxide. Nitrogen compounds.

Sensitivity to static discharge: Sensitivity to static discharge is not expected.

11. TOXICOLOGICAL INFORMATION

Ingredient Name CAS-No.	Approx. Weight %	NIOSH - Selected LD50s and LC50s
N-METHYLPYRROLIDONE 872-50-4	1 - 5	= 2000 mg/kg Dermal LD50 Rabbit = 2500 mg/kg Dermal LD50 Rat = 3.1 mg/L Inhalation LC50 Rat 4 h = 3598 mg/kg Oral LD50 Rat
ETHYLENE GLYCOL 107-21-1	1 - 5	= 4000 mg/kg Oral LD50 Rat = 9530 µL/kg Dermal LD50 Rabbit
PROPRIETARY ADDITIVE	1 - 5	> 31 mg/L Inhalation LC50 Rat 1 h > 7.7 mg/L Inhalation LC50 Rat 4 h
FORMALDEHYDE 50-00-0	0 - .099	= 0.578 mg/L Inhalation LC50 Rat 4 h = 500 mg/kg Oral LD50 Rat

Mutagens/Teratogens/Carcinogens:

Possible mutagen

May cause birth defects.

Cancer hazard. Contains material which can cause cancer.

Ingredient Name CAS-No.	Approx. Weight %	California Prop 65 - Developmental Toxicity	California Prop 65 - Reproductive (Male)
N-METHYLPYRROLIDONE 872-50-4	1 - 5	Listed. initial date 6/15/01 - developmental toxicity	

Ingredient Name CAS-No.	Approx. Weight %	California Prop 65 - Reproductive (Female)	California Prop 65 - Carcinogen
FORMALDEHYDE 50-00-0	0 - .099		Listed. initial date 1/1/88 - carcinogen

Ingredient Name CAS-No.	Approx. Weight %	IARC Group 1 - Human Evidence	IARC Group 2A - Limited Human Data	IARC Group 2B - Sufficient Animal Data
FORMALDEHYDE 50-00-0	0 - .099	Supplement 7 [1987] Monograph 62 [1995] Supplement 7 [1987]		

Ingredient Name CAS-No.	Approx. Weight %	NTP Known Carcinogens	NTP Suspect Carcinogens
FORMALDEHYDE 50-00-0	0 - .099		Reasonably Anticipated To Be A Human Carcinogen

Ingredient Name CAS-No.	Approx. Weight %	OSHA - Hazard Communication Carcinogens	OSHA - Specifically Regulated Carcinogens	ACGIH Carcinogens
FORMALDEHYDE 50-00-0	0 - .099	Present	Irritant and potential cancer hazard - see 29 CFR 1910.1048	A2 Suspected Human Carcinogen

12. ECOLOGICAL DATA

No information on ecology is available.

13. DISPOSAL CONSIDERATIONS

Disposal should be made in accordance with federal, state and local regulations.

14. TRANSPORTATION INFORMATION

U.S. Department of Transportation

UN ID Number (msds): NRPAIN
Proper Shipping Name: PAINT, NOT REGULATED

U.S Hazmat and/or International DG shipment exceptions

The supplier may apply one of the following exceptions: Combustible Liquid, Consumer Commodity, Limited Quantity, Viscous Liquid, Does Not Sustain Combustion, or others, as allowed under 49CFR Hazmat Regulations. Please consult 49CFR Subchapter C to ensure that subsequent shipments comply with these exceptions.

Reportable Quantity Description:

International Air Transport Association (IATA):

Proper shipping name: NOT REGULATED

International Maritime Organization (IMO):

Proper shipping name: NOT REGULATED
Marine Pollutant No

15. REGULATORY INFORMATION

U.S. FEDERAL REGULATIONS:

Ingredient Name CAS-No.	Approx. Weight %	SARA 302	SARA 313	CERCLA RQ in lbs.
N-METHYLPYRROLIDONE 872-50-4	1 - 5		form R reporting required for 1.0% de minimis concentration	
ETHYLENE GLYCOL 107-21-1	1 - 5		form R reporting required for 1.0% de minimis concentration	5000
PROPRIETARY ADDITIVE	1 - 5			5000
FORMALDEHYDE 50-00-0	0 - .099	EPCRA RQ = 100 lb	form R reporting required for 0.1% de minimis concentration	100

SARA 311/312 Hazard Class:

Acute: yes
Chronic: yes
Flammability: no
Reactivity: no

Sudden Pressure: no

U.S. STATE REGULATIONS:

Right to Know:
The specific chemical identity of a component may be withheld as a trade secret under 34 Pennsylvania Code, Chapter 317.

Pennsylvania Right To Know:

N-METHYLPYRROLIDONE	872-50-4
PROPRIETARY ADDITIVE	Trade Secret
ETHYLENE GLYCOL	107-21-1

Additional Non-Hazardous Materials

PROPRIETARY INGREDIENT	Trade Secret
PROPRIETARY RESIN	Trade Secret
PROPRIETARY RESIN	Trade Secret

California Proposition 65:
WARNING: This product contains chemicals known to the State of California to cause cancer and birth defects or other reproductive harm.

Rule 66 status of product Not photochemically reactive.

INTERNATIONAL REGULATIONS - Chemical Inventories

US TSCA Inventory:
All components of this product are in compliance with U.S. TSCA Chemical Substance Inventory Requirements.

Canada Domestic Substances List:
Not all components in this product are listed on the Domestic Substances List.

16. OTHER INFORMATION

HMIS Codes

Health:	2*
Flammability:	0
Reactivity:	1
PPE:	X - See Section 8 for Personal Protective Equipment (PPE).

Abbreviations:
OSHA - Occupational Safety and Health Administration, IARC - International Agency for Research on Cancer, NIOSH - National Institute of Occupational Safety and Health, NTP - National Toxicology Program, ACGIH - American Conference of Governmental Industrial Hygienists, SCAQMD - South Coast Air Quality Management District, TSCA - Toxic Substances Control Act, IATA - International Air Transport Association, IMO - International Maritime Organization, DOT - Department of Transportation, NA - Not applicable, NOT ESTAB - Not established, N.A.V. - Not available, RQ - Reportable quantity, WT - Weight, MG/CU M - Milligrams per cubic meter, G/L - Grams per liter, MM - Millimeters, MPPCF - Millions of particles per cubic foot, PPM - parts per million, PPT - parts per thousand, TCC/PM - Tag closed cup / Pensky-Martens, PB - Lead, PEL - Permissible exposure level, TWA - Time Weighted Average, STEL - Short term exposure limit, C - Celsius, F - Fahrenheit.

Disclaimer:
The data on this sheet represent typical values. Since application variables are a major factor in product performance, this information should serve only as a general guide. Valspar assumes no obligation or liability for use of this information. UNLESS VALSPAR AGREES OTHERWISE IN WRITING, VALSPAR MAKES NO WARRANTIES, EXPRESS OR IMPLIED, AND DISCLAIMS ALL IMPLIED WARRANTIES INCLUDING WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR USE OR FREEDOM FROM PATENT INFRINGEMENT. VALSPAR WILL NOT BE LIABLE FOR ANY SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES. Your only remedy for any defect in this product is the replacement of the defective product, or a refund of its purchase price, at our option. This MSDS contains additional information required by the state of Pennsylvania.

Preparation Information:

Prepared By:	Regulatory Affairs Department
Print date:	07/Jul/2013
Revision Date:	07/Jul/2013

MATERIAL SAFETY DATA SHEET

SECTION 1 - PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: Royal Gloss Enamel Polyurethane Porch & Floor Bark Brown

Product Code Identification Number: 245A130 MSDS Number:

GENERAL USE: Protective Coating

PRODUCT DESCRIPTION: Solvent base alkyd coating, hydrocarbon odor

MANUFACTURER'S NAME Ace Hardware Paint Division		DATE PREPARED: October 27, 2005 SUPERSEDES: November 20, 2004	Page 1 of 4
ADDRESS (NUMBER, STREET, P.O. BOX) 21901 South Central Avenue		TELEPHONE NUMBER FOR INFORMATION (800) 311-8324	
(CITY, STATE AND ZIP CODE) Matteson, IL 60443-2800	COUNTRY USA	EMERGENCY TELEPHONE NUMBER Infotrac (800) 535-5053 Outside USA (352) 323-3500	
DISTRIBUTOR'S NAME Ace Hardware Corporation			
ADDRESS (NUMBER, STREET, P.O. BOX) 2200 Kensington Court		TELEPHONE NUMBER FOR INFORMATION (800) 311-8324	
(CITY, STATE AND ZIP CODE) Oak Brook, IL 60523-2100	COUNTRY USA	EMERGENCY TELEPHONE NUMBER Infotrac (800) 535-5053 Outside USA (352) 323-3500	

SECTION 2 - HAZARDOUS INGREDIENTS

HAZARDOUS COMPONENTS	CAS #	% (by weight)	OSHA PEL		ACGIH TWA		SARA TITLE III	RQ LBS
			PPM	MG/M3	PPM	MG/M3		
Petroleum distillate, aliphatic	64742-47-8	10 - 30	100	525				
Petroleum distillate, aliphatic	64742-88-7	10 - 30	500	2000				

SECTION 3 - HAZARDS IDENTIFICATION

EMERGENCY OVERVIEW

Dark brown liquid, potentially hazardous vapors. Flammable as defined by DOT and TDG for Air / Ocean transport. Classified by DOT as Combustible for ground transport in containers less than 120 gallons. Classified as Combustible by OSHA. Can cause serious or fatal complications if swallowed. Can cause eye and skin irritation upon contact. Inhalation of vapors can cause anesthetic effect leading to death in poorly ventilated areas. Hazard symbols for this product - Xn; Risk Phrases - R 10, 20/22, 36/38

POTENTIAL HEALTH EFFECTS

INHALATION: High concentrations are irritating to the respiratory tract; may cause headache, dizziness, nausea, vomiting and malaise.

SECTION 4 - FIRST AID MEASURES

INHALATION: Remove affected person to fresh air; provide oxygen if breathing is difficult; if affected person is not breathing, administer CPR and seek emergency medical attention.

SKIN: Remove contaminated clothing; wash affected area with soap and water; launder contaminated clothing before reuse; if irritation persists, seek medical attention.

EYES: Remove contact lenses. Flush eyes with clear running water for 15 minutes while holding eyelids open; if irritation persists, seek medical attention.

INGESTION: DO NOT induce vomiting; if vomiting occurs spontaneously, keep head below hips to prevent aspiration of liquid into lungs; seek immediate medical attention. Vomiting may be induced only under the supervision of a physician.

SECTION 5 - FIRE FIGHTING MEASURES

FLASH POINT (METHOD USED)	FLAMMABLE LIMITS	LEL: 0.5%	UEL: 6.0%
105° F (PMCC)	AUTOIGNITION TEMPERATURE:	Not determined	NFPA CLASS: II

GENERAL HAZARDS: Product is considered combustible. Products of combustion include compounds of carbon, hydrogen and oxygen, including carbon monoxide.

EXTINGUISHING MEDIA
Carbon dioxide, water fog, dry chemical, chemical foam

FIRE FIGHTING PROCEDURES
Firefighters must wear full facepiece self - contained breathing apparatus in positive pressure mode. Do not use solid stream of water since stream will scatter and spread fire. Fine water spray can be used to keep fire - exposed containers cool.

UNUSUAL FIRE AND EXPLOSION HAZARDS
Closed containers can explode due to buildup of pressure when exposed to extreme heat. Do not use direct stream of water on pool fires as product may reignite on water surface. Caution - Material is combustible!

HAZARDOUS COMBUSTION PRODUCTS
Smoke, fumes, oxides of carbon

SECTION 6 - ENVIRONMENTAL RELEASE MEASURES

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED: COMBUSTIBLE - Evacuate and ventilate area; remove all sources of sparks, ignition and open flames; confine and absorb into approved absorbent; place material into approved containers for disposal; do not wash to sewer or waterway.

SECTION 7 - HANDLING AND STORAGE

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE: This material is combustible. It should be stored in tightly closed containers in a cool, well ventilated area. Vapor may form explosive mixtures in air. All sources of ignition should be controlled. This material may be classified as COMBUSTIBLE by DOT unless transported by vessel or aircraft. Refer to 49 CFR 173.120. Keep this and other chemicals out of reach of children. Avoid inhaling concentrated fumes or vapors.

SECTION 8 - EXPOSURE CONTROLS / PERSONAL PROTECTION

ENGINEERING CONTR0LS

The use of local exhaust ventilation is recommended to control emissions near the source. Provide mechanical ventilation of confined spaces. Use explosion-proof ventilation equipment. See Section 2 for Component Exposure Guidelines.

SECTION 9 - PHYSICAL AND CHEMICAL PROPERTIES

VAPOR PRESSURE (MM Hg) 3.4 mm Hg @ 20 ° C	VAPOR DENSITY (AIR = 1) > 1
SPECIFIC GRAVITY (WATER = 1) 1.043	EVAPORATION RATE (WATER = 1) < 1
SOLUBILITY IN WATER Negligible	FREEZING POINT Not determined
pH Not applicable	APPEARANCE AND ODOR Dark brown viscous liquid, hydrocarbon odor
BOILING POINT 298°F (148° C)	PHYSICAL STATE Liquid
VISCOSITY (KREBS) 75 - 80	

SECTION 10 - STABILITY AND REACTIVITY

STABILITY UNSTABLE: STABLE: XXX	CONDITIONS TO AVOID: Extreme temperatures, open flames

INCOMPATIBILITY (MATERIALS TO AVOID):
Strong oxidizers, strong acids

HAZARDOUS DECOMPOSITION OR BYPRODUCTS: Decomposition will not occur if handled and stored properly. In case of a fire, oxides of carbon, hydrocarbons, fumes, and smoke may be produced.

HAZARDOUS POLYMERIZATION MAY OCCUR: WILL NOT OCCUR: XXX	CONDITIONS TO AVOID: None

SECTION 11 - TOXICOLOGICAL INFORMATION

Hazardous Ingredients	CAS #	EINECS #	LD50 of Ingredient (Specify Species and Route)	LC50 of Ingredient (Specify Species)
Petroleum distillate, aliphatic	64742-47-8	265-149-8	Not determined	Not determined
Petroleum distillate, aliphatic	64742-88-7	265-191-7	Not determined	Not determined

SECTION 12 - ECOLOGICAL INFORMATION

No data are available on the adverse effects of this material on the environment. Neither COD nor BOD data are available. Based on the chemical composition of this product it is assumed that the mixture can be treated in an acclimatized biological waste treatment plant system in limited quantities. However, such treatment should be evaluated and approved for each specific biological system. None of the ingredients in this mixture are classified as a Marine Pollutant.

SECTION 13 - DISPOSAL CONSIDERATIONS

WASTE DISPOSAL METHOD: Dispose of in accordance with Local, State, and Federal Regulations. This product may produce concentrated hazardous vapors or fumes in a disposal container creating a dangerous environment. Refer to "40 CFR Protection of Environment Parts 260 - 299" for complete waste disposal regulations for ignitable materials. Consult your local, state, or Federal Environmental Protection Agency before disposing of any chemicals. Do not flush to sanitary sewer or waterway.

SECTION 14 - TRANSPORT INFORMATION

SECTION 15 - REGULATORY INFORMATION

TSCA (Toxic substance Control Act)
All components of this product are listed on the U.S. Toxic Substances Control Act Chemical Inventory (TSCA Inventory) or are exempted from listing because a Low Volume Exemption has been granted in accordance with 40 CFR 723.50.

SARA TITLE III (Superfund Amendments and Reauthorization Act)
311/312 Hazard Categories
Immediate health, fire hazard

313 Reportable Ingredients:
None

CERCLA (Comprehensive Response Compensation and Liability Act)
None

California Prop 65, Safe Drinking Water and Toxic Enforcement Act of 1986
There are no chemicals present known to the state of California to cause cancer or reproductive toxicity.

CPR (Canadian Controlled Products Regulations)
This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all the information required by the Controlled Products Regulations. WHMIS Classification: B3

DSL / NDSL (Canadian Domestic Substances List / Non-Domestic Substances List)
Components of this product identified by CAS number are listed on the DSL or NDSL, or are otherwise in compliance with the New Substances Notification (NSN) regulations. Only ingredients classified as "hazardous" are listed in Section 2 unless otherwise indicated.

EINECS (European Inventory of Existing Commercial Chemical Substances)
Components of this product identified by CAS numbers are on the European Inventory of Existing Commercial Chemical Substances.

EC Risk Phrases	SYMBOL(S) REQUIRED FOR LABEL	EC Safety Phrases
R10 Flammable R20/22 Harmful by inhalation and if swallowed. R36/38 Irritating to eyes and skin.	Harmful 	S23 Do not breathe vapor S25 Avoid contact with eyes S28 After contact with skin, wash immediately with plenty of soap and water. S29 Do not empty into drains

SECTION 16 - OTHER INFORMATION

No specific notes.

HMIS HAZARD RATINGS				
	HEALTH	1	* = Chronic Health Hazard	2 = MODERATE
	FLAMMABILITY	2	0 = INSIGNIFICANT	3 = HIGH
	PHYSICAL HAZARD	0	1 = SLIGHT	4 = EXTREME

REVISION SUMMARY: This MSDS has been revised in the following sections:
Section 14, DOT Classification

Material Safety Data Sheet

1. PRODUCT AND COMPANY IDENTIFICATION

Product Identification

Product ID:	**150.102A310**
Product Name:	C+K I/E HGLS LTX ULTR
Product Use:	Paint product.
Print date:	17/Jun/2013
Revision Date:	29/May/2013

Company Identification
The Valspar Corporation - Architectural Coatings Division
1191 Wheeling Road
Wheeling, IL 60090

Manufacturer's Phone:	1-847-520-8580
24-Hour Medical Emergency Phone:	1-888-345-5732

2. HAZARDS IDENTIFICATION

Primary Routes of Exposure:
Inhalation
Ingestion
Skin absorption

Eye Contact:

- May cause eye irritation.

Skin Contact:

- Causes mild skin irritation.

Ingestion:

- Irritation of the mouth, throat, and stomach.
- Harmful if swallowed.

Inhalation:

- Causes respiratory tract irritation.

Target Organ and Other Health Effects:
- Causes headache, drowsiness or other effects to the central nervous system.
- Kidney injury may occur.
- Cardiac irregularities

This product contains ingredients that may contribute to the following potential chronic health effects:
- Overexposure may cause nervous system damage.
- Prolonged exposure over TLV may produce pneumoconiosis.

Teratogens:
- May cause birth defects.

Carcinogens:
- Possible cancer hazard. Contains material which may cause cancer based on animal data.

3. COMPOSITION / INFORMATION ON HAZARDOUS INGREDIENTS

Ingredient Name CAS-No.	Approx. Weight %	Chemical Name
TITANIUM DIOXIDE 13463-67-7	20 - 25	Titanium dioxide
PROPRIETARY INERT	1 - 5	PROPRIETARY INERT
ETHYLENE GLYCOL 107-21-1	1 - 5	1,2-Ethanediol

If this section is blank there are no hazardous components per OSHA guidelines.

4. FIRST AID MEASURES

Eye Contact:
Get medical attention, if symptoms develop or persist. Immediately flush eye(s) with plenty of water.

Skin Contact:
Wash off with plenty of water.

Ingestion:
Rinse mouth with water. Give one or two glasses of water. Only induce vomiting at the instruction of medical personnel. Get medical attention. Never give anything by mouth to an unconscious person.

Inhalation:
Move injured person into fresh air and keep person calm under observation. Get medical attention, if symptoms develop or persist.

Medical conditions aggravated by exposure:
Any respiratory or skin condition.

5. FIRE FIGHTING MEASURES

Flash point (Fahrenheit):	205
Flash point (Celsius):	96
Lower explosive limit (%):	3
Upper explosive limit (%):	15
Autoignition temperature:	not determined
Sensitivity to impact:	no

5. FIRE FIGHTING MEASURES

Sensitivity to static discharge: Sensitivity to static discharge is not expected.
Hazardous combustion products: See Section 10.

Unusual fire and explosion hazards:
None known.

Extinguishing media:
Carbon dioxide, dry chemical, foam and/or water fog.

Fire fighting procedures:
Firefighters should be equipped with self-contained breathing apparatus and turn out gear. Keep containers and surroundings cool with water spray.

6. ACCIDENTAL RELEASE MEASURES

Action to be taken if material is released or spilled:
Ventilate the area. Contain spillage, soak up with non-combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and transfer to a container for disposal according to local / national regulations (see section 13). Avoid contact with eyes.

7. HANDLING AND STORAGE

Precautions to be taken in handling and storage:
Keep container closed when not in use. Do not freeze. Since emptied containers may contain product residue, follow all label warnings, even after container is emptied. Do not cut, drill, grind, or weld on or near this container.

8. PERSONAL PROTECTIVE EQUIPMENT AND EXPOSURE CONTROLS

Personal Protective Equipment

Eye and face protection:
Wear safety glasses or goggles to protect against exposure.

Skin protection:
Appropriate chemical resistant gloves should be worn.

Other Personel Protection Data:
Usual industrial work clothes.

Respiratory protection:
If exposure cannot be controlled below applicable limits, use the appropriate NIOSH approved respirator such as an air purifying respirator with organic vapor cartridge and dust/mist filter. Consult the respirator manufacturer's literature to ensure that the respirator will provide adequate protection. Read and follow all respirator manufacturer's instructions.

Ventilation
Use only in well-ventilated areas. Ovens used for curing should contain a fresh air purge to prevent vapours from accumulating and creating a possible explosive mixture. Ensure adequate ventilation, especially in confined areas.

Exposure Guidelines

OSHA Permissible Exposure Limits (PEL's)

Ingredient Name CAS-No.	Approx. Weight %	TWA (final)	Ceilings limits (final)	Skin designations
TITANIUM DIOXIDE 13463-67-7	20 - 25	15 mg/m^3 TWA dust total		

Ingredient Name CAS-No.	Approx. Weight %	TWA (final)	Ceilings limits (final)	Skin designations
PROPRIETARY INERT	1 - 5	5 mg/m^3 Respirable fraction. 15 mg/m^3 Total dust. Respirable fraction. Listed. Total dust. Listed.		

ACGIH Threshold Limit Value (TLV's)

Ingredient Name CAS-No.	Approx. Weight %	TWA	STEL	Ceiling limits	Skin designations
TITANIUM DIOXIDE 13463-67-7	20 - 25	10 mg/m^3 TWA			
PROPRIETARY INERT	1 - 5	10 mg/m³			
ETHYLENE GLYCOL 107-21-1	1 - 5			100 mg/m^3 Ceiling aerosol only	

9. PHYSICAL PROPERTIES

Odor:	Normal for this product type.
Physical State:	liquid
pH:	not determined
Vapor pressure:	24 mmHg @ 77ºF (25ºC)
Vapor density (air = 1.0):	2.14
Boiling point:	212ºF (100ºC)
Solubility in water:	not determined
Coefficient of water/oil distribution:	not determined
Density (lbs per US gallon):	10.52
Specific Gravity:	1.26
Evaporation rate (butyl acetate = 1.0):	0.1
Flash point (Fahrenheit):	205
Flash point (Celsius):	96
Lower explosive limit (%):	3
Upper explosive limit (%):	15
Autoignition temperature:	not determined

10. STABILITY AND REACTIVITY

Stability:	Stable under normal conditions.
Conditions to Avoid:	None known.
Incompatibility:	Strong oxidizing agents
Hazardous Polymerization:	None anticipated.
Hazardous Decomposition Products:	Carbon monoxide and carbon dioxide. Metal oxide fumes.

Sensitivity to static discharge: Sensitivity to static discharge is not expected.

11. TOXICOLOGICAL INFORMATION

Ingredient Name CAS-No.	Approx. Weight %	NIOSH - Selected LD50s and LC50s

11. TOXICOLOGICAL INFORMATION

TITANIUM DIOXIDE 13463-67-7	20 - 25	> 10000 mg/kg Oral LD50 Rat
PROPRIETARY INERT	1 - 5	> 2.2 mg/L Inhalation LC50 Rat 1 h > 2000 mg/kg Dermal LD50 Rabbit > 5000 mg/kg Oral LD50 Rat
ETHYLENE GLYCOL 107-21-1	1 - 5	= 4000 mg/kg Oral LD50 Rat = 9530 µL/kg Dermal LD50 Rabbit

Mutagens/Teratogens/Carcinogens:

May cause birth defects.

Possible cancer hazard. Contains material which may cause cancer based on animal data.

Contains TIO2 which is listed by IARC as a possible human carcinogen (Group 2B) based on animal data. Neither long term animal studies, nor human epidemiology studies of workers exposed to TIO2 provide an adequate basis to conclude TIO2 is carcinogenic. TIO2 is not classified as a carcinogen by NTP, U.S. OSHA, or the U.S. EPA.

Ingredient Name CAS-No.	Approx. Weight %	IARC Group 1 - Human Evidence	IARC Group 2A - Limited Human Data	IARC Group 2B - Sufficient Animal Data
TITANIUM DIOXIDE 13463-67-7	20 - 25			Monograph 47 [1989]

Ingredient Name CAS-No.	Approx. Weight %	OSHA - Hazard Communication Carcinogens	OSHA - Specifically Regulated Carcinogens	ACGIH Carcinogens
TITANIUM DIOXIDE 13463-67-7	20 - 25	Present		

12. ECOLOGICAL DATA

No information on ecology is available.

13. DISPOSAL CONSIDERATIONS

Disposal should be made in accordance with federal, state and local regulations.

14. TRANSPORTATION INFORMATION

U.S. Department of Transportation

UN ID Number (msds): NRPAIN
Proper Shipping Name: PAINT, NOT REGULATED

U.S Hazmat and/or International DG shipment exceptions

The supplier may apply one of the following exceptions: Combustible Liquid, Consumer Commodity, Limited Quantity, Viscous Liquid, Does Not Sustain Combustion, or others, as allowed under 49CFR Hazmat Regulations. Please consult 49CFR Subchapter C to ensure that subsequent shipments comply with these exceptions.

Reportable Quantity Description:

International Air Transport Association (IATA):

Proper shipping name: NOT REGULATED

International Maritime Organization (IMO):

Proper shipping name: NOT REGULATED
Marine Pollutant No

15. REGULATORY INFORMATION

U.S. FEDERAL REGULATIONS:

Ingredient Name CAS-No.	Approx. Weight %	SARA 302	SARA 313	CERCLA RQ in lbs.
ETHYLENE GLYCOL 107-21-1	1 - 5		form R reporting required for 1.0% de minimis concentration	5000

SARA 311/312 Hazard Class:

Acute:	yes
Chronic:	yes
Flammability:	no
Reactivity:	no
Sudden Pressure:	no

U.S. STATE REGULATIONS:

Right to Know:
The specific chemical identity of a component may be withheld as a trade secret under 34 Pennsylvania Code, Chapter 317.

Pennsylvania Right To Know:

TITANIUM DIOXIDE	13463-67-7
PROPRIETARY INERT	Trade Secret
ETHYLENE GLYCOL	107-21-1

Additional Non-Hazardous Materials

PROPRIETARY INGREDIENT	Trade Secret
PROPRIETARY RESIN	Trade Secret

Rule 66 status of product Not photochemically reactive.

INTERNATIONAL REGULATIONS - Chemical Inventories

US TSCA Inventory:
All components of this product are in compliance with U.S. TSCA Chemical Substance Inventory Requirements.

Canada Domestic Substances List:
Not all components in this product are listed on the Domestic Substances List.

16. OTHER INFORMATION

HMIS Codes

Health:	2*
Flammability:	0
Reactivity:	1
PPE:	X - See Section 8 for Personal Protective Equipment (PPE).

Abbreviations:
OSHA - Occupational Safety and Health Administration, IARC - International Agency for Research on Cancer, NIOSH - National Institute of Occupational Safety and Health, NTP - National Toxicology Program, ACGIH - American Conference of Governmental Industrial Hygienists, SCAQMD - South Coast Air Quality Management District, TSCA - Toxic Substances Control Act, IATA - International Air Transport Association, IMO - International Maritime Organization, DOT - Department of Transportation, NA - Not applicable, NOT ESTAB - Not established, N.A.V. - Not available, RQ - Reportable quantity, WT - Weight, MG/CU M - Milligrams per cubic meter, G/L - Grams per liter, MM - Millimeters, MPPCF - Millions of particles per cubic foot, PPM - parts per million, PPT - parts per thousand, TCC/PM - Tag closed cup / Pensky-Martens, PB - Lead, PEL - Permissible exposure level, TWA - Time Weighted Average, STEL - Short term exposure limit, C - Celsius, F - Fahrenheit.

Disclaimer:
The data on this sheet represent typical values. Since application variables are a major factor in product performance, this information should serve only as a general guide. Valspar assumes no obligation or liability for use of this information. UNLESS VALSPAR AGREES OTHERWISE IN WRITING, VALSPAR MAKES NO WARRANTIES, EXPRESS OR IMPLIED, AND DISCLAIMS ALL IMPLIED WARRANTIES INCLUDING WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR USE OR FREEDOM FROM PATENT INFRINGEMENT. VALSPAR WILL NOT BE LIABLE FOR ANY SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES. Your only remedy for any defect in this product is the replacement of the defective product, or a refund of its purchase price, at our option. This MSDS contains additional information required by the state of Pennsylvania.

Preparation Information:

Prepared By:	Regulatory Affairs Department
Print date:	17/Jun/2013
Revision Date:	29/May/2013

Material Safety Data Sheet

Royal Interiors Flat Latex Wall Paint

1. Product and company identification

Product name : Royal Interiors Flat Latex Wall Paint

Material uses : Coatings: Waterborne paint.

Code : 183A100, 101, 105, 128, 129, 180, 181, 182, 186, 188, 310, 320, 330, 340

Manufacturer : Ace Hardware Paint Division
21901 South Central Avenue,
Matteson, IL 60443-2800
Phone #: (800) 311-8324

Supplier : Ace Hardware Corporation
2200 Kensington Court,
Oak Brook, IL 60523-2100
(800) 311-8324

Validation date : 10/14/2010.

Prepared by : Atrion Regulatory Services, Inc.

In case of emergency : Infotrac (800) 535-5053
Outside USA (352) 323-3500

2. Hazards identification

Physical state : Liquid.

Color : Various

Odor : Characteristic.

Emergency overview

Signal word : WARNING!

Hazard statements : CAUSES EYE IRRITATION. MAY CAUSE RESPIRATORY TRACT AND SKIN IRRITATION. CONTAINS MATERIAL THAT MAY CAUSE TARGET ORGAN DAMAGE, BASED ON ANIMAL DATA. CANCER HAZARD - CAN CAUSE CANCER. BIRTH DEFECT HAZARD - CAN CAUSE BIRTH DEFECTS. DEVELOPMENTAL HAZARD - CAN CAUSE ADVERSE DEVELOPMENTAL EFFECTS.

Precautions : Avoid exposure - obtain special instructions before use. Do not breathe vapor or mist. Do not get on skin or clothing. Avoid contact with eyes. Avoid exposure during pregnancy. Use only with adequate ventilation. Keep container tightly closed and sealed until ready for use. Wash thoroughly after handling.

OSHA/HCS status : This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).

Routes of entry : Dermal contact. Eye contact. Inhalation. Ingestion.

Potential acute health effects

Inhalation : Slightly irritating to the respiratory system.

Ingestion : No known significant effects or critical hazards.

Skin : Slightly irritating to the skin.

Eyes : Irritating to eyes.

Potential chronic health effects

Chronic effects : Contains material that may cause target organ damage, based on animal data.

Carcinogenicity : Can cause cancer. Risk of cancer depends on duration and level of exposure.

Mutagenicity : No known significant effects or critical hazards.

Teratogenicity : Can cause birth defects.

Developmental effects : Can cause developmental abnormalities.

2. Hazards identification

Fertility effects : No known significant effects or critical hazards.

Target organs : Contains material which may cause damage to the following organs: kidneys, lungs, upper respiratory tract, skin, eyes.

Over-exposure signs/symptoms

Inhalation : Adverse symptoms may include the following:
respiratory tract irritation
coughing

Ingestion : No specific data.

Skin : Adverse symptoms may include the following:
irritation
redness

Eyes : Adverse symptoms may include the following:
pain or irritation
watering
redness

Medical conditions aggravated by over-exposure : Pre-existing disorders involving any target organs mentioned in this MSDS as being at risk may be aggravated by over-exposure to this product.

3. Composition/information on ingredients

United States

Name	CAS number	%
Isobutyric acid, monoester with 2,2,4-trimethylpentane-1,3-diol	25265-77-4	10-30
Nepheline syenite	37244-96-5	10-30
Limestone	1317-65-3	10-30
Titanium dioxide	13463-67-7	10-30
Ceramic materials and wares, chemicals	66402-68-4	5-10
Silica, amorphous - diatomaceous earth	61790-53-2	1-5
Quartz (SiO2)	14808-60-7	1-5
Carbon black	1333-86-4	0.1-1
Palygorskite	12174-11-7	0.1-1

Canada

Name	CAS number	%
Nepheline syenite	37244-96-5	10-30
Limestone	1317-65-3	10-30
Titanium dioxide	13463-67-7	10-30
Ceramic materials and wares, chemicals	66402-68-4	5-10
Silica, amorphous - diatomaceous earth	61790-53-2	1-5
Quartz (SiO2)	14808-60-7	1-5
Ethylene glycol	107-21-1	0.1-1
Carbon black	1333-86-4	0.1-1
Palygorskite	12174-11-7	0.1-1

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment and hence require reporting in this section.

4. First aid measures

Eye contact : Check for and remove any contact lenses. Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Get medical attention if symptoms occur.

Skin contact : In case of contact, immediately flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Wash clothing before reuse. Clean shoes thoroughly before reuse. Get medical attention if symptoms occur.

Inhalation : Move exposed person to fresh air. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. Loosen tight clothing such as a collar, tie, belt or waistband. Get medical attention if symptoms occur.

Ingestion : Wash out mouth with water. Do not induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. Get medical attention if symptoms occur.

Protection of first-aiders : No action shall be taken involving any personal risk or without suitable training. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

Notes to physician : No specific treatment. Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.

5. Fire-fighting measures

Flammability of the product : In a fire or if heated, a pressure increase will occur and the container may burst.

Extinguishing media

Suitable : Use an extinguishing agent suitable for the surrounding fire.

Not suitable : None known.

Special exposure hazards : Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.

Hazardous thermal decomposition products : Decomposition products may include the following materials:
carbon dioxide
carbon monoxide
metal oxide/oxides

Special protective equipment for fire-fighters : Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

6. Accidental release measures

Personal precautions : No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Avoid breathing vapor or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment (see Section 8).

Environmental precautions : Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

Methods for cleaning up

Small spill : Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

6. Accidental release measures

Large spill : Stop leak if without risk. Move containers from spill area. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations (see section 13). Dispose of via a licensed waste disposal contractor. Contaminated absorbent material may pose the same hazard as the spilled product. Note: see section 1 for emergency contact information and section 13 for waste disposal.

7. Handling and storage

Handling : Put on appropriate personal protective equipment (see Section 8). Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. Avoid exposure - obtain special instructions before use. Do not get in eyes or on skin or clothing. Do not ingest. Avoid breathing vapor or mist. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Empty containers retain product residue and can be hazardous. Do not reuse container.

Storage : Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

8. Exposure controls/personal protection

United States

Nepheline syenite	**ACGIH TLV (United States).** TWA: 10 mg/m³ Form: Inhalable
Limestone	**OSHA PEL 1989 (United States, 3/1989).** TWA: 5 mg/m³ 8 hour(s). Form: Respirable fraction TWA: 15 mg/m³ 8 hour(s). Form: Total dust **NIOSH REL (United States, 6/2009).** TWA: 5 mg/m³ 10 hour(s). Form: Respirable fraction TWA: 10 mg/m³ 10 hour(s). Form: Total **OSHA PEL (United States, 11/2006).** TWA: 5 mg/m³ 8 hour(s). Form: Respirable fraction TWA: 15 mg/m³ 8 hour(s). Form: Total dust
Titanium dioxide	**ACGIH TLV (United States, 2/2010).** TWA: 10 mg/m³ 8 hour(s). **OSHA PEL 1989 (United States, 3/1989).** TWA: 10 mg/m³ 8 hour(s). Form: Total dust **OSHA PEL (United States, 11/2006).** TWA: 15 mg/m³ 8 hour(s). Form: Total dust
Silica, amorphous - diatomaceous earth	**OSHA PEL 1989 (United States, 3/1989).** TWA: 6 mg/m³ 8 hour(s). **OSHA PEL Z3 (United States, 9/2005).** TWA: 20 mppcf 8 hour(s). TWA: 80 mg/m³ 8 hour(s).
Quartz (SiO2)	**OSHA PEL Z3 (United States, 9/2005).** TWA: 250 mppcf 8 hour(s). Form: Respirable TWA: 10 mg/m³ 8 hour(s). Form: Respirable TWA: 30 mg/m³ 8 hour(s). Form: Total dust.

8. Exposure controls/personal protection

	OSHA PEL 1989 (United States, 3/1989). TWA: 0.1 mg/m³, (as quartz) 8 hour(s). Form: Respirable dust **ACGIH TLV (United States, 2/2010).** TWA: 0.025 mg/m³ 8 hour(s). Form: Respirable fraction; see Appendix C **NIOSH REL (United States, 6/2009).** TWA: 0.05 mg/m³ 10 hour(s). Form: respirable dust
Carbon black	**ACGIH TLV (United States, 2/2010).** TWA: 3.5 mg/m³ 8 hour(s). **OSHA PEL 1989 (United States, 3/1989).** TWA: 3.5 mg/m³ 8 hour(s). **NIOSH REL (United States, 6/2009).** TWA: 3.5 mg/m³ 10 hour(s). TWA: 0.1 mg of PAHs/cm³ 10 hour(s). **OSHA PEL (United States, 11/2006).** TWA: 3.5 mg/m³ 8 hour(s).

Canada

Occupational exposure limits		TWA (8 hours)			STEL (15 mins)			Ceiling			
Ingredient	**List name**	**ppm**	**mg/m³**	**Other**	**ppm**	**mg/m³**	**Other**	**ppm**	**mg/m³**	**Other**	**Notations**
Quartz (SiO2)	US ACGIH 2/2010	-	0.025	-	-	-	-	-	-	-	[a]
	AB 4/2009	-	0.025	-	-	-	-	-	-	-	[b]
	BC 10/2009	-	0.025	-	-	-	-	-	-	-	[c]
	ON 7/2010	-	0.1	-	-	-	-	-	-	-	[d]
	QC 6/2008	-	0.1	-	-	-	-	-	-	-	[e]
Titanium dioxide	US ACGIH 2/2010	-	10	-	-	-	-	-	-	-	
	AB 4/2009	-	10	-	-	-	-	-	-	-	[3]
	BC 10/2009	-	3	-	-	-	-	-	-	-	[f]
		-	10	-	-	-	-	-	-	-	[g]
	ON 7/2010	-	10	-	-	-	-	-	-	-	[h]
	QC 6/2008	-	10	-	-	-	-	-	-	-	[i]
Carbon black	US ACGIH 2/2010	-	3.5	-	-	-	-	-	-	-	
	AB 4/2009	-	3.5	-	-	-	-	-	-	-	
	BC 10/2009	-	3.5	-	-	-	-	-	-	-	
	ON 7/2010	-	3.5	-	-	-	-	-	-	-	
	QC 6/2008	-	3.5	-	-	-	-	-	-	-	
Limestone	AB 4/2009	-	10	-	-	-	-	-	-	-	[3]
	BC 10/2009	-	3	-	-	-	-	-	-	-	[f]
		-	-	-	-	20	-	-	-	-	
		-	10	-	-	-	-	-	-	-	[g]
	QC 6/2008	-	10	-	-	-	-	-	-	-	[i]
Palygorskite		-	-	1 f/cc	-	-	-	-	-	-	[j]
Ethylene glycol	US ACGIH 2/2010	-	-	-	-	-	-	-	100	-	[k]
	AB 4/2009	-	-	-	-	-	-	-	100	-	[3] [l]
	BC 10/2009	-	-	-	-	-	-	-	100	-	[k]
		-	10	-	-	20	-	-	-	-	[m]
		-	-	-	-	-	-	50	-	-	[n]
	ON 7/2010	-	-	-	-	-	-	-	100	-	[l]
	QC 6/2008	-	-	-	50	127	-	-	-	-	[o]
Nepheline syenite	US ACGIH	-	10	-	-	-	-	-	-	-	[p]
	ON 7/2010	-	10	-	-	-	-	-	-	-	
Silica, amorphous - diatomaceous earth	BC 10/2009	-	1.5	-	-	-	-	-	-	-	[c]
		-	4	-	-	-	-	-	-	-	
	ON 7/2010	-	10	-	-	-	-	-	-	-	[q]
		-	3	-	-	-	-	-	-	-	[d]
		-	3	-	-	-	-	-	-	-	[r]
	QC 6/2008	-	6	-	-	-	-	-	-	-	[i]

8. Exposure controls/personal protection

[3]Skin sensitization
Form: [a]Respirable fraction; see Appendix C [b]Respirable particulate [c]Respirable [d]Respirable fraction: means that size fraction of the airborne particulate deposited in the gas-exchange region of the respiratory tract and collected during air sampling with a particle size-selective device that, (a) meets the ACGIH particle size–selective sampling criteria for airborne particulate matter; and (b) has the cut point of 4 µm at 50 per cent collection efficiency. [e]Respirable dust. [f]Respirable dust [g]Total dust [h]total dust [i]Total dust. [j]RESPIRABLE FIBRES (other than respirable asbestos fibres) : Objects, other than respirable asbestos fibres, longer than 5 µm, having a diameter of less than 3 µm and a ratio of length to diameter of more than 3 :1. [k]Aerosol [l]aerosol [m]Particulate [n]Vapour [o]vapour and mist [p]Inhalable [q]Inhalable fraction: means that size fraction of the airborne particulate deposited anywhere in the respiratory tract and collected during air sampling with a particle size-selective device that, (a) meets the ACGIH particle size-selective sampling criteria for airborne particulate matter; and (b) has the cut point of 100 µm at 50 per cent collection efficiency. [r]The value is for particulate matter containing no asbestos and < 1 per cent crystalline silica.

Consult local authorities for acceptable exposure limits.

Recommended monitoring procedures : If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment.

Engineering measures : Use only with adequate ventilation. If user operations generate dust, fumes, gas, vapor or mist, use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits.

Hygiene measures : Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.

Personal protection

Respiratory : Use a properly fitted, air-purifying or air-fed respirator complying with an approved standard if a risk assessment indicates this is necessary. 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.

Hands : Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.

Eyes : Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists or dusts.

Skin : Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.

Environmental exposure controls : Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

9. Physical and chemical properties

Physical state : Liquid.

Flash point : Not available.

Auto-ignition temperature : Not available.

Flammable limits : Not available.

Color : Various

Odor : Characteristic.

9. Physical and chemical properties

pH : 8.5 to 9

Boiling/condensation point : Not available.

Melting/freezing point : Not available.

Relative density : 1.252 to 1.442

Density : 1.25 to 1.439 g/cm^3

Vapor pressure : Not available.

Vapor density : Not available.

VOC content : 0.234 to 0.409 lbs/gal (28 to 49 g/l)

Odor threshold : Not available.

Evaporation rate : Not available.

Viscosity : Not available.

Solubility : Easily soluble in the following materials: cold water and hot water.

LogK_{ow} : Not available.

10. Stability and reactivity

Chemical stability : The product is stable.

Conditions to avoid : No specific data.

Incompatible materials : Reactive or incompatible with the following materials: oxidizing materials, reducing materials, metals, acids and alkalis.

Hazardous decomposition products : Under normal conditions of storage and use, hazardous decomposition products should not be produced.

Possibility of hazardous reactions : Under normal conditions of storage and use, hazardous reactions will not occur.

Under normal conditions of storage and use, hazardous polymerization will not occur.

11. Toxicological information

Acute toxicity

Product/ingredient name	Result	Species	Dose	Exposure
Titanium dioxide	TDLo Oral	Rat	60 g/kg	-
Carbon black	LD50 Dermal	Rabbit	>3 g/kg	-
	LD50 Oral	Rat	>15400 mg/kg	-
Ethylene glycol	LD50 Oral	Rat	4700 mg/kg	-

Chronic toxicity

Not available.

Irritation/Corrosion

Product/ingredient name	Result	Species	Score	Exposure	Observation
Titanium dioxide	Skin - Mild irritant	Human	-	-	-
Ethylene glycol	Eyes - Mild irritant	Rabbit	-	-	-
	Eyes - Moderate irritant	Rabbit	-	-	-
	Skin - Mild irritant	Rabbit	-	-	-

Sensitizer

Not available.

Carcinogenicity

Classification

11. Toxicological information

Product/ingredient name	ACGIH	IARC	EPA	NIOSH	NTP	OSHA
Titanium dioxide	A4	2B	-	-	-	-
Silica, amorphous - diatomaceous earth	-	3	-	-	-	-
Quartz (SiO2)	A2	1	-	+	Proven.	-
Carbon black	A4	2B	-	+	-	-
Palygorskite	-	2B	-	-	-	-

Mutagenicity

Not available.

Teratogenicity

Not available.

Reproductive toxicity

Not available.

12. Ecological information

Ecotoxicity : No known significant effects or critical hazards.

Aquatic ecotoxicity

Product/ingredient name	Result	Species	Exposure
Titanium dioxide	Acute EC50 >1000000 ug/L Fresh water	Daphnia - Daphnia magna - <24 hours	48 hours
	Acute LC50 5.5 ppm Fresh water	Daphnia - Daphnia magna - Juvenile (Fledgling, Hatchling, Weanling) - <24 hours	48 hours
	Acute LC50 >1000000 ug/L Marine water	Fish - Fundulus heteroclitus	96 hours
	Chronic NOEC 1 ppm Fresh water	Daphnia - Daphnia magna - Juvenile (Fledgling, Hatchling, Weanling) - <24 hours	48 hours
	Chronic NOEC 500 ppm Fresh water	Daphnia - Daphnia magna - Juvenile (Fledgling, Hatchling, Weanling) - <24 hours	48 hours
Ethylene glycol	Acute LC50 >100000 ug/L Marine water	Crustaceans - Crangon crangon - Adult	48 hours
	Acute LC50 6900000 ug/L Fresh water	Daphnia - Ceriodaphnia dubia - Neonate	48 hours
	Acute LC50 8050000 ug/L Fresh water	Fish - Pimephales promelas - <=7 days	96 hours
	Chronic NOEC 11610000 ug/L Fresh water	Daphnia - Ceriodaphnia dubia - <=24 hours	48 hours
	Chronic NOEC 6090000 ug/L Fresh water	Fish - Pimephales promelas - <=7 days	96 hours
Royal Interiors Flat Latex Wall Paint	Acute LC50 164.94 ppm	Fish	96 hours

Conclusion/Summary : Data from an analogous product.

Persistence/degradability

Not available.

13. Disposal considerations

Waste disposal : The generation of waste should be avoided or minimized wherever possible. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe way. Significant quantities of waste product residues should not be disposed of via the foul sewer but processed in a suitable effluent treatment plant. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

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

Refer to Section 7: HANDLING AND STORAGE and Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION for additional handling information and protection of employees.

14. Transport information

DOT/TDG/IMDG/IATA : Not regulated.

15. Regulatory information

United States

HCS Classification : Irritating material
Carcinogen
Target organ effects

U.S. Federal regulations : **TSCA 4(a) proposed test rules**: Acetaldehyde
TSCA 8(a) PAIR: Octyl phenol condensed with 3 moles ethylene oxide; Tergitol NP-27; Acetaldehyde
TSCA 8(a) IUR: Partial exemption
United States inventory (TSCA 8b): Not determined.
TSCA 8(d) H and S data reporting: Acetaldehyde

SARA 302/304/311/312 extremely hazardous substances: No products were found.
SARA 302/304 emergency planning and notification: No products were found.
SARA 302/304/311/312 hazardous chemicals: Limestone; Titanium dioxide; Quartz (SiO2)
SARA 311/312 MSDS distribution - chemical inventory - hazard identification: Limestone: Immediate (acute) health hazard; Titanium dioxide: Immediate (acute) health hazard; Quartz (SiO2): Immediate (acute) health hazard, Delayed (chronic) health hazard

Clean Water Act (CWA) 311: Acetaldehyde; Vinyl acetate; ammonia; ammonia, anhydrous

Clean Air Act (CAA) 112 accidental release prevention: No products were found.

Clean Air Act Section 112(b) Hazardous Air Pollutants (HAPs) : Not listed

Clean Air Act Section 602 Class I Substances : Not listed

Clean Air Act Section 602 Class II Substances : Not listed

DEA List I Chemicals (Precursor Chemicals) : Not listed

DEA List II Chemicals (Essential Chemicals) : Not listed

15. Regulatory information

SARA 313

Form R - Reporting requirements Not applicable.

Supplier notification Not applicable.

State regulations

Massachusetts : The following components are listed: SILICA, CRYSTALLINE, QUARTZ; TITANIUM DIOXIDE; CALCIUM CARBONATE

New York : None of the components are listed.

New Jersey : The following components are listed: SILICA, AMORPHOUS DIATOMACEOUS EARTH; KIESELGUHR; SILICA, QUARTZ; QUARTZ (SiO2); TITANIUM DIOXIDE; TITANIUM OXIDE (TiO2); CARBON BLACK; CALCIUM CARBONATE; LIMESTONE

Pennsylvania : The following components are listed: QUARTZ (SIO2); TITANIUM OXIDE (TIO2); CARBON BLACK; LIMESTONE

California Prop. 65

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

Ingredient name	Cancer	Reproductive	No significant risk level	Maximum acceptable dosage level
Quartz (SiO2)	Yes.	No.	No.	No.
Carbon black	Yes.	No.	No.	No.
Palygorskite	Yes.	No.	No.	No.
Acetaldehyde	Yes.	No.	90 µg/day (inhalation)	No.

Canada

WHMIS (Canada) : Class D-2A: Material causing other toxic effects (Very toxic).
Class D-2B: Material causing other toxic effects (Toxic).

Canadian lists

Canadian NPRI : None of the components are listed.

CEPA Toxic substances : None of the components are listed.

Canada inventory : Not determined.

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all the information required by the Controlled Products Regulations.

International regulations

International lists : **Australia inventory (AICS)**: Not determined.
China inventory (IECSC): Not determined.
Japan inventory: Not determined.
Korea inventory: Not determined.
New Zealand Inventory of Chemicals (NZIoC): Not determined.
Philippines inventory (PICCS): Not determined.

Chemical Weapons Convention List Schedule I Chemicals : Not listed

Chemical Weapons Convention List Schedule II Chemicals : Not listed

Chemical Weapons Convention List Schedule III Chemicals : Not listed

16. Other information

Label requirements : CAUSES EYE IRRITATION. MAY CAUSE RESPIRATORY TRACT AND SKIN IRRITATION. CONTAINS MATERIAL THAT MAY CAUSE TARGET ORGAN DAMAGE, BASED ON ANIMAL DATA. CANCER HAZARD - CAN CAUSE CANCER. BIRTH DEFECT HAZARD - CAN CAUSE BIRTH DEFECTS. DEVELOPMENTAL HAZARD - CAN CAUSE ADVERSE DEVELOPMENTAL EFFECTS.

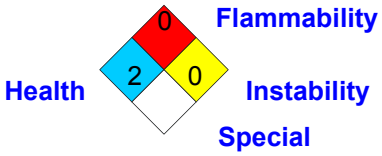
Hazardous Material Information System (U.S.A.) :

Health	*	2
Flammability		0
Physical hazards		0

Caution: HMIS® ratings are based on a 0-4 rating scale, with 0 representing minimal hazards or risks, and 4 representing significant hazards or risks Although HMIS® ratings are not required on MSDSs under 29 CFR 1910.1200, the preparer may choose to provide them. HMIS® ratings are to be used with a fully implemented HMIS® program. HMIS® is a registered mark of the National Paint & Coatings Association (NPCA). HMIS® materials may be purchased exclusively from J. J. Keller (800) 327-6868.

The customer is responsible for determining the PPE code for this material.

National Fire Protection Association (U.S.A.) :



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Copyright ©2001, National Fire Protection Association, Quincy, MA 02269. This warning system is intended to be interpreted and applied only by properly trained individuals to identify fire, health and reactivity hazards of chemicals. The user is referred to certain limited number of chemicals with recommended classifications in NFPA 49 and NFPA 325, which would be used as a guideline only. Whether the chemicals are classified by NFPA or not, anyone using the 704 systems to classify chemicals does so at their own risk.

Date of issue : 10/14/2010.

Date of previous issue : No previous validation.

Version : 1

Indicates information that has changed from previously issued version.

Notice to reader

To the best of our knowledge, the information contained herein is accurate. However, neither the above-named supplier, nor any of its subsidiaries, assumes any liability whatsoever for the accuracy or completeness of the information contained herein.
Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist.

MATERIAL SAFETY DATA SHEET

1010057
02 00

Section 1 -- PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NUMBER

1010057

HMIS CODES

Health	2*
Flammability	4
Reactivity	0

PRODUCT NAME

ACE® RUST STOP Indoor/Outdoor Enamel, Sand

MANUFACTURER'S NAME

Mfd. for:
ACE HARDWARE COPORATION
Oak Brook, IL 60521

Medical Emergency Phone No.
(216) 566-2917
Transportation Emergency
(800) 424-9300
Regulatory Information
(216) 566-2902

DATE OF PREPARATION

19-AUG-07

Section 2 -- COMPOSITION/INFORMATION ON INGREDIENTS

% by WT	CAS No.	INGREDIENT			UNITS	VAPOR PRESSURE
14	74-98-6	Propane				
			ACGIH TLV	2500	ppm	760 mm
			OSHA PEL	1000	ppm	
13	106-97-8	Butane				
			ACGIH TLV	800	ppm	760 mm
			OSHA PEL	800	ppm	
21	64742-89-8	V. M. & P. Naphtha				
			ACGIH TLV	300	ppm	12 mm
			OSHA PEL	300	ppm	
			OSHA PEL	400	ppm STEL	
1	100-41-4	Ethylbenzene				
			ACGIH TLV	100	ppm	7.1 mm
			ACGIH TLV	125	ppm STEL	
			OSHA PEL	100	ppm	
			OSHA PEL	125	ppm STEL	
8	1330-20-7	Xylene				
			ACGIH TLV	100	ppm	5.9 mm
			ACGIH TLV	150	ppm STEL	
			OSHA PEL	100	ppm	
			OSHA PEL	150	ppm STEL	
23	67-64-1	Acetone				
			ACGIH TLV	500	ppm	180 mm
			ACGIH TLV	750	ppm STEL	
			OSHA PEL	1000	ppm	
1	1332-58-7	Kaolin				
			ACGIH TLV	2	mg/m3 as Resp. Dust	
			OSHA PEL	10	mg/m3 Total Dust	
			OSHA PEL	5	mg/m3 Respirable Fraction	
4	13463-67-7	Titanium Dioxide				
			ACGIH TLV	10	mg/m3 as Dust	
			OSHA PEL	10	mg/m3 Total Dust	
			OSHA PEL	5	mg/m3 Respirable Fraction	
---	---	---	---	---	---	---
0.14		Barium (as Ba; total)				

Continued on page 2

Section 3 -- HAZARDS IDENTIFICATION

ROUTES OF EXPOSURE
INHALATION of vapor or spray mist.
EYE or SKIN contact with the product, vapor or spray mist.
EFFECTS OF OVEREXPOSURE
EYES: Irritation.
SKIN: Prolonged or repeated exposure may cause irritation.
INHALATION: Irritation of the upper respiratory system.
May cause nervous system depression. Extreme overexposure may result in unconsciousness and possibly death.
SIGNS AND SYMPTOMS OF OVEREXPOSURE
Headache, dizziness, nausea, and loss of coordination are indications of excessive exposure to vapors or spray mists.
Redness and itching or burning sensation may indicate eye or excessive skin exposure.
MEDICAL CONDITIONS AGGRAVATED BY EXPOSURE
None generally recognized.
CANCER INFORMATION
For complete discussion of toxicology data refer to Section 11.

Section 4 -- FIRST AID MEASURES

EYES: Flush eyes with large amounts of water for 15 minutes. Get medical attention.
SKIN: Wash affected area thoroughly with soap and water. Remove contaminated clothing and launder before re-use.
INHALATION: If affected, remove from exposure. Restore breathing. Keep warm and quiet.
INGESTION: Do not induce vomiting. Get medical attention immediately.

Section 5 -- FIRE FIGHTING MEASURES

FLASH POINT	LEL	UEL
Propellant < 0 F	0.9	12.8

EXTINGUISHING MEDIA
Carbon Dioxide, Dry Chemical, Foam
UNUSUAL FIRE AND EXPLOSION HAZARDS
Containers may explode when exposed to extreme heat.
Application to hot surfaces requires special precautions.
During emergency conditions overexposure to decomposition products may cause a health hazard. Symptoms may not be immediately apparent. Obtain medical attention.
SPECIAL FIRE FIGHTING PROCEDURES
Full protective equipment including self-contained breathing apparatus should be used.
Water spray may be ineffective. If water is used, fog nozzles are preferable. Water may be used to cool closed containers to prevent pressure build-up and possible autoignition or explosion when exposed to extreme heat.

Continued on page 3

Section 6 -- ACCIDENTAL RELEASE MEASURES

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED

Remove all sources of ignition. Ventilate the area.

Remove with inert absorbent.

Section 7 -- HANDLING AND STORAGE

STORAGE CATEGORY

Not Available

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE

Keep away from heat, sparks, and open flame. Vapors will accumulate readily and may ignite explosively.

During use and until all vapors are gone: Keep area ventilated - Do not smoke - Extinguish all flames, pilot lights, and heaters - Turn off stoves, electric tools and appliances, and any other sources of ignition.

Consult NFPA Code. Use approved Bonding and Grounding procedures.

Contents under pressure. Do not puncture, incinerate, or expose to temperature above 120F. Heat from sunlight, radiators, stoves, hot water, and other heat sources could cause container to burst. Do not take internally. Keep out of the reach of children.

Section 8 -- EXPOSURE CONTROLS/PERSONAL PROTECTION

PRECAUTIONS TO BE TAKEN IN USE

Use only with adequate ventilation.

Avoid contact with skin and eyes. Avoid breathing vapor and spray mist.

Wash hands after using.

This coating may contain materials classified as nuisance particulates (listed "as Dust" in Section 2) which may be present at hazardous levels only during sanding or abrading of the dried film. If no specific dusts are listed in Section 2, the applicable limits for nuisance dusts are ACGIH TLV 10 mg/m3 (total dust), 3 mg/m3 (respirable fraction), OSHA PEL 15 mg/m3 (total dust), 5 mg/m3 (respirable fraction).

Removal of old paint by sanding, scraping or other means may generate dust or fumes that contain lead. Exposure to lead dust or fumes may cause brain damage or other adverse health effects, especially in children or pregnant women. Controlling exposure to lead or other hazardous substances requires the use of proper protective equipment, such as a properly fitted respirator (NIOSH approved) and proper containment and cleanup. For more information, call the National Lead Information Center at 1-800-424-LEAD (in US) or contact your local health authority.

VENTILATION

Local exhaust preferable. General exhaust acceptable if the exposure to materials in Section 2 is maintained below applicable exposure limits. Refer to OSHA Standards 1910.94, 1910.107, 1910.108.

RESPIRATORY PROTECTION

If personal exposure cannot be controlled below applicable limits by ventilation, wear a properly fitted organic vapor/particulate respirator approved by NIOSH/MSHA for protection against materials in Section 2.

When sanding, wirebrushing, abrading, burning or welding the dried film, wear a particulate respirator approved by NIOSH/MSHA for protection against non-volatile materials in Section 2.

Continued on page 4

PROTECTIVE GLOVES

None required for normal application of aerosol products where minimal skin contact is expected. For long or repeated contact, wear chemical resistant gloves.

EYE PROTECTION

Wear safety spectacles with unperforated sideshields.

OTHER PRECAUTIONS

Intentional misuse by deliberately concentrating and inhaling the contents can be harmful or fatal.

Section 9 -- PHYSICAL AND CHEMICAL PROPERTIES

PRODUCT WEIGHT	6.28 lb/gal	752 g/l
SPECIFIC GRAVITY	0.76	
BOILING POINT	<0 - 325 F	<-18 - 162 C
MELTING POINT	Not Available	
VOLATILE VOLUME	90 %	
EVAPORATION RATE	Faster than ether	
VAPOR DENSITY	Heavier than air	
SOLUBILITY IN WATER	N.A.	
pH	7.0	

VOLATILE ORGANIC COMPOUNDS (VOC Theoretical - As Packaged)

Volatile Weight 58.20% Less Water and Federally Exempt Solvents

Section 10 -- STABILITY AND REACTIVITY

STABILITY -- Stable

CONDITIONS TO AVOID

None known.

INCOMPATIBILITY

None known.

HAZARDOUS DECOMPOSITION PRODUCTS

By fire: Carbon Dioxide, Carbon Monoxide, Oxides of Metals in Section 2

HAZARDOUS POLYMERIZATION

Will not occur

Section 11 -- TOXICOLOGICAL INFORMATION

CHRONIC HEALTH HAZARDS

Ethylbenzene is classified by IARC as possibly carcinogenic to humans (2B) based on inadequate evidence in humans and sufficient evidence in laboratory animals. Lifetime inhalation exposure of rats and mice to high ethylbenzene concentrations resulted in increases in certain types of cancer, including kidney tumors in rats and lung and liver tumors in mice. These effects were not observed in animals exposed to lower concentrations. There is no evidence that ethylbenzene causes cancer in humans.

Prolonged overexposure to solvent ingredients in Section 2 may cause adverse effects to the liver, urinary and reproductive systems.

Rats exposed to titanium dioxide dust at 250 mg./m3 developed lung cancer, however, such exposure levels are not attainable in the workplace.

Reports have associated repeated and prolonged overexposure to solvents with permanent brain and nervous system damage.

TOXICOLOGY DATA

Continued on page 5

CAS No.	Ingredient Name				
74-98-6	Propane				
		LC50	RAT	4HR	Not Available
		LD50	RAT		Not Available
106-97-8	Butane				
		LC50	RAT	4HR	Not Available
		LD50	RAT		Not Available
64742-89-8	V. M. & P. Naphtha				
		LC50	RAT	4HR	Not Available
		LD50	RAT		Not Available
100-41-4	Ethylbenzene				
		LC50	RAT	4HR	Not Available
		LD50	RAT		3500 mg/kg
1330-20-7	Xylene				
		LC50	RAT	4HR	5000 ppm
		LD50	RAT		4300 mg/kg
67-64-1	Acetone				
		LC50	RAT	4HR	Not Available
		LD50	RAT		5800 mg/kg
1332-58-7	Kaolin				
		LC50	RAT	4HR	Not Available
		LD50	RAT		Not Available
13463-67-7	Titanium Dioxide				
		LC50	RAT	4HR	Not Available
		LD50	RAT		Not Available

Section 12 -- ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION

No data available.

Section 13 -- DISPOSAL CONSIDERATIONS

WASTE DISPOSAL METHOD

Waste from this product may be hazardous as defined under the Resource Conservation and Recovery Act (RCRA) 40 CFR 261.

Waste must be tested for ignitability and extractability to determine the applicable EPA hazardous waste numbers.

Do not incinerate. Depressurize container. Dispose of in accordance with Federal, State/Provincial, and Local regulations regarding pollution.

Continued on page 6

Section 14 -- TRANSPORT INFORMATION

US Ground (DOT)
May be classed as Consumer Commodity, ORM-D
UN1950, AEROSOLS, 2.1, LIMITED QUANTITY, (ERG#126)

Canada (TDG)
May be classed as Consumer Commodity, ORM-D
UN1950, AEROSOLS, CLASS 2.1, LIMITED QUANTITY, (ERG#126)

IMO
May be shipped as Limited Quantity
UN1950, AEROSOLS, CLASS 2, LIMITED QUANTITY, EmS F-D, S-U

Section 15 -- REGULATORY INFORMATION

SARA 313 (40 CFR 372.65C) SUPPLIER NOTIFICATION

CAS No.	CHEMICAL/COMPOUND	% by WT	% Element
100-41-4	Ethylbenzene	1	
1330-20-7	Xylene	8	

CALIFORNIA PROPOSITION 65
WARNING: This product contains chemicals known to the State of California to cause cancer and birth defects or other reproductive harm.

TSCA CERTIFICATION
All chemicals in this product are listed, or are exempt from listing, on the TSCA Inventory.

Section 16 -- OTHER INFORMATION

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

The above information pertains to this product as currently formulated, and is based on the information available at this time. Addition of reducers or other additives to this product may substantially alter the composition and hazards of the product. Since conditions of use are outside our control, we make no warranties, express or implied, and assume no liability in connection with any use of this information.

Material Safety Data Sheet

Series:
0710AC 1213222, 0720AC 1213214

MSDS # 0081

NFPA Rating: 1-0-0
HMIS Rating: 1-0-0-B

SECTION I		EMERGENCY TELEPHONE NO.
TRADE NAME (IF NONE, PUT CHEMICAL)	ACE Hardware 50 Year Silicone Sealant – Fed Spec	(918) 825-5744 (24 Hrs.)
MANUFACTURER'S NAME AND TELEPHONE NO.	Red Devil, Incorporated (918) 825-5744	
ADDRESS (Number, Street, City, State, Zip Code)	4175 Webb Street, Pryor, Oklahoma 74361	

SECTION II - HAZARDOUS INGREDIENTS	%	TLV	PEL	UNITS
Silica** [7631-86-9] (as Amorphous silica, total dust)	11	20	20	mg/m3
Dimethylsiloxane, hydroxy-terminated (70131-67-8)	< 60	NE	NE	
Ethyltriacetoxysilane*** (17689-77-9)	2	NE	NE	
Methyltriacetoxysilane*** [4253-34-3]	2	10	10	ppm
Polydimethylsiloxane (63148-62-9)	1 - 5	10	10	ppm
Titanium dioxide** (in white product only) - (as nuisance particulate, total) [13463-67-7]	2	10	15	mg/m3
Non-hazardous ingredients*	>75	NA	NA	

*Unlisted ingredients are not considered hazardous under the OSHA Hazard Communication Standard (29 CFR 1910).
**Inhalation of particulates unlikely due to product's physical state
***Observe limits for acetic acid, formed during curing on exposure to water or humid air. VOC: 3.1%/wt, CARB Compliant: YES, Prop 65: NONE

SECTION III - PHYSICAL DATA

BOILING POINT (°F)	NE	**SPECIFIC GRAVITY (H_20=1)**	1.03
VAPOR PRESSURE (MM Hg.)	NE	**PERCENT VOLATILES BY VOLUME (%)**	1.0 to 1.5 by wt.
VAPOR DENSITY (AIR=1)	>1	**pH**	NE
SOLUBILITY IN WATER	Insoluble	**EVAPORATION RATE**	NA
APPEARANCE AND ODOR	Thick liquid/sealant consistency; slight vinegar odor		

SECTION IV - FIRE AND EXPLOSION HAZARD DATA

FLASH POINT (Method used)	>200°F	**FLAMMABLE LIMITS**	**LEL** NE	**UEL**	NE
EXTINGUISHING MEDIA	Carbon dioxide or foam				
SPECIAL FIRE FIGHTING PROCEDURES	No special procedures required.				
UNUSUAL FIRE AND EXPLOSION HAZARDS	None known				

NA - Not Applicable NE - Not Established UN - Unavailable

SECTION V - HEALTH HAZARD INFORMATION

SYMPTOM/EFFECTS OR OVEREXPOSURE

Eye, nose and throat irritation. Possible skin irritation.

FIRST AID

EYES

Immediately flush eyes with large amounts of water while holding the eyelids open. Get medical attention if irritation persists.

SKIN

Wipe material from skin with cloth or paper towel, then wash exposed area with soap and water. Get medical help if irritation persists.

INHALATION

Move victim to fresh air. Get medical help if irritation persists.

INGESTION

Contact local poison control center or physician IMMEDIATELY!

SECTION VI - REACTIVITY DATA

STABILITY

Normally stable. Avoid extreme heat

INCOMPATIBLE MATERIALS

Moisture will release acetic acid vapor

HAZARDOUS DECOMPOSITION PRODUCTS

Silicon dioxide, Carbon monoxide, Carbon dioxide, traces of formaldehyde

SECTION VII - SPILL OR LEAK PROCEDURES

PROCEDURES

Wear personal protective equipment (See Section VIII). Clean up with absorbent material.

WASTE DISPOSAL METHOD

Dispose of according to Local, State, and Federal regulations.

SECTION VIII - SPECIAL PROTECTION INFORMATION

RESPIRATORY

Not normally required. If TLV is exceeded, or for symptoms of overexposure, wear a NIOSH-approved respirator for organic vapors.

EYEWEAR Wear safety glasses.

CLOTHING/GLOVES

Not normally required; in situations of extended skin contact, neoprene or other chemical resistant gloves are recommended.

VENTILATION

Local exhaust may be necessary under some handling/use conditions.

SECTION IX - SPECIAL PRECAUTIONS

Store in a closed container in dry area. NOTE: Do not wear contact lenses while applying this material, as acetic acid vapor may become trapped under lenses. This product does not contain ingredients listed in Section 313 of SARA Title III and 40 CFR 372.65. This product does not contain carcinogens (at 0.1% or greater) as defined by IARC, NTP or OSHA. PROPER SHIPPING NAME: N/A, HAZARD CLASS: N/A, UN/NA NUMBER: N/A, PACKING GROUP: N/A.

Reviewed By	Larry G. Brandon	VP Technology & General Manager	January 31, 2006
	NAME	**TITLE**	**Date**

Material Safety Data Sheet (MSDS)

MSDS # 0019
Revision 2

Series:
#0408/AC (1213339)
#0445/AC (1213545)
#0407/8A (Ace#1269463)
#0405/8A (Ace#1269455)

NFPA Rating: 1-1-0
HMIS Rating: 1-1-0

SECTION I	EMERGENCY TELEPHONE NO.
TRADE NAME (IF NONE, PUT CHEMICAL) ACE Hardware Tub & Tile Clear - Acrylic	(918) 825-5744 (24 Hrs.)
MANUFACTURER'S NAME AND TELEPHONE NO. Red Devil, Incorporated (918) 825-5744	
ADDRESS (Number, Street, City, State, Zip Code) 4175 Webb Street, Pryor, Oklahoma 74361	

SECTION II - HAZARDOUS INGREDIENTS	%	TLV	PEL	UNITS
PRODUCT CONSISTS OF:				
Aqueous polymer emulsion (mixture)	<95	NE	NE	
Alkyl Ester Alcohol (25265-77-4)	<3.5	UN	UN	
Aqua Ammonia (7664-41-7)	<0.50	25	50	ppm
Non-hazardous ingredients*	<10	NA	NA	
*Unlisted ingredients are not considered hazardous under the OSHA Hazard Communication Standard (29 CFR 1910). VOC: 3.6%/wt. CARB Compliance: YES. Prop 65 Ingredients: NONE				

SECTION III - PHYSICAL DATA			
BOILING POINT (°F)	NE	SPECIFIC GRAVITY (H_2O = 1)	1.03
VAPOR PRESSURE (MM Hg.)	NE	PERCENT VOLATILES BY VOLUME (%)	<40
VAPOR DENSITY (AIR = 1)	>1	pH	8.5 - 9.0
SOLUBILITY IN WATER	Appreciable	EVAPORATION RATE	<0.4 (BuAc = 1)
APPEARANCE AND ODOR	White paste; latex odor (CLEAR when fully cured)		

SECTION IV - FIRE AND EXPLOSION HAZARD DATA					
FLASH POINT (Method used)	>200°F	FLAMMABLE LIMITS	LEL NE	UEL NE	
EXTINGUISHING MEDIA	Water fog, foam, CO2, dry chemical				
SPECIAL FIRE FIGHTING PROCEDURES	Wear self-contained breathing apparatus and protective clothing.				
UNUSUAL FIRE AND EXPLOSION HAZARDS	None				

SECTION V - HEALTH HAZARD INFORMATION

SYMPTOM/EFFECTS OR OVEREXPOSURE

High vapor concentrations may produce headache, dizziness, and nausea. Prolonged or repeated skin contact may lead to drying and irritation. Eye contact may cause irritation.

FIRST AID

EYES

Immediately flush eyes with large amounts of water while holding the eyelids open. Get medical attention if irritation persists.

SKIN

Wipe material from skin with cloth or paper towel, then wash exposed area with soap and water. Get medical help if irritation persists.

INHALATION

Move victim to fresh air and treat symptomatically.

INGESTION

Contact local poison control center or physician IMMEDIATELY!

SECTION VI - REACTIVITY DATA

STABILITY

Normally stable.

INCOMPATIBLE MATERIALS

Strong oxidizers

HAZARDOUS DECOMPOSITION PRODUCTS

Carbon monoxide, carbon dioxide

SECTION VII - SPILL OR LEAK PROCEDURES

PROCEDURES

Wipe up spilled material. Wash area with detergent.

WASTE DISPOSAL METHOD

Dispose of in accordance with Local, State and Federal regulations.

SECTION VIII - SPECIAL PROTECTION INFORMATION

RESPIRATORY

Not normally required. If TLV is exceeded, or for symptoms of overexposure, wear a NIOSH-approved respirator for organic vapor.

EYEWEAR

If potential for eye contact exists, wear chemical goggles.

CLOTHING/GLOVES

Not normally required; in situations of extended skin contact, neoprene or other chemical resistant gloves are recommended.

VENTILATION

Local exhaust may be necessary under some handling/use conditions.

SECTION IX - SPECIAL PRECAUTIONS

Material Safety Data Sheet

12588 (0615AC) – Sq. Tube
13560 (0531/AC) – Gallon
11348 (0532/AC) – _ Pint
11350 (0534/AC) - Quart

MSDS No. 0160 Rev. 2

Emergency Phone No.
(918)825-5744

SECTION 1 – PRODUCT NAME & MANUFACTURER INFORMATION

PRODUCT NAME	ACE Hardware Vinyl Spackling Compound
MANUFACTURER'S NAME & TELEPHONE NUMBER	Red Devil, Inc. 918-825-5744
STREET ADDRESS	4175 Webb Street
CITY / STATE / ZIP	Pryor, Oklahoma 74361

SECTION 2 – COMPOSITION / HAZARDOUS INGREDIENTS	%	TLV	PEL	UNITS
PRODUCT CONSISTS OF:				
Aqueous Vinyl Acrylic Emulsion (mixture)	< 20	NE	NE	
Soda Lime Borosilicate ** (65997-17-3)	< 4	NE	NE	
Calcium Carbonate ** (1317-65-3) (as nuisance particulate, total)	< 70	10	15	mg/m3
Amino Methyl Propanol (AMP-95) (124-68-5)	< 0.10	NE	NE	
Propylene Glycol (57-55-6) ****	< 1	400***	NE	ppm
Non-hazardous ingredients *	<20	NA	NA	

*Unlisted ingredients are not considered hazardous under the OSHA Hazard Communication Standard (29 CFR 1910.1200). ** Inhalation not likely due to products physical state. *** TWA. **** Contains no EG. Calculated VOC: < 1.5/wt, < 25 g/L. CARB Compliance: Yes. Prop 65 Ingredients: Yes (See Section 16)

SECTION 3 – HAZARDS IDENTIFICATION

PRIMARY ROUTE(S) OF ENTRY ☒ Skin Contact ☒ Skin Absorption ☒ Eye Contact ☒ Inhalation ☐ Ingestion

EMERGENCY OVERVIEW	White to slightly off-white paste w/ a slightly sweet odor. May cause eye, skin, nose, throat & respiratory tract irritation.
EFFECTS OF OVEREXPOSURE	May cause eye, skin, nose, throat & respiratory tract irritation. Harmful if swallowed. Inhalation of dust may result in pulmonary & respiratory damages. Prolonged or repeated exposure to dust may cause lung damage. This product may contain small amounts of vinyl acetate, identified by IARC as a potential carcinogen; however there should be minimal risk when used w/ ventilation adequate to keep the atmospheric concentration of vinyl acetate below the recommended exposure limit.
MEDICAL CONDITIONS AGGRAVATED BY EXPOSURE	If dry sanded, asthma & asthma-like conditions may worsen from prolonged or repeated exposure to dust.

SECTION 4 – FIRST AID MEASURES

SKIN CONTACT	Wash w/ soap & water for @ least 15 minutes. Get medical attention if symptoms persist. Remove & wash contaminated clothing.
EYE CONTACT	Immediately flush w/ large quantities of water for @ least 15 minutes until irritation subsides. Get medical attention.
INHALATION	If inhaled, remove to fresh air. If breathing difficult, leave area to obtain fresh air. If breathing remains difficult, get medical attention.
INGESTION	DO NOT INDUCE VOMITING. Get immediate medical attention.

SECTION 5 – FIRE FIGHTING MEASURES

FLAMMABLE	☐ Yes ☒ No		
EXTINGUISHING MEDIA	Carbon Dioxide, Dry Chemical, Foam, Water Fog		
FLASHPOINT (°F) & METHOD	>200F (Seta Closed Cup)	**UPPER EXPLOSIVE LIMIT (% BY VOLUME)**	NE
LOWER EXPLOSIVE LIMIT (% BY VOLUME)	NE	**AUTOIGNITION TEMPERTURE (°F)**	NE
UNUSUAL FIRE & EXPLOSION HAZARDS	None known.		
SPECIAL FIREFIGHTING PROCEDURES	Wear self-contained breathing apparatus pressure demand (NIOSH approved or equivalent) & full protective gear. Use water spray to cool exposed surfaces.		

SECTION 6 – ACCIDENTAL RELEASE MEASURES

PROCEDURES	Wear proper protective equipment (Section 8). Use absorbent material or scrape up dried material & place in approved container.

SECTION 7 – HANDLING & STORAGE

HANDLING PROCEDURES & EQUIPMENT	Keep out of reach of children & pets. Do not take internally. Do not breathe vapors or inhale dusts of this product. Avoid contact w/ skin & eyes. Do not get on clothing. Use w/ adequate ventilation. Ensure fresh air during application & drying by opening windows & doors.
STORAGE REQUIREMENTS	Close container after each use. Store containers away from excessive heat & freezing. Do not store @ temperatures above 120F. Store away from caustics & oxidizers.

SECTION 8 – EXPOSURE CONTROL / PERSONAL PROTECTION

RESPIRATORY	In case of insufficient ventilation, wear suitable respiratory equipment. A NIOSH-approved air purifying respirator w/ organic vapor cartridge may be necessary under circumstances where concentrations are expected to exceed exposure limits. Prevent build-up of dust & vapors by opening windows & doors. Wet sanding is recommended to avoid generation of dust.
EYEWEAR	Goggles or safety glasses w/ side shields.
CLOTHING / GLOVES	Gloves recommended for prolonged or repeated skin contact.
HYGENIC PRACTICES	Remove & wash contaminated clothing before re-use. Wash hands before breaks & @ end of workday.

SECTION 9 – PHYSICAL AND CHEMICAL PROPERTIES

PHYSICAL STATE	Paste	**ODOR & APPEARANCE**	Slight sweet. White/slightly off-white paste.
SPECIFIC GRAVITY	Approximately 1.75 to 2.0	**VAPOR DENSITY (AIR=1)**	NE
EVAPORATION RATE	NE	**BOILING RANGE (°F)**	NE
pH	Approximately 7.5 to 9.5	**SOLUBILITY IN WATER**	NE
VAPOR PRESSURE (MM Hg)	NE	**%/WT VOLATILE (TNV)**	18 to 22%

SECTION 10 – STABILITY AND REACTIVITY

STABILITY	☒ Yes ☐ No	Stable under normal conditions.
INCOMPATABILITY	☒ Yes ☐ No	Incompatible w/ strong bases & strong oxidizing agents.
CONDITIONS TO AVOID	Excessive heat & freezing.	

HAZARDOUS POLYMERIZATION/HAZARDOUS DECOMPOSITION PRODUCTS	Hazardous polymerization will not occur under normal conditions. Normal decomposition products, ie: COx, NOx.

SECTION 11 – TOXICOLOGICAL INFORMATION / CARCINOGENICITY

ACGIH	Silica, crystalline (14808-60-7), present in Calcium Carbonate filler is a suspected human carcinogen. Vinyl acetate (108-05-4), present in base emulsion is a confirmed animal carcinogen w/unknown relevance to humans.
OSHA	NE
IARC	Silica, crystalline (14808-60-7), present in Calcium Carbonate filler identified as a human carcinogen. Vinyl acetate (108-05-4), present in base emulsion identified as a possible carcinogen.
NTP	Silica, crystalline (14808-60-7), present in Calcium Carbonate filler identified as a Known carcinogen.
DATA WITH POSSIBLE RELEVANCE TO HUMANS	Product may contain trace amounts of vinyl acetate, identified by IARC as a potential carcinogen. There is presently no evidence that it has caused cancer in humans.

SECTION 12 – ECOLOGICAL INFORMATION

AQUATIC TOXICITY	Ecological injuries are not known or expected under normal use.

SECTION 13 – DISPOSAL CONSIDERATIONS

WASTE DISPOSAL	Dispose of material in accordance w/ Federal, State & Local regulations.
EPA WASTE CODE IF DISCARDED (40CFR Sec.261)	None.

SECTION 14 – TRANSPORT INFORMATION

SPECIAL SHIPPING INFORMATION	Product not regulated by DOT.

SECTION 15 – REGULATORY INFORMATION

CERCLA – SARA HAZARD CATEGORY	SARA 311 & 312: Immediate health hazard, Chronic health hazard.	**U.S. STATE REGS**	See Section 16.
SARA 313	None.	**TSCA**	All ingredients either on TSCA Inventory or exempt

SECTION 16 – OTHER INFORMATION / SPECIAL PRECAUTIONS / LEGEND

Prop 65 Ingredients (Known to State of California to cause cancer): Silica, crystalline (14808-60-7). NJ Right-to-Know: (Top 5 Ingredients): Vinyl Acrylic Emulsion (mixture), Water (7732-18-5), Petroleum Distillate (64742-88-7), Soda Lime Borosilicate (Glass Bubbles) (65997-17-3), Propylene Glycol (57-55-6) Pennsylvania Right-to-Know (Non-Haz @ >3%): Water (7732-18-5). Ingredients Known to State of California to cause birth defects or reproductive harm: None. Canadian WHMIS Class: Not regulated. HMIS Ratings: Health: 1, Flammability: 1, Reactivity: 0, Personal Protection: X.

LEGEND: NA – Not Applicable, NE – Not Established, UN – Unavailable, VOC – Volatile Organic Compound, PEL – Permissible Exposure Limit, TLV – Threshold Limit Value, STEL – Short Term Exposure Limit, MSDS – Material Safety Data Sheet, ACGIH – American Conference of Governmental Industrial Hygienists, SARA – Superfund Amendments & Reauthorization Act of 1986, OSHA – Occupational Safety & Health Administration, HMIS – Hazardous Materials Identification System, NTP – National Toxicology Program, CEIL – Ceiling Exposure Limit, CASRN (CAS Number) – Chemical Abstracts Service Registry Number, TSCA – Toxic Substances Control Act

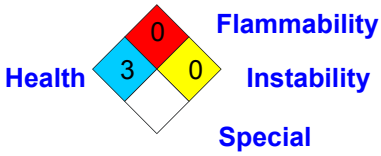
Reviewed By: Larry G. Brandon (NAME) VP Technology & General Manager (TITLE) May 14, 2008 (DATE)

alpha

Material Safety Data Sheet

Material Safety Data Sheet

Emergency phone: Alpha Chemtrec #5591
US & Canada: 800 424-9300
Mexico: 01 800 022 1400, (55) 5559 1588
Brasil: 55 11 4353 2700



Health	3
Flammability	0
Physical hazards	0
Personal protection	

1 . Product and company identification

Product name : **Solder Paste Flux**
Product code : 119653
Material uses : Specialty assembly materials for the electronics industries
Manufacturer :

Alpha
109 Corporate Blvd.
South Plainfield, NJ 07080
Toll Free: (800) 367-5460
Main Phone: (908) 791-3000
Fax: (908) 791-3090
www.alpha.alent.com

Cookson Electronics Mexico, S.A. de C.V
Avenida Nafta No. 800,
Parque Industrial Stiva Aeropuerto
Apodaca, Nuevo León, C.P. 66600
Mexico
www.alpha.alent.com
Customer Service: (814) 946-1611

Cookson Electronics Brasil Ltda
Av.: José Odorizzi, No. 650
São Bernardo do Campo
São Paulo, CEP098100 000
Brasil
Phone: 55 11 4353 2500
Fax: 55 11 4353 2521
www.alpha.alent.com

Validation date : **6/3/2013.** **Supersedes Date** : 5/23/2013.
Prepared by : T. Valverde
(203)-799-4940

2. Hazards identification

Physical state : Solid.
Odor : None.
OSHA/HCS status : This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).
Emergency overview : DANGER!
Toxic if swallowed. Corrosive to the eyes and digestive tract. Causes burns. Severely irritating to the skin and respiratory system. Do not ingest. Do not get in eyes or on skin or clothing. Contains material that may cause target organ damage, based on animal data. Contains material which may cause heritable genetic effects, based on animal data. Use only with adequate ventilation. Keep container tightly closed and sealed until ready for use. Wash thoroughly after handling.
Routes of entry : Dermal contact. Eye contact. Inhalation. Ingestion.

Potential acute health effects

Inhalation : Severely irritating to the respiratory system. May cause burns to mouth, throat and stomach.
Ingestion : Toxic if swallowed. Corrosive to the digestive tract. May cause burns to mouth, throat and stomach. Can cause target organ damage. Adverse symptoms may include the following: nausea or vomiting stomach pains Ingestion may cause gastrointestinal irritation and diarrhea.

Continued on next page

2. Hazards identification

Skin : Severely irritating to the skin. blistering may occur Adverse symptoms may include the following: pain or irritation redness

Eyes : Corrosive to eyes. Causes burns. Direct contact with the eyes can cause irreversible damage, including blindness.

Potential chronic health effects

Chronic effects : Contains material that can cause target organ damage. Adverse symptoms may include the following:
Zinc. Salt: dermatitis, ulcerations, metal fume fever, pulmonary edema, chemical pneumonitis, mental confusion or disorientation, drowsiness/fatigue, difficulty swallowing, blood pressure elevation, convulsions, circulatory collapse.

Target organs : Contains material which may cause damage to the following organs: kidneys, lungs, liver, cardiovascular system, upper respiratory tract, skin, eyes, pancreas.

Carcinogenicity : Not classified or listed by IARC, NTP, OSHA, EU and ACGIH.

Mutagenicity : Contains material which may cause heritable genetic effects, based on animal data.

Teratogenicity : Not classified.

Developmental effects : Not classified.

Fertility effects : Not classified.

California Prop. 65 : **WARNING:** This product contains less than 0.1% of a chemical known to the State of California to cause cancer.
WARNING: This product contains less than 1% of a chemical known to the State of California to cause birth defects or other reproductive harm.

Medical conditions aggravated by over-exposure : Pre-existing digestive disorders and disorders involving any other target organs mentioned in this MSDS as being at risk may be aggravated by over-exposure to this product.

3. Composition/information on ingredients

Name	CAS number	% by weight
Zinc. Salt	-	20-30

Any ingredient not listed in Section 3 is non-regulated or present in the product in concentrations below legal disclosure limits.

4 . First aid measures

Eye contact : Get medical attention immediately. Chemical burns must be treated promptly by a physician. Check for and remove any contact lenses. Immediately flush eyes with running water for at least 60 minutes, keeping eyelids open. Provide a readily-accessible eyewash facility and quick-drench safety shower.

Skin contact : In case of contact, immediately flush skin with plenty of water for at least 30 minutes while removing contaminated clothing and shoes. Provide a readily-accessible eyewash facility and quick-drench safety shower. Get medical attention. Wash contaminated clothing before reuse. Clean shoes thoroughly before reuse.

Inhalation : Get medical attention immediately. Chemical burns must be treated promptly by a physician. Move exposed person to fresh air. If it is suspected that mists are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. Keep person warm and at rest. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

Continued on next page

4 . First aid measures

Ingestion : Get medical attention immediately. Chemical burns must be treated promptly by a physician. Wash out mouth with water. Remove dentures if any. Move exposed person to fresh air. Keep person warm and at rest. Do not induce vomiting unless directed to do so by medical personnel. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel.

Protection of first-aiders : No action shall be taken involving any personal risk or without suitable training. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wear suitable protective clothing, gloves and eye/face protection. If it is suspected that mists are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

5 . Fire-fighting measures

Flammability of the product : No specific fire or explosion hazard.

Extinguishing media

Suitable : Use an extinguishing agent suitable for the surrounding fire.

Not suitable : None known.

Special exposure hazards : Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.

Hazardous combustion products : halogenated compounds
metal oxide/oxides

Special remarks on fire hazards : Non-flammable in the presence of the following materials or conditions: open flames, sparks and static discharge and heat.

Special protective equipment for fire-fighters : Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

6 . Accidental release measures

Personal precautions : No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment (see section 8).

Environmental precautions : Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

Large spill : Move containers from spill area. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Vacuum or sweep up material and place in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor. Note: see section 1 for emergency contact information and section 13 for waste disposal.

Small spill : Move containers from spill area. Vacuum or sweep up material and place in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor.

Continued on next page

7 . Handling and storage

Handling : Put on appropriate personal protective equipment (see section 8). Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Do not get in eyes or on skin or clothing. Provide a readily-accessible eyewash facility and quick-drench safety shower. Do not ingest. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Empty containers retain product residue and can be hazardous. Do not reuse container.

Storage : Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination. Provide a readily-accessible eyewash facility and quick-drench safety shower.

Keep container tightly closed. Keep container in a cool, well-ventilated area.

8 . Exposure controls/personal protection

Product name	Exposure limits
Zinc. Salt	**ACGIH TLV (United States, 3/2012).** STEL: 2 mg/m³ 15 minute(s). Form: Fume TWA: 1 mg/m³ 8 hour(s). Form: Fume **NIOSH REL (United States, 6/2009).** STEL: 2 mg/m³ 15 minute(s). Form: Fume TWA: 1 mg/m³ 10 hour(s). Form: Fume **OSHA PEL (United States, 6/2010).** TWA: 1 mg/m³ 8 hour(s). Form: Fume **OSHA PEL 1989 (United States, 3/1989).** STEL: 2 mg/m³ 15 minute(s). Form: Fume TWA: 1 mg/m³ 8 hour(s). Form: Fume

Consult local authorities for acceptable exposure limits.

Recommended monitoring procedures : If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment.

Engineering measures : Use only with adequate ventilation. If user operations generate dust, fumes, gas, vapor or mist, use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits. Provide a readily-accessible eyewash facility and quick-drench safety shower. Processes should be designed to minimize airborne and skin exposure to hazardous substances.

Hygiene measures : Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location. Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Take off immediately all contaminated clothing. Contaminated work clothing should not be allowed out of the workplace.

Personal protection

Respiratory : Use a properly fitted, air-purifying or air-fed respirator complying with NIOSH if a risk assessment indicates this is necessary. 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. Risk assessments should be completed by a Certified Industrial Hygienst.

Continued on next page

8 . Exposure controls/personal protection

Hands : Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. The user must check that the final choice of type of glove selected for handling this product is the most appropriate and takes into account the particular conditions of use, as included in the user's risk assessment. Risk assessments should be completed by a Certified Industrial Hygienst.

Eyes : Avoid contact with eyes. Safety eyewear should be used when there is a likelihood of exposure. Direct contact with the eyes can cause irreversible damage, including blindness.

Skin : Avoid contact with skin and clothing. Wear suitable protective clothing. Body garments used should be based upon the task being performed (e.g., lab coat, chemical resistant protective suit, sleevelets, synthetic apron, gauntlets) to avoid exposed skin surfaces. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

Environmental exposure controls : Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

9 . Physical and chemical properties

Physical state : Solid.

Flash point : Not available.

Auto-ignition temperature : Not available.

Flammable limits : Not available.

Color : Gray.

Odor : None.

pH : Not available.

Boiling/condensation point : Not available.

Melting/freezing point : Not available.

Vapor pressure : Not available.

Vapor density : Not available.

Odor threshold : Not available.

Evaporation rate : Not available.

VOC : 0.02 g/l

Solubility : Easily soluble in the following materials: cold water and hot water.

10 . Stability and reactivity

Stability : The product is stable.

Conditions to avoid : No specific data.

Incompatibility with various substances : Reactive with oxidizing agents, reducing agents, metals, acids, alkalis. Chlorine., peroxides

Hazardous decomposition products : Under normal conditions of storage and use, hazardous decomposition products should not be produced.

Other Hazardous decomposition products : Toxic fumes

Hazardous polymerization : Under normal conditions of storage and use, hazardous polymerization will not occur.

Continued on next page

11 . Toxicological information

Acute toxicity

Product/ingredient name	Result	Species	Dose	Exposure
Zinc. Salt	LD50 Oral LD50 Oral	Mouse Rat	329 mg/kg 350 mg/kg	- -

Mutagenicity

Product/ingredient name	Test	Experiment	Dose	Exposure	Result
Zinc. Salt	- -	Bacteria Mammalian-Animal	- -	- -	Positive Positive

Alpha has not conducted specific studies on the toxicity of this product.

12 . Ecological information

CURRENTLY UNDER TECHNICAL REVIEW

13 . Disposal considerations

Waste disposal : The generation of waste should be avoided or minimized wherever possible. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe way. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

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

Refer to Section 7: HANDLING AND STORAGE and Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION for additional handling information and protection of employees.

14 . Transport information

Regulatory information	UN number	Proper shipping name	Classes	PG* Label	Additional information
DOT Classification	Not regulated.	-	-	-	

PG* : Packing group

15 . Regulatory information

United States

HCS Classification : Toxic material
Corrosive material
Target organ effects

U.S. Federal regulations : **TSCA 5(a)2 proposed significant new use rules**: No products were found.
TSCA 5(a)2 final significant new use rules: No products were found.
TSCA 12(b) one-time export: No products were found.
TSCA 12(b) annual export notification: No products were found.

United States inventory (TSCA 8b) : All components are listed or exempted.

SARA 313

Continued on next page

15 . Regulatory information

	Product name	CAS number	Concentration
Form R - Reporting requirements	Zinc. Salt	-	-
Supplier notification	Zinc. Salt	-	-

SARA 302/304/311/312 extremely hazardous substances: No products were found.

California Prop. 65

WARNING: This product contains less than 0.1% of a chemical known to the State of California to cause cancer.
WARNING: This product contains less than 1% of a chemical known to the State of California to cause birth defects or other reproductive harm.

Canada

WHMIS (Canada) : Class E: Corrosive material
Canada inventory : All components are listed or exempted.

International lists

China inventory (IECSC) : All components are listed or exempted.
Australia inventory (AICS) : All components are listed or exempted.
Korea inventory (KECI) : All components are listed or exempted.
Philippines inventory (PICCS) : All components are listed or exempted.

16 . Other information

Definition of Terms

ACGIH	American Conference of Governmental Industrial Hygienists
Ceiling	Maximum exposure limit defined by OSHA
CAS	Chemical Abstract Service
IARC	International Agency for Research on Cancer
NIOSH	National Institute for Occupational Safety and Health
NTP	National Toxicology Program
OSHA	Occupational Safety and Health Administration
PEL	Permissible Exposure Limit
REL	Recommended Exposure Limit
RTK	Right to Know
SARA	Superfund Amendments and Reauthorization Act
STEL	Short Term Exposure Limit
TLV	ACGIH Threshold Limit Value
TLV-C	ACGIH Threshold Limit Value, Ceiling
TRADE SECRET	Claimed as allowed under 29CFR§1910.1200
TSCA	Toxic Substances Control Act
PPE	Personal Protection Equipment
CEPA	Canadian Environmental Protection Act
DSL	Domestic Substance List
NDSL	Non-Domestic Substance List
NSN	New Substance Notification Rules

Disclaimer

The information contained herein is based on data considered accurate. However, no warranty is expressed of implied regarding the accuracy of these data or the results to be obtained from the use thereof. Additionally, Cookson Electronics assumes no responsibility for injury to the vendee or third persons proximately caused by the material even if reasonable safety procedures are followed. Furthermore, vendee assumes the risk in his use of the material.

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Continued on next page

16 . Other information

alpha®

SIGMA-ALDRICH

MATERIAL SAFETY DATA SHEET

Date Printed: 04/20/2004
Date Updated: 03/07/2004
Version 1.2

Section 1 - Product and Company Information

Product Name	STARCH POTATO
Product Number	S4251
Brand	SIGMA
Company	Sigma-Aldrich
Street Address	3050 Spruce Street
City, State, Zip, Country	SAINT LOUIS MO 63103 US
Technical Phone:	314 771 5765
Emergency Phone:	414 273 3850 Ext. 5996
Fax:	800 325 5052

Section 2 - Composition/Information on Ingredient

Substance Name	CAS #	SARA 313
STARCH, SOLUBLE	9005-25-8	No

Synonyms: Amaizo W 13 * Amylomaize VII * Amylum * Aquapel (polysaccharide) * ARGO brand corn starch * Arrowroot starch * Claro 5591 * Clearjel * CPC 3005 * CPC 6448 * Farinex 100 * Galactasol A * Genvis * HRW 13 * Keestar * Maizena * Maranta * Melojel * Meluna * OK PRE-GEL * Penford Gum 380 * Remyline Ac * RiceICE starch * Sorghum gum * Staramic 747 * Starch * alpha-Starch * Starch (ACGIH:OSHA) * Starch, corn * Sta-RX 1500 * Tapioca starch * Tapon * Trogum * W-Gum * W-13 Stabilizer

RTECS Number: GM5090000

Section 3 - Hazards Identification

HMIS RATING
- HEALTH: 0
- FLAMMABILITY: 0
- REACTIVITY: 0

NFPA RATING
- HEALTH: 0
- FLAMMABILITY: 0
- REACTIVITY: 0

For additional information on toxicity, please refer to Section 11.

Section 4 - First Aid Measures

ORAL EXPOSURE

If swallowed, wash out mouth with water provided person is conscious. Call a physician.

INHALATION EXPOSURE

If inhaled, remove to fresh air. If breathing becomes difficult, call a physician.

DERMAL EXPOSURE
In case of contact, immediately wash skin with soap and copious amounts of water.

EYE EXPOSURE
In case of contact with eyes, flush with copious amounts of water for at least 15 minutes. Assure adequate flushing by separating the eyelids with fingers. Call a physician.

Section 5 - Fire Fighting Measures

FLASH POINT
N/A

AUTOIGNITION TEMP
N/A

FLAMMABILITY
N/A

EXTINGUISHING MEDIA
Suitable: Water spray. Carbon dioxide, dry chemical powder, or appropriate foam.

FIREFIGHTING
Protective Equipment: Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and eyes.
Specific Hazard(s): Emits toxic fumes under fire conditions.

Section 6 - Accidental Release Measures

PROCEDURE(S) OF PERSONAL PRECAUTION(S)
Exercise appropriate precautions to minimize direct contact with skin or eyes and prevent inhalation of dust.

METHODS FOR CLEANING UP
Sweep up, place in a bag and hold for waste disposal. Avoid raising dust. Ventilate area and wash spill site after material pickup is complete.

Section 7 - Handling and Storage

HANDLING
User Exposure: Avoid inhalation. Avoid contact with eyes, skin, and clothing. Avoid prolonged or repeated exposure.

STORAGE
Suitable: Keep tightly closed.

Section 8 - Exposure Controls / PPE

ENGINEERING CONTROLS
Safety shower and eye bath. Mechanical exhaust required.

PERSONAL PROTECTIVE EQUIPMENT
Respiratory: Wear dust mask.
Hand: Protective gloves.
Eye: Chemical safety goggles.

GENERAL HYGIENE MEASURES
Wash thoroughly after handling.

EXPOSURE LIMITS, RTECS

Country	Source	Type	Value
USA	ACGIH	TWA	10 MG/M3
USA	MSHA Standard		
Remarks: Nuisance Particulates.			
USA	OSHA.	PEL	8H TWA 15 MG/M3, TOTAL DUST
New Zealand OEL			
Remarks: check ACGIH TLV			
USA	NIOSH	TWA	5 MG/M3

Section 9 - Physical/Chemical Properties

Appearance — Physical State: Solid

Property	Value	At Temperature or Pressure
Molecular Weight	N/A	
pH	N/A	
BP/BP Range	N/A	
MP/MP Range	N/A	
Freezing Point	N/A	
Vapor Pressure	N/A	
Vapor Density	N/A	
Saturated Vapor Conc.	N/A	
SG/Density	N/A	
Bulk Density	N/A	
Odor Threshold	N/A	
Volatile%	N/A	
VOC Content	N/A	
Water Content	N/A	
Solvent Content	N/A	
Evaporation Rate	N/A	
Viscosity	N/A	
Surface Tension	N/A	
Partition Coefficient	N/A	
Decomposition Temp.	N/A	
Flash Point	N/A	
Explosion Limits	N/A	
Flammability	N/A	
Autoignition Temp	N/A	
Refractive Index	N/A	
Optical Rotation	N/A	
Miscellaneous Data	N/A	
Solubility	N/A	

N/A = not available

Section 10 - Stability and Reactivity

STABILITY
Stable: Stable.
Materials to Avoid: Strong oxidizing agents.

HAZARDOUS DECOMPOSITION PRODUCTS
Hazardous Decomposition Products: Carbon monoxide, Carbon dioxide.

HAZARDOUS POLYMERIZATION
Hazardous Polymerization: Will not occur

Section 11 - Toxicological Information

ROUTE OF EXPOSURE
Skin Contact: May cause skin irritation.
Skin Absorption: May be harmful if absorbed through the skin.
Eye Contact: May cause eye irritation.
Inhalation: May be harmful if inhaled. Material may be irritating to mucous membranes and upper respiratory tract.
Ingestion: May be harmful if swallowed.

SIGNS AND SYMPTOMS OF EXPOSURE
The nuisance dust may be an allergen and a mild irritant. To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.

TOXICITY DATA

Intraperitoneal
Mouse
6600 MG/KG
LD50

IRRITATION DATA

Skin
Human
0.3 mg
3D
I
Remarks: Mild irritation effect

ACGIH CARCINOGEN LIST

Rating: A4

Section 12 - Ecological Information

Section 13 - Disposal Considerations

APPROPRIATE METHOD OF DISPOSAL OF SUBSTANCE OR PREPARATION
Contact a licensed professional waste disposal service to dispose of this material. Dissolve or mix the material with a combustible solvent and burn in a chemical incinerator equipped with an afterburner and scrubber. Observe all federal, state, and local environmental regulations.

Section 14 - Transport Information

DOT
Proper Shipping Name: None
Non-Hazardous for Transport: This substance is considered to be non-hazardous for transport.

IATA
Non-Hazardous for Air Transport: Non-hazardous for air transport.

Section 15 - Regulatory Information

UNITED STATES REGULATORY INFORMATION
SARA LISTED: No

TSCA INVENTORY ITEM: Yes

Section 16 - Other Information

DISCLAIMER

For R&D use only. Not for drug, household or other uses.

WARRANTY

The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. Sigma-Aldrich Inc., shall not be held liable for any damage resulting from handling or from contact with the above product. See reverse side of invoice or packing slip for additional terms and conditions of sale.

CHURCH & DWIGHT CO., INC.

CONSUMER PRODUCTS • SPECIALTY PRODUCTS

MATERIAL SAFETY DATA SHEET

1. PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME

SODIUM BICARBONATE

24 HOUR EMERGENCY TELEPHONE:
CHEMTREC 1-800-424-9300 (USA)
+001-703-527-3887(INT"L)
Medical Emergency Phone:
1-888-234-1828 (USA)
+001-952-853-1925(INT'L)

Manufacturer's Name and Address:
Church & Dwight Co., Inc.
469 N. Harrison Street
Princeton, NJ. 08543-5297
USA

Customer Information:
1-800-524-1328 (USA)
+001-609-497-7220 (INT'L)

Product Use: Food ingredient, Pharmaceutical, Water Treatment, General Industrial Use
Chemical Name: Sodium bicarbonate
Chemical Formula: NaHCO3
Synonyms/Common Names: Baking Soda

2. HAZARDS IDENTIFICATION

EMERGENCY OVERVIEW

White crystalline powder; no odor.
Not a fire hazard.
No significant health or environmental effects associated with this material.

HMIS Rating

Health	0
Fire	0
Reactivity	0

Potential Health Effects

EYE: Not an eye irritant.
SKIN CONTACT: Not a skin irritant.

INGESTION: Material is practically non-toxic. Small amounts (1-2 tablespoonfuls) swallowed during normal handling operations are not likely to cause injury as long as the stomach is not overly full; swallowing larger amounts may cause injury (see Note in Section IV).
INHALATION: None known.
SUBCHRONIC EFFECTS/CARCINOGENICITY: Based on published studies on its effects in animals and humans, sodium bicarbonate is not teratogenic or genotoxic. Only known subchronic effect is that of a marked systemic alkalosis. Not classified as carcinogenic by NTP, IARC, OSHA, ACGIH or NIOSH.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical Ingredient (% by Weight)		CAS Number
Sodium Bicarbonate	100%	144-55-8

Not hazardous under OSHA Standard 29 CFR 1910.1200.
Not a WHMIS controlled substance.

4. FIRST AID MEASURES

EYES: Check for and remove contacts. Flood eyes with clean flowing water, low pressure and luke warm (not hot) if possible, occasionally lifting eyelids.

INGESTION: If large amounts of this material are swallowed, do not induce vomiting. Administer water if person is conscious. Never give anything by mouth to an unconscious person.

NOTE TO PHYSICIAN: Large doses may produce systemic alkalosis and expansion in extracellular fluid volume with edema.

5. FIRE FIGHTING MEASURES

FLAMMABLE PROPERTIES
FLASHPOINT: Not combustible
METHOD USED: Not applicable

FLAMMABLE LIMITS
LFL: Not applicable
UFL: Not applicable

EXTINGUISHING MEDIA: Non-combustible material. Use extinguishing media appropriate for surrounding fire.
FIRE-FIGHTING INSTRUCTIONS: Carbon Dioxide may be generated making necessary the use of a self-contained breathing apparatus (SCBA) and full protective equipment (Bunker Gear). Carbon dioxide is an asphyxiant at levels over 5% w/w. Sodium oxide, another thermal decomposition product existing at temperatures above 1564°F is a respiratory, eye, and skin irritant. Avoid inhalation, eye and skin contact with sodium oxide dusts.
UNUSUAL FIRE AND EXPLOSION HAZARDS: None known.

6. ACCIDENTAL RELEASE MEASURES

Scoop up into dry, clean containers. Wash away small uncontaminated amounts of residue with water.

7. HANDLING AND STORAGE

Store in cool, dry areas and away from incompatible substances (see Section 10).
Sodium Bicarbonate reacts with acids to yield carbon dioxide gas which can accumulate in confined spaces. Do not enter confined spaces until they have been well ventilated and carbon dioxide and oxygen levels have been determined to be safe.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

AIRBORNE EXPOSURE LIMITS: None established.
RESPIRATORY PROTECTION: Dust mask required if total dust level exceeds 10 mg/m^3.
PROTECTIVE GLOVES: General purpose for handling dry product. Impervious gloves when working with solutions.
EYE PROTECTION: Safety glasses when handling bulk material or when dusts are generated.
OTHER PROTECTIVE CLOTHING OR EQUIPMENT: Full cover clothing. Apron where splashing may occur when working with solutions.

9. PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE: White crystalline powder.
ODOR: None.
PHYSICAL STATE: Solid
pH AS IS: Not Applicable
pH (1% SOLN. w/v): 8.2
VAPOR PRESSURE: Not applicable.
VAPOR DENSITY: Not applicable.
BOILING POINT: Not applicable.
FREEZING/MELTING POINT: Not applicable.
SOLUBILITY IN WATER: 8.6 g/100 ml @ 20°C.
BULK DENSITY (g/cc): 62 lb/Ft^3
% VOCs: Not applicable.
VOLATILE ORGANIC COMPOUNDS: Not applicable.
MOLECULAR WEIGHT: 84.02

10. STABILITY AND REACTIVITY

CHEMICAL STABILITY: Stable.

CONDITIONS TO AVOID: Temperatures above 65°C (150°F).
INCOMPATIBILITY WITH OTHER MATERIALS: Reacts with acids to yield carbon dioxide. May also yield free caustic in presence of lime dust (CaO) and moisture (i.e., water, perspiration). Dangerous reaction with monoammonium phosphate or a sodium-potassium alloy may occur.

HAZARDOUS DECOMPOSITION PRODUCTS: Heating above 100°C may cause dangerous levels of carbon dioxide gas to be present in confined spaces. Yields sodium oxide if exposed to temperatures above 850°C. Avoid inhalation, eye and skin contact with sodium oxide.
HAZARDOUS POLYMERIZATION: Not applicable.

11. TOXICOLOGICAL INFORMATION

EYE EFFECTS: The material was minimally irritating to unwashed eyes and practically non-irritating to washed eyes (rabbits).
SKIN EFFECTS: Not a skin irritant or dermally toxic. Not a contact sensitizer.
ACUTE ORAL EFFECTS: Acute Oral-rat LD_{50} = 7.3 g/kg.
ACUTE INHALATION: LC_{50} (rat) > 4.74 mg/l.

12. ECOLOGICAL INFORMATION

AQUATIC TOXICITY:

Daphnids:	EC_{50} = 4100 mg/l.
Bluegill:	LC_{50} = 7100 mg/l.
Rainbow Trout:	LC_{50} = 7700 mg/l.

PERSISTENCE: This product is not expected to persist in the environment.
BIOACCUMULATION: This product is not expected to bioaccumulate.
BIODEGRADATION: This material is inorganic and not subject to biodegradation.

13. DISPOSAL CONSIDERATIONS

Bury in a secured landfill in accordance with all local, state and federal environmental regulations. Empty containers may be incinerated or discarded as general trash.

14. TRANSPORTATION INFORMATION

D.O.T. SHIPPING NAME: Not regulated

15. REGULATORY INFORMATION

CLEAN AIR ACT SECTION 611: Material neither contains nor is it manufactured with ozone depleting substances (ODS).

FEDERAL WATER POLLUTION CONTROL ACT (40 CFR 401.15): Material contains no intentionally added or detectable (contaminant) levels of EPA priority toxic pollutants.

FOOD AND DRUG ADMINISTRATION: Generally Recognized As Safe (GRAS) direct food additive (21 CFR 184.1736).

US DEPARTMENT OF AGRICULTURE: List of Proprietary Substances - Permitted Use Codes 3A, J1, A1, G1, and L1.
CERCLA REPORTABLE QUANTITY: None
OSHA: Not hazardous under 29 CFR 1910.1200
RCRA: Not a hazardous material or a hazardous waste by listing or characteristic.
SARA TITLE III:

Section 302, Extremely Hazardous Substances: None
Section 311/312, Hazardous Categories: Non-hazardous
Section 313, Toxic Chemicals: None

Sodium Bicarbonate is reported in the EPA TSCA Inventory List.

Contains no VOCs.

NATIONAL STOCKING NUMBER: 6810002646618, Contract No. DLA 40086C1831
NSF STANDARD 60: Corrosion and Scale Control in Potable Water. Max use 200 mg/l.
CANADA-DSL
EUROPEAN INVENTORY (EINECS): 205-633-8
JAPANESE INVENTORY (MITI): 1-164
AUSTRALIAN INVENTORY (AICS): Carbonic acid, monosodium salt.
KOREA- yes
PHILLIPINE- yes

16. OTHER INFORMATION

SUPERSEDES DATE: 07/12/07 REASON FOR REVISION: New ANSI Revision.

For additional non-emergency health, safety and environmental information telephone 609.279.7705 or write to:

Church & Dwight Co. Inc.
Product Stewardship
469 North Harrison Street
Princeton, New Jersey 08543

CAL-WESTERN PAINTS -- ARTISTIC ACRYLIC PAINT -- 8010-00F032335

========== Product Identification ==========

Product ID:ARTISTIC ACRYLIC PAINT
MSDS Date:10/21/1992
FSC:8010
NIIN:00F032335
MSDS Number: BSZHM
=== Responsible Party ===
Company Name:CAL-WESTERN PAINTS
Address:11748 SLAUSON AVE
City:SANTA FE SPRINGS
State:CA
ZIP:90670
Country:US
Info Phone Num:310-693-0872
Emergency Phone Num:310-693-0872
CAGE:CALWE
=== Contractor Identification ===
Company Name:CAL-WESTERN PAINTS
Address:11748 SLAUSON AVE
Box:City:SANTA FE SPRINGS
State:CA
ZIP:90670
Country:US
Phone:310-693-0872
CAGE:CALWE

========== Composition/Information on Ingredients ==========

Ingred Name:WATER
CAS:7732-18-5
RTECS #:ZC0110000
Fraction by Wt: 40-55%

Ingred Name:RESIN EMULSION
Fraction by Wt: 20-30%

Ingred Name:NATURAL AGGREGATES
Fraction by Wt: 10-25%

Ingred Name:PIGMENT
Fraction by Wt: 10-25%
Other REC Limits:10 MG/CUM (DUST)
RTECS #:9999999WG
Fraction by Wt: 10.51%

========== Hazards Identification ==========

Routes of Entry: Inhalation:YES Skin:YES Ingestion:NO

Reports of Carcinogenicity:NTP:NO IARC:NO OSHA:NO
Health Hazards Acute and Chronic:INHALATION: MILD RESPIRATORY IRRITATION. EYES: IRRITATION. SKIN: IRRITATION.
Explanation of Carcinogenicity:NONE
Effects of Overexposure:INHALATION: HEADACHES, NAUSEA. SKIN: REDDENING
Medical Cond Aggravated by Exposure:PRE-EXISTING EYES, SKIN, ALLERGY, AND/OR RESPIRATORY DISORDERS.

========== First Aid Measures ==========

First Aid:INHALATION: REMOVE FROM EXPOSURE, PROVIDE PLENTY OF FRESH AIR. EYES: FLUSH IMMEDIATELY W/PLENTY OF WATER FOR AT LEAST 15 MINUTES, LIFTING UPPER & LOWER EYELIDS OCCASIONALLY. SKIN: REMOVE W/SOAP & WATE R. SUPPLY COPIOUS AMOUNTS OF FRESH WATER THE SKIN AREAS TO RINSE MATERIAL AWAY. INGESTION: CLEAR PASSAGE WAY, INDCUE VOMITING BY GIVING ONE/TWO GLASSES OF WATER & STICKING FINGER DOWN THROAT.

========== Fire Fighting Measures ==========

Flash Point:212 F
Extinguishing Media:WATER SPRAY, CO2, DRY CHEMICAL.
Fire Fighting Procedures:IF WATER IS USED, FOG NOZZLES ARE PREFERABLE. USE WATER TO COOL CLOSED CONTAINERS. WEAR SCBA (PRESSURE-DEMAND, MSHA/NIOSH OR EQUIVALENT) & FULL PROTECTIVE GEAR.
Unusual Fire/Explosion Hazard:CLOSED CONTAINERS MAY EXPLODE DUE TO THE BUILD UP OF STEAM PRESSURE WHEN EXPOSED TO EXTREME HEAT.

========== Accidental Release Measures ==========

Spill Release Procedures:CONTAIN/REMOVE W/INERT ABSORBENT. PLACE IN PROPER CONTINER FOR DISPOSAL. PLACE CONTAMINATED MATERIAL IN SUITABLE SEALED METAL CONTAINERS FOR DISPOSABLE. DON'T INCINERATE CLOSED CONTAINERS. USE NON-LEA KING CONTAINERS, SEAL TIGHTLY, LABEL PROPERLY.

========== Handling and Storage ==========

Handling and Storage Precautions:SHOULD BE STORED AT ROOM TEMPERATURE TO PROLONG SHELF LIFE. KEEP FROM FREEZING. KEEP CONTAINER CLOSED. KEEP OUT OF THE REACH OF CHILDREN.
Other Precautions:DON'T DRINK/TAKE INTERNALLY. DON'T GET IN EYES. AVOID PROLONGED SKIN CONTACT. PREVENT PROLONGED/REPEATED BREATHING OF VAPOR/SPRAY MIST. AVOID CONTACT W/CLOTHING, FABRICS/POROUS SURFACES WHERE PERMANEN T STAINING MAY TAKE PLACE.

========== Exposure Controls/Personal Protection ==========

Respiratory Protection:NIOSH/MSHA APPROVED RESPIRATOR. GOOD ROOM (MECHANICAL) ROOM VENTILATION SHOULD BE SUFFICIENT PROTECTION AGAINST SPRAY MISTS FROM PRODUCT.
Ventilation:GENERAL (MECHANICAL) ROOM VENTILATION.

Protective Gloves:PLASTIC/LATEX RUBBER
Eye Protection:SAFETY GLASSES W/SIDE SHIELDS
Other Protective Equipment:FACE SHIELD, EYE WASH
Supplemental Safety and Health
CON'T ON WASTE: DON'T MIX W/OTHER KINDS OF WASTE. DISPOSE ALL WASTE IN ACCORDANCE W/LOCAL, STATE, & FEDERAL REGULATIONS.

========== Physical/Chemical Properties ==========

Boiling Pt:B.P. Text:212F
Vapor Density:> THAN AIR
Evaporation Rate & Reference:SLOWER THAN ETHER
Solubility in Water:COMPLETE
Appearance and Odor:NORMAL LATEX PAINT APPEARANCE W/SLIGHT ACRYLIC ODOR.
Percent Volatiles by Volume:68.55

========== Stability and Reactivity Data ==========

Stability Indicator/Materials to Avoid:YES
Stability Condition to Avoid:EXTREME HEAT, FREEZING

========== Disposal Considerations ==========

Waste Disposal Methods:DON'T POUR CONTAMINATED PAINT INTO UNUSED PAINT. DON'T THROW PAINT INTO TRASH. ALLOW LIQUID WASTE MATERIALS TO DRY, BEFORE DISPOSING. TAKE LIQUID UNUSED PAINT TO APPROVED RECYCLING CENTERS. DON'T DISP OSE OF WASTE INTO WATER/STREAMS/SEWERS.SEE SUPP.

533 ARTISTIC ACRYLIC PAINT, PHTHALO RED

MSDS Number

BSZJP

National Stock Number

8010-00F032358

Product Name

533 ARTISTIC ACRYLIC PAINT, PHTHALO RED

Manufacturer

CAL WESTERN PAINTS

Product Identification

Product ID:533 ARTISTIC ACRYLIC PAINT, PHTHALO RED
MSDS Date:11/05/1992
FSC:8010
NIIN:00F032358
MSDS Number: BSZJP

Responsible Party

CAL-WESTERN PAINTS

11748 SLAUSON AVE

SANTA FE SPRINGS , CA 90670

US

Emergency Phone: 310-693-0872

Info Phone: 310-693-0872

Cage: CALWE

Contractor

CAL-WESTERN PAINTS

SANTA FE SPRINGS, CA 90670

US

310-693-0872

Cage: CALWE

Ingredients

WATER

CAS: 7732-18-5

RTECS: ZC0110000

Fraction By Weight: 40-55%

RESIN EMULSION

Fraction By Weight: 20-30%

NATURAL AGGREGATES

Fraction By Weight: 10-25%

PIGMENT

Fraction By Weight: 10-25%

10.15-10.45

RTECS: 9999999WG

0.35 LB/GAL; MATERIAL LESS

RTECS: 9999999VO

Hazards

Routes of Entry: Inhalation:YES Skin:NO Ingestion:NO
Reports of Carcinogenicity:NTP:NO IARC:NO OSHA:NO
Health Hazards Acute and Chronic:INHALATION: MILD RESPIRATORY IRRITATION. EYES: TRANSIENT IRRITATION. SKIN: IRRITATION.
Explanation of Carcinogenicity:NONE
Effects of Overexposure:INHALATION: HEADACHES, NAUSEA. SKIN: REDDENING.
Medical Cond Aggravated by Exposure:EYES, SKIN, ALLERGY &/OR RESPIRATORY DISORDERS

First Aid

First Aid:INHALATION: REMOVE TO FRESH AIR. EYES: FLUSH IMMEDIATELY W/PLENTY OF WATER FOR AT LEAST 15 MINS. SKIN: REMOVE W/SOAP & WATER. REMOVE CONTAMINATED CLOTHING. SUPPLY PLENTY OF FRESH WATER TO RINSE MATERI AL AWAY. INGESTION: INDUCE VOMITING IMMEDIATELY BY GIVING 1-2 GLASSES OF WATER & STICKING FINGER DOWN THROAT. NEVER GIVE ANYTHING BY MOUTH IF UNCONSCIOUS. OBTAIN MEDICAL ATTENTION IN ALL CASES.

Fire Fighting

Flash Point:212F
Extinguishing Media:WATER SPRAY, CO2, DRY CHEMICAL
Fire Fighting Procedures:IF WATER IS USED, FOG NOZZLES ARE PREFERABLE. USE WATER TO COOL CLOSED CONTAINERS. WEAR SELF-CONTAINED BREATHING APPARATUS & FULL PROTECTIVE GEAR.
Unusual Fire/Explosion Hazard:CLOSED CONTAINERS MAY EXPLODE DUE TO BUILD UP OF STEAM PRESSURE WHEN EXPOSED TO EXTREME HEAT.

Accidental Release

Spill Release Procedures:CONFINE IN SMALL AREA. CONTAIN & REMOVE W/INERT ABSORBENT. PLACE CONTAMINATED MATERIAL IN SUITABLE SEALED METAL CONTAINERS FOR DISPOSAL. USE NON-LEAKING CONTAINERS, SEAL TIGHTLY & LABELED PROPERLY. DO N'T MIX W/OTHER KINDS OF WASTE.

Handling

Handling and Storage Precautions:STORE AT ROOM TEMPERATURE TO PROLONG SHELF LIFE. KEEP FROM FREEZING. KEEP CONTAINER CLOSED. DON'T POUR CONTAMINATED PAINT BACK INTO UNUSED PAINT.
Other Precautions:KEEP OUT OF REACH OF CHILDREN UNLESS SUPERVISED BY AN ADULT. DON'T TAKE INTERNALLY. AVOID SKIN & EYE CONTACT. AVOID BREATHING VAPOR/SPRAY MIST. AVOID CONTACT W/CLOTHING, FABRICS OR POROUS SURFACES WHE RE PERMANENT STAINING MAY OCCUR.

Exposure Controls

Respiratory Protection:IF SPRAYING, USE AN APPROPRIATE, PROPERLY FITTED NIOSH/MSHA APPROVED RESPIRATOR.
Ventilation:GENERAL (MECHANICAL) ROOM IS EXPECTED TO BE SATISFACTORY
Protective Gloves:PLASTIC OR LATEX RUBBER
Eye Protection:SAFETY GLASSES W/SIDE SHIELD/FACE SHIELD
Other Protective Equipment:EYE WASH
Supplemental Safety and Health
WASTE DISPOSAL (CONT'D): TAKE ALL LIQUID UNUSED PAINT THAT CANNOT BE USED TO APPROVED RECYCLING CENTERS, PAINT ROUNDUPS, OR APPROVED COUNTY FACILITIES. AS PRODUCED, THIS PRODUCT IS NOT A CLASSIFIED AS A HAZARDOUS WASTE UNDER RCRA/EPA. THISPRODUCT IS NOT IGNITABLE,

CORROSIVE, REACTIVE OR TOXIC.

Chemical Properties

Boiling Pt:B.P. Text: 212F
Vapor Density: >1
Evaporation Rate & Reference:SLOWER THAN ETHER
Solubility in Water:COMPLETE
Appearance and Odor:NORMAL LATEX PHTHALO RED PAINT W/SLIGHT ACRYLIC ODOR
Percent Volatiles by Volume:69.09

Stability

Stability Indicator/Materials to Avoid:YES
Stability Condition to Avoid:FREEZING

Disposal

Waste Disposal Methods:DON'T INCINERATE CLOSED CONTAINERS. DON'T THROW LIQUID PAINT INTO TRASH; ALLOW TO DRY BEFORE PLACING IN TRASH CONTAINER. DON'T DISPOSE OF IN WATER STREAMS/STORM WATER SEWERS. DISPOSE OF IN ACCORDANCE W/FEDERAL, STATE & LOCAL REGULATIONS. (SEE SUPPL.)

Material Safety Data Sheet

SECTION 1 CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

ALL WEATHER MV HYDRAULIC OIL 32

MOTOR OIL, INC.
1490 Jarvis Avenue
Elk Grove Village, IL 60007
Phone (847) 956-7550 **Fax (847) 956-0399**

CAS Registry Number	Not applicable for mixtures
Chemical Family	Petroleum hydrocarbon
Product Type	Premium quality multi-viscosity anti-wear hydraulic oil
Preparation/Revision Date	12/2012

SECTION 2 COMPOSITION / INFORMATION ON INGREDIENTS

Component Name	CAS Number	OSHA PEL	ACGIH TLV	% (Optional)
Petroleum Lubricating Base Stock	64742-54-7	5 mg/m³	5 mg/m³	>99
Zinc Alkyl Dithophosphate	68649-42-3	NE	NE	<.05
Alkylated Phenol	Trade Secret	NE	NE	<.03
Calcium Phenate	Trade Secret	NE	NE	<.01
2-Ethlyhexanol	104-76-7	NE	NE	<.01

SECTION 3 HAZARDS IDENTIFICATION

Principal Hazard(s)	Contains petroleum oil. Avoid breathing mists or vapors. Avoid prolonged or repeated skin contact.

SECTION 4 FIRST AID MEASURES

Oral	**DO NOT induce vomiting.** Get immediate medical attention
Eye	Flush eye(s) with water for at least 15 minutes or until irritation subsides. Get medical attention if eye irritation develops or persists
Skin	Wash with soap and water. Immediately remove contaminated clothing. Get medical attention if irritation develops. Launder contaminated clothing before re-use. If product is injected into or under the skin, or into any part of the body, regardless of the appearance of the wound or its size, the individual should be evaluated immediately by a physician as a surgical emergency. Even though initial symptoms from high pressure injection may be minimal or absent, early surgical treatment within the first few hours may significantly reduce the ultimate extent of injury.
Inhalation	Vapor pressure is very low. Vapor inhalation under ambient conditions is normally not a problem. If adverse effects are observed, remove exposed person to fresh air. If breathing is labored, administer oxygen. If breathing has stopped, apply artificial respiration. If overexposed to oil mist, remove from further exposure until excessive oil mist subsides.

SECTION 5 FIRE FIGHTING MEASURES

Flash Point	200 ºC COC Typical
Upper Flammable Limit	Not Determined
Lower Flammable Limit	Not Determined
Extinguishing Media	Carbon Dioxide, dry chemical, water spray (fog) and foam. Note: water, water fog and foam may cause frothing and spattering.
Special Firefighting Procedures	Wear self-contained breathing apparatus. Avoid breathing fumes and vapors. Use water spray (fog) to cool containers exposed to high heat or open flames.
Unusual Fire and Explosion Hazards	Empty containers contain residue and/or vapors. DO NOT WELD, CUT, PRESSURIZE, BRAZE, SOLDER, DRILL, GRIND OR EXPOSE SUCH CONTAINERS TO HEAT, SPARKS, FLAME, STATIC ELECTRICITY OR OTHER SUCH SOURCES OF IGNITION. Keep empty containers closed and dispose of in an environmentally safe manner and in accordance with all government regulations.
Autoignition Temperature	Not Determined

SECTION 6 ACCIDENTAL RELEASE MEASURES

Spill Procedures	Evacuate all non-essential personal. Personal Protective Equipment must be worn (see Personal Protection Section for PPE recommendations). Remove sources of ignition. Ventilate spill area. Prevent entry into sewers and waterways. Pick up free liquid for recycle and/or disposal. Residual liquid can be absorbed on inert material. Assure conformity with applicable Federal, state and local regulations.

SECTION 7 HANDLING AND STORAGE

Handling Procedures	Keep away from potential sources of ignition. Avoid breathing vapors if present. Keep containers closed when not in use. Wash thoroughly after handling. Make sure that proper warning labels are affixed in accordance with 29 CFR 1910.1200. Use good personal hygiene around product. Do not smoke or eat around product.
Storage Procedures	Do not store near potential sources of ignition. Store in a well ventilated area. Store in a dry area. Do not store around food or eating areas.

SECTION 8 EXPOSURE CONTROLS / PERSONAL PROTECTION

Ventilation Procedures	Use material in well ventilated areas only. Additional ventilation or exhaust may be required to maintain air concentrations below recommended exposure limits.
Glove Protection	Use chemical resistant gloves, if needed, to avoid prolonged or repeated skin contact.
Eye Protection	Safety glasses recommended. Use splash goggles or face shield when eye contact may occur.
Respiratory Protection	Under normal conditions, respirator is not usually required. Use NIOSH/MSHA approved disposable dust/mist mask if the recommended exposure limit is exceeded.
Clothing Recommendation	Use a chemical resistant apron or other impervious clothing, if needed, to avoid contaminating regular clothing, which could result in prolonged or repeated skin contact.

SECTION 9 PHYSICAL AND CHEMICAL PROPERTIES

Appearance	Brown colored liquid	**Vapor Pressure**	Not Determined
Specific Gravity	0.88	**Vapor Density (Air = 1)**	Greater than 5
Viscosity	Approx 32 cSt @ 40 ºC	**Evaporation Rate**	Not Determined
Odor	Typical oil odor	**Pour or Melting Point**	-20 ºF
pH	Essentially neutral	**Boiling Point**	IBP approximately 600 ºF
Odor Threshold	Not Determined	**Percent Volatile**	Not Determined
Water Solubility	Negligible	**Molecular Weight**	Not Determined

SECTION 10 STABILITY AND REACTIVITY

Stability	Material is normally stable at room temperature and pressure. See the **Handling and Storage Section** for further details.
Incompatibility	Strong oxidizing agents.
Hazardous Polymerization	Will not occur.
Thermal Decomposition	Fumes, smoke, carbon monoxide, sulfur oxides, aldehydes and other decomposition products, in the case of incomplete combustion.

SECTION 11 TOXICOLOGICAL INFORMATION

Oral Toxicity	Not Determined.
Eye Irritation	Product contacting eyes may cause eye irritation.
Skin Irritation	May cause skin irritation. Prolonged or repeated contact may cause dermatitis. Symptoms may include redness, edema, drying, defatting and cracking of skin.
Dermal Toxicity	Not Determined.
Inhalation Toxicity	Not Determined.
Respiratory Irritation	If material is misted or if vapors are generated from heating, exposure may cause irritation of mucous membranes and the upper respiratory tract.
Dermal Sensitivity	No data available to indicate product or components may be skin sensitizer.
Inhalation Sensitivity	No data given to indicate product or components may be respiratory sensitizer.
Chronic Toxicity	Not Determined.
Carcinogenciity	The components of this product has not been found to be a carcinogen under either NTP, IARC Monographs or current OSHA regulations.
Other	Under conditions which may generate mists, observe the OSHA PEL 5 mg/m^3.

SECTION 12 ECOLOGICAL INFORMATION

No Data Given.	

SECTION 13 DISPOSAL CONSIDERATIONS

U. S. DOT Shipping Name	Not regulated by DOT
Hazard Class	Not applicable
DOT Identification Number	Not applicable
DOT Shipping Label	Not regulated by DOT

SECTION 14 WASTE DISPOSAL INFORMATION

WASTE DISPOSAL	This product is not considered a hazardous waste under RCRA regulations. After use, it is the responsibility of the user to determine the products status for disposal. This product can be incinerated, if practical, or recycled.

SECTION 15 REGULATORY INFORMATION

U. S. TSCA Inventory	All components of this product are listed on the TSCA Inventory.
SARA 302 Threshold Planning Quantity	No RQ for product or any constituent greater than 1.0% or 0.1% (carcinogen).
SARA 304 Reportable Qty	No RQ for product or any constituent greater than 1.0% or 0.1% (carcinogen).
SARA 311 Categories	**EPA Hazard Classification Code**

Acute	Chronic	Fire	Pressure	Reactivity
No	No	No	No	No

SARA 313 Supplier Notification	This product does not contain greater than 1.0% (greater than 0.1% for carcinogenic substances) of any chemical substances listed under SARA Section 313.
CERCLA Hazardous Substances	No chemicals in this product are subject to the reporting requirements of CERCLA.

SECTION 16 OTHER INFORMATION

HAZARDOUS MATERIALS IDENTIFICATION SYSTEM (HMIS)

HEALTH = 1 FIRE = 1 REACTIVITY = 0 PP = B

Rating: 0 = Minimal 1 = Slight 2 = Moderate 3 = Serious 4 = Extreme

Although the information and recommendations set forth herein are presented in good faith and believed to be correct as of the date hereof, **MOTOR OIL** makes no representations as to the completeness or accuracy thereof. **MOTOR OIL** makes no warranty whatsoever, expressed or implied, of **MERCHANTABILITY OR FITNESS FOR THE PARTICULAR PURPOSE** since the conditions of use are beyond our control. **MOTOR OIL** assumes no responsibility for injury to recipient or to third persons for any damage to any property and recipient.

========== SECTION I - CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: Barge AP (DC001, DC031, DC111, DC115)

RECOMMENDED USE: Adhesive

MANUFACTURER'S NAME: Slocum Adhesives Corp.
ADDRESS : 2500 Carroll Avenue
Lynchburg, VA 24501

EMERGENCY PHONE : 800-424-9300 (CHEMTREC) DATE PRINTED : 7/27/2012
INFORMATION PHONE : 434-847-5671 DATE REVISED : 05/02/12

========== SECTION II - HAZARD IDENTIFICATION

DANGER! Flammable liquid. Irritant by inhalation, ingestion, skin contact, eye contact.

ROUTES OF ENTRY
Inhalation, skin absorption, ingestion.
INHALATION HEALTH RISKS AND SYMPTOMS OF EXPOSURE
Breathing high concentrations of vapors may cause irritation of the nose and throat or signs of nervous system depression (i.e. - headache, nausea, drowsiness, dizziness, vomiting, loss of coordination and fatigue).

EYE CONTACT HEALTH RISKS AND SYMPTOMS OF EXPOSURE
May cause mild eye irritation. Direct contact with liquid or vapors may cause stinging, tearing, redness, swelling, and eye damage.

SKIN ABSORPTION HEALTH RISKS AND SYMPTOMS OF EXPOSURE
This material may cause mild skin irritation. Prolonged or repeated contact or exposure to vapors may cause redness, burning, and drying and cracking of the skin.

INGESTION HEALTH RISKS AND SYMPTOMS OF EXPOSURE
Ingestion may cause irritation of the digestive tract, nausea, vomiting, and signs of nervous system depression.

MEDICAL CONDITIONS GENERALLY AGGRAVATED BY EXPOSURE:
Pre-existing eye, skin, or respiratory disorders may be aggravated by exposure to this product.

========== SECTION III - COMPOSITION / INFORMATION ON INGREDIENTS

REPORTABLE COMPONENTS	CAS NUMBER	VAPOR PRESS.	WT. %
* Toluene OSHA PEL: 200 ppm ACGIH TLV: 50 ppm TWA	108-88-3	22.4	35 - 60%
Heptane OSHA PEL: 500 ppm ACGIH TLV: 400 ppm TWA	142-82-5	36.4	12 - 25%
Ethyl Acetate	141-78-6	73.1	5 - 15%

OSHA PEL: 400 ppm
ACGIH TLV: 400 ppm TWA

No additional warnings.

* Indicates toxic chemical(s) subject to the reporting requirements of section 313 of Title III.

========== SECTION IV - FIRST AID MEASURES

EMERGENCY AND FIRST AID PROCEDURES:

SKIN: In case of contact, immediately flush skin with plenty of soap and water for at least 15 minutes. Remove contaminated clothing and wash affected areas thoroughly with mild soap. If irritation develops, seek medical attention.

EYES: In case of contact, immediately flush eyes with plenty of water for at least 15 minutes and get medical attention if irritation persists.

INHALATION: If inhaled, remove to fresh air. If not breathing, give artificial respiration, preferably mouth-to-mouth. If breathing is difficult, give oxygen. Get medical attention.

INGESTION: Get medical attention. If vomiting occurs, keep head lower than hips to prevent aspiration.

========== SECTION V - FIRE FIGHTING MEASURES

FLASH POINT(°F): 21 METHOD USED: TCC
FLAMMABLE LIMITS IN AIR (% BY VOL): LOWER: 1.00 UPPER: 11.60

EXTINGUISHING MEDIA: Carbon dioxide, Dry chemicals, Foam.

SPECIAL FIREFIGHTING PROCEDURES
May produce toxic fumes if burning. The use of self-contained breathing apparatus is recommended for fire fighters. Water may be helpful in keeping adjacent containers cool; avoid spreading the liquid with water used for cooling. Dry chemicals, carbon dioxide, etc. may be more efficient at putting out smaller fires. Water-based sprinkler systems may help contain larger fires.

========== SECTION VI - ACCIDENTAL RELEASE MEASURES

Keep sources of ignition isolated from spill. Stop spill/release if it can be done without risk. Wear appropriate protective equipment including respiratory protection as conditions warrant and stay upwind. Prevent material from entering sewers, storm drains, or other natural waterways. Dike far ahead of spill for later recovery or disposal. Spilled material may be absorbed into an appropriate absorbent material. Immediate clean-up of any spill is recommended. Notify fire authorities and appropriate federal, state, and local agencies.

========== SECTION VII - HANDLING AND STORAGE

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORING

Avoid extremes of heat or cold. Use and store material in well-ventilated areas away from open flames, heat, hot metal surfaces, and other potential sources of ignition. Bond and ground equipment when transferring from one vessel to another. Store only in approved containers. Personal contact and inhalation should be avoided. Wash hands after use. Do not eat, drink, or smoke in work area.

========== SECTION VIII - EXPOSURE CONTROLS / PERSONAL PROTECTION

See Section III for exposure limits of hazardous ingredients.

RESPIRATORY PROTECTION:
Not required if adequate ventilation. If ventilation is not adequate, a suitable NIOSH approved respirator and cartridge should be used.
VENTILATION:
Mechanical ventilation.
PROTECTIVE GLOVES:
Impermeable gloves.
EYE PROTECTION:
Wear safety glasses or goggles to protect against exposure.
OTHER PROTECTIVE CLOTHING OR EQUIPMENT:
May use impermeable apron as needed, eye washes, and safety showers.

========== SECTION IX - PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE: Yellow liquid.	ODOR: Solvent odor.
pH: Not determined.	ODOR THRESHOLD: Not available.
MELT/FREEZE POINT: No data.	BOILING POINT(°F): 172
FLASH POINT(°F): See Section V.	EVAPORATION RATE: Faster than nBuAc.
FLAMMABILITY (SOLIDS)N/A.	LOWER FLAM. LIMIT: 1.00
VAPOR DENSITY: Heavier than air.	UPPER FLAM. LIMIT: 11.60
VAPOR PRESSURE: Refer to Section III for vapor pressure values.	
SPECIFIC GRAVITY: .881	WEIGHT PER GAL.: 7.3362 lb/gl
SOLUBILITY IN WATER: Insoluble.	VISCOSITY: No data.
PARTITION COEFFICIENT (n-octanol/water): No data.	
AUTO-IGNITION TEMP.(°F): No data.	EXPLOSIVE PROPS: No data.
DECOMPOSITION TEMP. (°F): No data.	OXIDIZING PROPS: No data.
VOLATILE (WT.%): 75.3647%	VOC CONTENT: 661 g/l (STANDARD CALCULATION METHOD)
VOC CONTENT LESS WATER & EXEMPT COMPOUNDS: 662 g/l	

========== SECTION X - STABILITY AND REACTIVITY

STABILITY:
Stable.

CONDITIONS TO AVOID:
Avoid extremes of heat or cold.

INCOMPATIBILITY (MATERIALS TO AVOID):
Incompatible with alkali metals, halogens, and strong acids or bases.

HAZARDOUS DECOMPOSITION OR BYPRODUCTS:
Carbon monoxide, carbon dioxide, smoke, and other unidentified organic compounds may be formed during combustion.

HAZARDOUS POLYMERIZATION:
Will not occur

========== SECTION XI - TOXICOLOGICAL INFORMATION

See Section II for additional information regarding health risks.

CARCINOGENICITY: NTP CARCINOGEN: No.
IARC MONOGRAPHS: No.
OSHA REGULATED: No.

REPRODUCTIVE TOXICITY: No data.
MUTAGENICITY: No data.
STOT-single exposure: No data.
STOT-repeated exposure: No data.
ASPIRATION HAZARD: No data.
ACUTE TOXICITY: No data.
IRRITATION: No data.
CORROSIVITY: No data.
SENSITISATION: No data.

METHYLENE CHLORIDE?: Methylene chloride is not present in this product.

========== SECTION XII - ECOLOGICAL INFORMATION

AQUATIC TOXICITY: ACUTE AND PROLONGED TOXICITY TO FISH: No data.
ACUTE TOXICITY TO AQUATIC INVERTEBRATES: No data.
ENVIRONMENTAL FATE AND PATHWAYS: No data.
PERSISTENCE & DEGRADABILITY: No data.
BIOACCUMULATIVE POTENTIAL: No data.
MOBILITY IN SOIL: No data.
OTHER ADVERSE EFFECTS: No data.

========== SECTION XIII - DISPOSAL CONSIDERATIONS

Dispose of in accordance with all applicable local, state, and federal regulations. Do not discharge effluent containing this product into lakes, streams, ponds, estuaries, oceans, or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) permit, and the permitting authority has been notified in writing prior to discharge. Do not discharge effluent containing this product to sewer systems without previously notifying the local sewage treatment plant authority. For guidance, contact your State Water Board or Regional Office of the EPA.

========== SECTION XIV - TRANSPORTATION INFORMATION

NOTE: The assignment of Proper Shipping Name is in part a function of the size of the product container and the transport mode. For example, the Proper Shipping Name for a bulk container can differ significantly from the Proper Shipping Name for the same product packaged in a non-bulk container. This can also be true for products shipped via different modes of transportation (i.e. ground, air, ocean). The descriptions provided here are intended to provide some guidance. However, these descriptions may not apply to your package size or mode of shipment.
The U.S. Code of Federal Regulations, 49 CFR - Transportation, regulations, and the policies established by some transporters, require that the shipper properly classify and assign a Proper Shipping Name, and label, mark and package the material properly. Therefore, the user of this information is cautioned to consult with applicable regulations, and with qualified advisors prior to the repackaging and/or reshipment of this or any other product which contains this product.

SMALL QUANTITY (1 gallon or less):

ORM-D; CONSUMER COMMODITY

DOT (ROAD, RAIL, WATER):
PROPER SHIPPING NAME: ADHESIVES; UN1133; PG II; CLASS 3

IMDG (ROAD, RAIL, WATER):
PROPER SHIPPING NAME: ADHESIVES; UN1133; PG II; CLASS 3

========== SECTION XV - REGULATORY INFORMATION

NFPA CODES: H F R P
2 3 0 B

CALIFORNIA PROPOSITION 65
WARNING! This product contains the following substance(s) known to the state of California to cause birth defects or other reproductive harm.
TOLUENE TOLUENE;

TOXIC SUBSTANCES CONTROL ACT (TCSA): All components of this product are included in the TSCA inventory.

========== SECTION XVI - OTHER INFORMATION

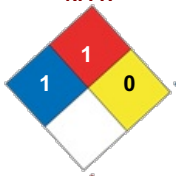
The information contained herein is based on the data available to us and is believed to be correct. However, Slocum Adhesives Corporation makes no warranty, expressed or implied, regarding the accuracy of these data or the results to be obtained from the use thereof. Slocum Adhesives Corporation assumes no responsibility for injury from the use of the product described herein.

******* ***** END OF SAFETY DATA SHEET ***** *******

SECTION 1 - PRODUCT AND COMPANY IDENTIFICATION

Product Name:	**Premium Plus Interior Flat - Deep Base No. 1300**
Product Code:	1300
MSDS Manufacturer Number:	1300
Manufacturer Name:	BEHR Process Corporation
Address:	3400 W. Segerstrom Avenue Santa Ana, CA 92704
General Phone Number:	(714) 545-7101
General Fax Number:	(714) 241-1002
Customer Service Phone Number:	(800) 854-0133 ext. 2
CHEMTREC:	For emergencies in the US, call CHEMTREC: 800-424-9300
Canutec:	In Canada, call CANUTEC: (613) 996-6666 (call collect)
MSDS Creation Date:	August 01, 2004
MSDS Revision Date:	January 13, 2013
(M)SDS Format:	

NFPA



HMIS

Health Hazard	1
Fire Hazard	1
Reactivity	0
Personal Protection	

SECTION 2 - COMPOSITION/INFORMATION ON INGREDIENTS

Chemical Name	CAS#	Ingredient Percent
Hydrophobed polyethylene glycol	No Data	1 - 5 by weight
Water	7732-18-5	10 - 30 by weight
Nepheline Syenite	37244-96-5	30 - 60 by weight

SECTION 3 - HAZARDS IDENTIFICATION

Emergency Overview:	Irritant.
Potential Health Effects:	
Eye:	May cause irritation.
Skin:	May cause irritation.
Inhalation:	Prolonged or excessive inhalation may cause respiratory tract irritation.
Ingestion:	May be harmful if swallowed. May cause vomiting.
Chronic Health Effects:	Prolonged or repeated contact may cause skin irritation.
Signs/Symptoms:	Overexposure may cause headaches and dizziness.
Target Organs:	Eyes. Skin. Respiratory system. Digestive system.
Aggravation of Pre-Existing Conditions:	None generally recognized.

SECTION 4 - FIRST AID MEASURES

Eye Contact:	Immediately flush eyes with plenty of water for 15 to 20 minutes. Get medical attention, if irritation or symptoms of overexposure persists.
Skin Contact:	Immediately wash skin with soap and plenty of water. Get medical attention if irritation develops or persists.
Inhalation:	If inhaled, remove to fresh air. If not breathing, give artificial respiration or give oxygen by trained personnel. Seek immediate medical attention.
Ingestion:	If swallowed, do NOT induce vomiting. Call a physician or poison control center immediately. Never give anything by mouth to an unconscious person.
Other First Aid:	Due to possible aspiration into the lungs, DO NOT induce vomiting if ingested. Provide a glass of water to dilute the material in the stomach. If vomiting occurs naturally, have the person lean forward to reduce the risk of aspiration.

SECTION 5 - FIRE FIGHTING MEASURES

Flash Point:	No Data
Lower Flammable/Explosive Limit:	Not applicable.
Upper Flammable/Explosive Limit:	Not applicable.
Extinguishing Media:	Use alcohol resistant foam, carbon dioxide, dry chemical, or water fog or spray when fighting fires involving this material.
Protective Equipment:	As in any fire, wear Self-Contained Breathing Apparatus (SCBA), MSHA/NIOSH (approved or equivalent) and full protective gear.

NFPA Ratings:

NFPA Health:	1
NFPA Flammability:	1
NFPA Reactivity:	0

SECTION 6 - ACCIDENTAL RELEASE MEASURES

Personnel Precautions:	Use proper personal protective equipment as listed in section 8.
Environmental Precautions:	Avoid runoff into storm sewers, ditches, and waterways.
Spill Cleanup Measures:	Absorb spill with inert material (e.g., dry sand or earth), then place in a chemical waste container. Provide ventilation. Clean up spills immediately observing precautions in the protective equipment section.

SECTION 7 - HANDLING and STORAGE

Handling:	Use with adequate ventilation. Avoid breathing vapor and contact with eyes, skin and clothing.
Storage:	Store in a cool, dry, well ventilated area away from sources of heat, combustible materials, and incompatible substances. Keep container tightly closed when not in use.
Hygiene Practices:	Wash thoroughly after handling. Avoid contact with eyes and skin. Avoid inhaling vapor or mist.

SECTION 8 - EXPOSURE CONTROLS, PERSONAL PROTECTION - EXPOSURE GUIDELINES

Engineering Controls:	Use appropriate engineering control such as process enclosures, local exhaust ventilation, or other engineering controls to control airborne levels below recommended exposure limits. Good general ventilation should be sufficient to control airborne levels. Where such systems are not effective wear suitable personal protective equipment, which performs satisfactorily and meets OSHA or other recognized standards. Consult with local procedures for selection, training, inspection and maintenance of the personal protective equipment.
Eye/Face Protection:	Wear appropriate protective glasses or splash goggles as described by 29 CFR 1910.133, OSHA eye and face protection regulation, or the European standard EN 166.
Skin Protection Description:	Chemical-resistant gloves and chemical goggles, face-shield and synthetic apron or coveralls should be used to prevent contact with eyes, skin or clothing.
Respiratory Protection:	A NIOSH approved air-purifying respirator with an organic vapor cartridge or canister may be permissible under certain circumstances where airborne concentrations are expected to exceed exposure limits. Protection provided by air purifying respirators is limited. Use a positive pressure air supplied respirator if there is any potential for an uncontrolled release, exposure levels are not known, or any other circumstances where air purifying respirators may not provide adequate protection.
Other Protective:	Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower.

EXPOSURE GUIDELINES

SECTION 9 - PHYSICAL and CHEMICAL PROPERTIES

Physical State Appearance:	Liquid.
Color:	White
Boiling Point:	No Data
Melting Point:	No Data
Density:	10 - 12 Lbs./gal.
Vapor Density:	Greater than 1 (Air = 1).
pH:	8.5 to 9.5

Molecular Formula:	Mixture
Molecular Weight:	Mixture
Flash Point:	No Data
VOC Content:	Material VOC: 1 gm/l (Includes Water) Coating VOC.: 1 gm/l (Excludes Water)

SECTION 10 - STABILITY and REACTIVITY

Chemical Stability:	Stable under normal temperatures and pressures.
Hazardous Polymerization:	Not reported.
Conditions to Avoid:	Heat, flames, incompatible materials, and freezing or temperatures below 32 deg. F.
Incompatible Materials:	Oxidizing agents. Strong acids and alkalis.

SECTION 11 - TOXICOLOGICAL INFORMATION

Nepheline Syenite :

RTECS Number:	QP9365000

SECTION 12 - ECOLOGICAL INFORMATION

Ecotoxicity:	No ecotoxicity data was found for the product.
Environmental Fate:	No environmental information found for this product.

SECTION 13 - DISPOSAL CONSIDERATIONS

Waste Disposal:	Consult with the US EPA Guidelines listed in 40 CFR Part 261.3 for the classifications of hazardous waste prior to disposal. Furthermore, consult with your state and local waste requirements or guidelines, if applicable, to ensure compliance. Arrange disposal in accordance to the EPA and/or state and local guidelines.

SECTION 14 - TRANSPORT INFORMATION

DOT UN Number:	No Data
DOT Hazard Class:	No Data

SECTION 15 - REGULATORY INFORMATION

Nepheline Syenite :

TSCA Inventory Status:	Not listed
Canada DSL:	Listed

WARNING: This product contains a chemical known to the state of California to cause cancer and birth defects or other reproductive harm.

SECTION 16 - ADDITIONAL INFORMATION

MSDS Creation Date:	August 01, 2004
MSDS Revision Date:	January 13, 2013
MSDS Revision Notes:	Quarterly formula update
MSDS Author:	Actio Corporation
Disclaimer:	This Health and Safety Information is correct to the best of our knowledge and belief at the date of its publication but we cannot accept liability for any loss, injury or damage which may result from its use. We shall ensure, so far as is reasonably practicable, that any revision of this Data Sheet is sent to all customers to whom we have directly supplied this substance, but must point out that it is the responsibility of any intermediate supplier to ensure that such revision is passed to the ultimate user. The information given in the Data Sheet is designed only as a guidance for safe handling, storage and the use of the substance. It is not a specification nor does it guarantee any specific properties. All chemicals should be handled only by competent personnel, within a controlled environment. Should further information be required, this can be obtained through the sales office whose

address is at the top of this data sheet.

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MATERIAL SAFETY DATA SHEET

WORTHINGTON CYLINDERS
A Worthington Industries Company

Section 1: Product and Company Identification

Product:	Propane	**Company:**	Worthington Cylinder Corporation
Description:	Odorized Commercial Propane	**Address:**	200 Old Wilson Bridge Road Columbus, Ohio 43085
Date Issued:	February 8, 2012	**Information:**	614-438-7960
Last Revised:	April 10, 2013	**Emergency:**	CHEMTREC – (800) 424-9300

Section 2: Hazardous Ingredients and Exposure Limits

Ingredient	CAS Number	Weight %	OSHA PEL (ppm)	ACGIH TLV (ppm)
Propane	74-98-6	87.5 – 100	1000	1000[b]
Ethane	74-84-0	0 – 7.0	1000[a]	1000[b]
Propylene	115-07-1	0 – 5.0	1000[a]	500
Butane	106-97-8	0 – 2.5	1000[a]	1000[b]
Ethyl Mercaptan (odorant)	75-08-1	<0.0050	10 (Ceiling)	0.5

[a] For Liquefied petroleum gas
[b] For Aliphatic hydrocarbon gases

Section 3: Hazards Identification

Propane (also called Liquefied Petroleum Gas or LP-Gas) is a liquid fuel stored under pressure that rapidly turns into a gas at standard atmospheric temperatures and pressure. Propane is extremely flammable and explosive. At high concentrations it acts as a simple asphyxiant by diluting and displacing oxygen, particularly in confined spaces. Direct contact with liquefied product may cause freeze burns and frostbite. Vapor is heavier than air and may accumulate in low-lying areas. Use this product only in well ventilated areas and, where appropriate, proper respiratory protection and personal protective equipment should be worn. An odorant (ethyl mercaptan) is added to provide a strong unpleasant odor akin to rotten eggs.

Section 4: First Aid Measures

Eye Contact: Flush eyes with plenty of water for at least 15 minutes while occasionally lifting the eyelids. Seek medical attention.

Skin Contact: Remove contaminated clothing. Wash with soap and water. Get medical attention if irritation or redness develops. In case of frostbite, place affected area in warm water or wrap in blankets if warm water is not available. DO NOT USE HOT WATER. Seek immediate medical attention.

Inhalation: Remove to fresh air. Administer oxygen or artificial respiration if necessary. Seek immediate medical attention.

Ingestion: Risk of ingestion is extremely low. Seek immediate medical attention in cases of ingestion or oral exposure.

Section 5: Fire and Explosion Data

Fire Hazards: Extremely flammable. Liquid releases vapors that readily form a flammable mixture with air. Dangerous fire and explosion hazard when exposed to heat, sparks or flame. Vapors are heavier than air and may

accumulate in low-lying areas and form explosive mixtures. Vapors may travel long distances to a point of ignition. Container may explode in heat or flame.

Flash Point: -156 °F (-104 °C)

Auto Ignition: 842 °F (432 °C)

Lower Explosion Limit: 2.15% by volume in air

Upper Explosion Limit: 9.6% by volume in air

Hazardous Combustion Products: Carbon monoxide, carbon dioxide and various non-combusted hydrocarbons.

Extinguishing Media: Dry chemical, foam, carbon dioxide, Halon or water.

Unusual Fire Hazards: Use extreme caution when fighting liquefied petroleum gas fires. Heated containers may rupture violently and suddenly without warning due to vessel overpressure (BLEVE-boiling liquid expanding vapor explosions). If safe to do so stop the flow of gas and allow the flame to burn out. Extinguishing the flame before shutting off the supply can cause formation of explosive mixtures. In some cases it may be preferred to allow the flame to continue to burn. Use water to cool equipment, surfaces and containers exposed to fire and excessive heat. Continue use water to cool containers until well after flames are extinguished.

Section 6: Accidental Release Measures

Evacuate all personnel from the area. Eliminate all sources of ignition. If possible, stop the flow of product. Ventilate the area thoroughly. Take precautions against static discharges. Vapors are heavier than air and may accumulate in low-lying areas and form explosive mixtures with air.

Section 7: Handling and Storage

Handling Precautions: Keep away from flame, sparks and excessive temperatures. Use only in well-ventilated areas. Containers must be grounded to avoid generation of static charges. Do not smoke while handling product. Follow use instructions fully and carefully.

Storage Requirements: Store in a cool, dry, well-ventilated area away from sources of ignition, strong oxidizers or other incompatible materials. Keep containers closed at all times. Check regularly for leaks. Ensure equipment is electrically bonded and grounded to prevent static accumulation. Post “No Smoking or Open Flame” signs in the storage and use areas. Protect cylinders against physical damage. Do not cut, drill, grind or weld on empty cylinders since they may contain explosive residues. Do not attempt to refill cylinders.

Section 8: Exposure Control/Personal Protection

Occupational Exposure Limits: See Section 2.

Engineering Controls: Good industrial hygiene practice requires that engineering controls be used where feasible to reduce workplace concentrations of hazardous materials.

Ventilation: Use adequate ventilation to keep gas and vapor concentrations of this product below the occupational exposure and flammability limits, particularly in confined spaces. Use mechanical ventilation that is explosion proof.

Respiratory Protection: Maintain oxygen levels above 19.5% in the workplace. Respirators must be worn if ambient concentrations of contaminants exceed prescribed exposure limits. Seek professional advice prior to respirator selection and use. Select respirator based on its suitability to provide adequate worker protection for given work conditions, level of airborne contamination, and presence of sufficient oxygen. When required, only professionally approved respirators should be used.

Protective Clothing: Protective clothing should be worn to prevent skin contact. Protective gloves should be worn as required for welding or burning. Use insulated gloves where there is the possibility of liquid contact.

Eye Protection: Use safety glasses or goggles as required for welding or burning. Use splash-proof goggles or faceshield where there is the possibility of liquid contact.

Section 9: Physical and Chemical Properties

Boiling Point: -44 °F (-42 °C) @ 14.7 psia	**Vapor Pressure:** 127 psig @ 70 °F
Melting Point: -306 °F (-188 °C)	**Specific Gravity of Vapor (air=1):** 1.5 @ 60 °F
Specific Gravity of Liquid (water=1): 0.504	**Solubility in Water:** Slight
Molecular Weight: 45	**Percent Volatile by Weight:** 100
Appearance: Colorless gas	**Odor:** Odorant has a foul smell akin to rotten eggs

Section 10: Stability and Reactivity

Chemical Stability: Stable

Hazardous Decomposition Products: Carbon oxides and various hydrocarbons formed when burned.

Incompatibility: Strong oxidizers, strong acids, halogens.

Hazardous Polymerization: Will not occur

Conditions to Avoid: Sources of heat, sparks or flame.

Section 11: Toxicological Information

Overview: Propane is an anesthetic and is mildly irritating to the mucous membranes. At high concentrations propane acts as a simple asphyxiant without significant potential for systemic toxicity. Direct contact with liquefied product may cause freeze burns and frostbite. Additional data can be found in the Registry of Toxic Effects of Chemical Substances available on-line from the National Institute for Occupational Safety and Health (NIOSH).

Primary Entry Routes: Inhalation

Target Organs: Respiratory system

Potential Health Effects:

- Inhalation: Product is an anesthetic at high concentrations. Inhalation may cause central nervous system depression producing dizziness, drowsiness, headache, and similar narcotic symptoms. Extremely high concentrations can cause asphyxiation and death by displacing oxygen from the breathing atmosphere.
- Eyes: Vapor is generally non-irritating to the eyes. Contact with liquefied gas or rapidly expanding gases may cause freeze burns and frostbite.
- Skin: Vapor is generally non-irritating to the skin. Contact with liquefied gas or rapidly expanding gases may cause freeze burns and frostbite.
- Ingestion: Ingestion is not likely.

Medical Conditions Aggravated by Exposure: Chronic diseases or disorders of the respiratory system.

Carcinogenic Effects: Propane is not identified as being carcinogenic by the International Agency for Research on Cancer (IARC), The National Toxicology Program (NTP), ACGIH or OSHA.

Section 12: Ecological Information

Propane is expected to be inherently biodegradable. Propane is readily degraded by microorganisms and is therefore not expected to bioaccumulate or bioconcentrate in organisms and food chains. Propane emissions would

have practically no adverse effects on plant growth. Not expected to cause serious soil or groundwater contamination due to rapid evaporation.

Section 13: Disposal Considerations

Use the container until empty. Empty containers have residual vapor that is flammable and explosive. Waste disposal must be in accordance with appropriate federal, state and local regulations.

Section 14: Transport Information

Shipping Name: Liquefied Petroleum Gas

Hazard Class: 2.1 (Flammable Gas)

ID Number: UN 1075

IMO Shipping Name: Propane

IMO Identification Number: UN 1978

Packing Group: Not Applicable

Marking: Propane, UN 1075

Label: Flammable Gas

Placard: Flammable Gas / UN1075

Hazardous Substance/RQ: Not Applicable

Shipping Description: Propane, 2.1 (Flammable Gas), UN 1075

Packaging References: 49 CFR 173.304, 173.306, 173.314 and 173.315

Section 15: Regulatory Information

Users of this product are responsible for their own regulatory compliance on a federa, state (provincial

US Federal Regulations:

- OSHA Hazardous Communication (29 CFR Part 1910.1200): This product is hazardous as defined in OSHA's Hazard Communication standard.
- OSHA Process Safety Management (29 CFR Part 1910.119): This product may be subject to OSHA's Process Safety Management of Highly Hazardous Chemicals standard.
- CERCLA Reportable Quantities (40 CFR Part 302.4): This product is not reportable under 40 CFR Part 302.4.
- Extremely Hazardous Substances (40 CFR Part 355): This product is not regulated under 40 CFR Part 355.
- SARA 311/312 Hazard Class (40 CFR Part 370): The following hazard categories apply to this product:
  - Acute Health Hazard
  - Fire Hazard
  - Sudden Release of Pressure
- SARA 313 (40 CFR Part 372): This product may contain up to 5.0% propylene (CAS 115-07-1) which is reportable under 40 CFR Part 372.
- TSCA Inventory Status: Propane is listed on the TSCA Inventory.
- Chemical Accident Prevention Provisions (40 CFR Part 68): Propane is subject to the reporting requirements of 40 CFR Part 68.

State Regulations:

- California Proposition 65: This product is not listed.

- Several states have specific regulations related to hazardous materials. Consult local officials for additional state requirements.

Other Regulations:

- Canada DSL/NDSL Inventory: Propane is listed on the Domestic Substances List.

Section 16: Other Information

Hazard Ratings:

NFPA:	H-1, F-4, R-0
HMIS®:	H-1, F-4, PH-0
WHIMS:	A, B1

The HMIS ratings displayed on this MSDS are from the HMIS Third Edition. There have been significant changes made to the system. “PH” stands for “Physical Hazard” as defined in the OSHA Hazardous Communication Standard and replaces the former code “R” for “Reactivity.”

Disclaimer: All information in this Material Safety Data Sheet is believed to be accurate and reliable. However, no guarantee or warranty of any kind is made with regard to the accuracy of information or the suitability of the recommendations contained herein. It is the user’s responsibility to assess the safety and toxicity of this product under their own conditions of use and to comply with all applicable laws and regulations.

00011-XXXX

MATERIAL SAFETY DATA SHEET

May be used to comply with OSHA's 29 CFR 1910.1200)

Note: blank spaces are not permitted. If any item is not applicable, or no information available, the space must be marked appropriately

IDENTITY (AS USED ON LABEL AND LIST)

DICK BLICK PREMIUM TEMPERA

SECTION 1 - MATERIAL IDENTIFICATION AND INFORMATION

(608) 868-6873
EMERGENCY TELEPHONE NUMBER

MAY 2011
DATE PREPARED

SECTION 2 - MATERIAL IDENTIFICATION AND INFORMATION

COMPONENTS: CHEMICAL NAME & COMMON NAMES	%	OSHA PEL	ACGIH TLV	OTHER LIMITS RECOMMENDED

Contains no hazardous substand per OSHA
29 CFR 1910.1200

Material is a water based product with the AP Seal. Products with, the AP Approved Products Seal of the Art and Craft Materials Institute Inc. are certified in a program of toxicological evaluation by a medium expert to contain no material in sufficient quantities to be toxic or injurious to humans or to cause acute or chronic health problems. These products are certitied by the Institute to be in accordance with the voluntary chronic hazard labeling standard ASTM D-4236. In addition, there is no physical hazard as defined within 29 CFR Part 1910.1200 (c).

SECTION 3 - PHYSICAL/CHEMICAL CHARACTERISTICS

BOILING POINT -	Range 215-225 F	SPECIFIC GRAVITY (H2O = 1) -	Range 1.03-1.68
VAPOR PRESSURE (mm Hg & TEMPERATURE) -	N/A	MELTING POINT -	N/A
VAPOR DENSITY (AIR=1) -	lighter than air	EVAPORATION RATE (WATER = 1) -	lower than ether
SOLUBILITY IN WATER -	completely soluble in water	WATER REACTIVE -	N/A
APPEARANCE & ODOR -	various colors and odorless		

SECTION 4 - FIRE AND EXPLOSION HAZARD DATA

FLASH POINT & METHOD USED	FLAMMABILITY LIMITS IN AIR % BY VOLUME	
N/A	N/A	
EXTINGUISHER MEDIA	LEL	UEL
CO2, Foam or Water	N/A	N/A

SPECIAL FIRE FIGHTING PROCEDURES
None known

UNUSUAL FIRE AND EXPLOSION HAZARDS
None

SECTION 5 - REACTIVITY HAZARD DATA

PREMIUM TEMPERA Page 2 of 2

STABILITY	CONDITIONS TO AVOID
[X] STABLE [ ] UNSTABLE	None

INCOMPATABILITY (MATERIALS TO AVOID) N/A

HAZARDOUS DECOMPOSITION PRODUCTS N/A

HAZARDOUS POLYMERIZATION	CONDITIONS TO AVOID
[ ] MAY OCCUR N/A [ ] WILL NOT OCCUR	None known

SECTION 6 - HEALTH HAZARD DATA

PRIMARY ROUTES OF ENTRY N/A		CARCINOGEN LISTED IN N/A	
[ ] INHALATION	[ ] INGESTION	[ ] NTP	[ ] OSHA
[ ] SKIN ABSORTION	[ ] NOT HAZARDOUS	[ ] IARC MONOGRAPH	[X] NOT LISTED

HEALTH HAZARDS	ACUTE
Refer to Section 2	CHRONIC

SIGNS AND SYMPTOMS Not known

MEDICAL CONDITIONS GENERALLY AGGRAVATED BY EXPOSURE Not known

EMERGENY FIRST AID PROCEDURES - Consult a Physician Immediatley.

SECTION 7 - PRECAUTIONS FOR SAFE HANDLING AND USE/LEAK PROCEDURES

STEPS TO BE TAKEN IS MATERIAL IS SPILLED OR RELEASED

Usual Clean Up Procedure

WASTE DISPOSAL METHODS

Dispose of in accordance with Federal and Local State Regulations

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE

Store at room temperature.

OTHER PRECAUTIONS AND/OR SPECIAL HAZARDS

Not known

SECTION 8 - CONTROL AND PROTECTIVE MEASURES

RESPIRATORY PROTECTION (SPECIFY TYPE)

None required

VENTILATION TO BE USED	LOCAL EXHAUSE	MECHANICAL (GENERAL)	SPECIAL
None required	OTHER (SPECIFY)		

PROTECTIVE GLOVES N/A	EYE PROTECTION N/A

OTHER PROTECTIVE CLOTHING AND EQUIPMENT N/A

HYGIENIC WORK PRACTICES N/A

Item Numbers: 00011-0039, 00011-0049, 00011-0059, 00011-0069, 00011-0079, 00011-0089, 00011-0099, 00011-1005, 00011-1006, 00011-1007, 00011-1008, 00011-1009, 00011-2005, 00011-2006, 00011-2007, 00011-2008, 00011-2009, 00011-3005, 00011-3006, 00011-3007, 00011-3008, 00011-3009, 00011-3045, 00011-3046, 00011-3047, 00011-3048, 00011-3049, 00011-3216, 00011-3716, 00011-4005, 00011-4006, 00011-4007, 00011-4008, 00011-4009, 00011-4105, 00011-4106, 00011-4107, 00011-4108, 00011-4109, 00011-4216, 00011-4505, 00011-4506, 00011-4507, 00011-4508, 00011-4509, 00011-4916, 00011-5005, 00011-5006, 00011-5007, 00011-5008, 00011-5009, 00011-5115, 00011-5116, 00011-5117, 00011-5118, 00011-5119, 00011-5246, 00011-6505, 00011-6506, 00011-6507, 00011-6508, 00011-6509, 00011-7005, 00011-7006, 00011-7007, 00011-7008, 00011-7009, 00011-7055, 00011-7056, 00011-7057, 00011-7058, 00011-7059, 00011-7266, 00011-7345, 00011-7346, 00011-7347, 00011-7348, 00011-7349, 00011-8005, 00011-8006, 00011-8007, 00011-8008, 00011-8009, 00011-8045, 00011-8046, 00011-8047, 00011-8048, 00011-8049, 00011-9005, 00011-9006, 00011-9007, 00011-9008, 00011-9009, 00011-9305, 00011-9306, 00011-9307, 00011-9308, 00011-9309

Safety data sheet
Argoshield Light/Universal/Heavy

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier
Product name
Argoshield Light
Argoshield Universal
Argoshield Heavy

EC No (from EINECS): Mixture not applicable
CAS No: Mixture not applicable
Index-Nr. Mixture not applicable
Chemical formula Mixture of Ar, CO2 and O2.
REACH Registration number: Not applicable, components are exempt from registration.

1.2. Relevant identified uses of the substance or mixture and uses advised against.
Industrial and professional. Perform risk assessment prior to use.

1.3. Details of the supplier of the safety data sheet
Company identification
BOC, Priestley Road, Worsley, Manchester M28 2UT
E-Mail Address ReachSDS@boc.com

1.4. Emergency telephone number
Emergency phone numbers (24h): 0800 111 333

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification acc. to Regulation (EC) No 1272/2008/EC (CLP/GHS)
Press. Gas (Compressed gas) - Contains gas under pressure; may explode if heated.

Classification acc. to Directive 67/548/EEC & 1999/45/EC
Not classified as hazardous to health.
Asphyxiant in high concentrations.
Risk advice to man and the environment
In high concentrations may cause asphyxiation.
Compressed gas.

2.2. Label elements
- Labelling Pictograms

Precautionary Statement Storage
P403 Store in a well-ventilated place.

Precautionary Statement Disposal
None.

2.3. Other hazards
None.

SECTION 3: Composition/information on ingredients

Substance / Mixture: Mixture.

3.1. Substances
Not applicable.

3.2. Mixtures

	Mixture	Contents	CAS No.	EC No.	Reg. No.	Classification
Carbon dioxide	Light Universal Heavy	5 % 12 % 20 %	124-38-9	204-696-9	*1	Not classified as hazardous to health Press. Gas (H280)
Oxygen	Light Universal Heavy	2 %	7782-44-7	231-956-9	*1	O; R8 Ox. Gas 1 (H270) Press. Gas (H280)
Argon	Light Universal Heavy	93 % 86% 78 %	7440-37-1	231-147-0	*1	Not classified as hazardous to health Press. Gas (H280)

*1 Listed in Annex IV/V of Regulation (EC) No 1907/2006 (REACH), exempted from registration.

SECTION 4: First aid measures

4.1. Description of first aid measures
First Aid General Information:
Remove victim to uncontaminated area wearing self contained breathing apparatus. Keep victim warm and rested. Call a doctor. Apply artificial respiration if breathing stopped.
First Aid Inhalation:
Remove victim to uncontaminated area wearing self contained breathing apparatus. Keep victim warm and rested. Call a doctor. Apply artificial respiration if breathing stopped.

SECTION 5: Fire fighting measures

5.1. Extinguishing media
Suitable extinguishing media
All known extinguishants can be used.

5.2. Special hazards arising from the substance or mixture
Specific hazards
Exposure to fire may cause containers to rupture/explode.
Hazardous combustion products
None.

5.3. Advice for fire-fighters
Specific methods
Move container away or cool with water from a protected position.
Special protective equipment for fire-fighters
Normal firefighters' equipment consists of an appropriate SCBA (open-circuit positive pressure compressed air type) in combination with fire kit. Equipment and clothing to the following standards will provide a suitable level of protection for firefighters.
Guideline:
EN 469:2005: Protective clothing for firefighters. Performance requirements for protective clothing for firefighting., EN 137 Respiratory protective devices — Self-contained open-circuit compressed air breathing apparatus with full face mask — Requirements, testing, marking., EN 15090 Footwear for firefighters., EN 443 Helmets for fire fighting in buildings and other structures., EN 659 Protective gloves for firefighters.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures
Evacuate area. Wear self-contained breathing apparatus when entering area unless atmosphere is proved to be safe. Ensure adequate air ventilation. Prevent from entering sewers, basements and workpits, or any place where its accumulation can be dangerous.

6.2. Environmental precautions
Try to stop release.

6.3. Methods and material for containment and cleaning up
Ventilate area.

6.4. Reference to other sections
See also sections 8 and 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling
Only experienced and properly instructed persons should handle or modify container valves or safety relief devices. Damaged valves should be reported immediately to the supplier. Keep container valve outlets clean and free from contaminates particularly oil and water. Replace valve outlet caps or plugs and container caps where supplied as soon as container is disconnected from equipment. Close container valve after each use and when empty, even if still connected to equipment. Never attempt to transfer gases from one container to another. Never use direct flame or electrical heating devices to raise the pressure of a container. Do not smoke while handling product. Do not remove or deface labels provided by the supplier for the identification of the container contents.

7.2. Conditions for safe storage, including any incompatibilities
Keep container below 50°C in a well ventilated place. Secure cylinders to prevent them from falling. Observe all regulations and local requirements regarding storage of containers. Stored containers should be periodically checked for general conditions and leakage. Container valve guards or caps should be in place. Store containers in location free from fire risk and away from sources of heat and ignition. Keep away from combustible materials. Cylinders should be stored in the vertical position and properly secured to prevent falling over. Containers should not be stored in conditions likely to encourage corrosion.

7.3. Specific end use(s)
None.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Exposure limit value

Carbon dioxide

Value type	**value**	**Note**
Great Britain - STEL	15.000 ppm	EH 40/07
Great Britain – LTEL	5.000 ppm	EH 40/07

8.2. Exposure controls
Appropriate engineering controls
A risk assessment should be conducted and documented in each work area to assess the risks related to the use of the product and to select the PPE that matches the relevant risk. The following recommendations should be considered. Product to be handled in a closed system. Gas detectors should be
used when harmful quantities may be released. Keep concentrations well below occupational exposure limits. Oxygen detectors should be used when asphyxiating gases may be released. The substance must be handled in accordance with good industrial hygiene and safety procedures. Consider work permit system e.g. for maintenance activities. Systems under pressure should be regularly checked for leakages. Provide adequate general or local ventilation

Other protection
Wear working gloves and safety shoes while handling containers. EN ISO 20345 Personal protective equipment - Safety footwear.
Respiratory protection
Not required.
Thermal hazards
No precautionary measures are necessary.
Environmental Exposure Controls
Specific risk management measures are not required beyond good industrial hygiene and safety procedures. Refer to local regulations for restriction of emissions to the atmosphere. See section 13 for specific methods for waste gas treatment.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties
General information
Appearance/Colour: Colourless gas.
Odour: None.
Odour threshold:
Mixture not applicable
Melting point: Mixture not applicable
Boiling point: Not known.
Flash point: Not applicable for gases and gas mixtures.
Flammability range: Mixture not applicable
Vapour Pressure 20 °C: Mixture not applicable
Solubility in water: Mixture not applicable
Partition coefficient: n-octanol/water: Mixture not applicable
Autoignition temperature: Mixture not applicable
Explosive properties:
Explosive acc. EU legislation: Not explosive.
Explosive acc. transp. reg.: Not explosive.
Oxidising properties: Not applicable.
Molecular weight: Not known.
Critical temperature: Mixture not applicable
Relative density, liquid (Water=1): Mixture not applicable
Relative density, gas (Air=1): Heavier than air.

9.2. Other information
Not applicable.

SECTION 10: Stability and reactivity

10.1. Reactivity
Unreactive under normal conditions.

10.2. Chemical stability
Stable under normal conditions.

10.3. Possibility of hazardous reactions
None.

10.4. Conditions to avoid

General
High concentrations cause rapid circulatory insufficiency. Symptoms are headache, nausea and vomiting, which may lead to unconsciousness.
In a confined space, displacement of air by Argoshield may cause the exposure limits to be exceeded before the oxygen level drops below 18%.

Acute toxicity
No data available.

Skin corrosion/irritation
No data available.

Serious eye damage/irritation
No data available.

Respiratory or skin sensitisation
No data available.

Germ cell mutagenicity
No data available.

Carcinogenicity
No data available.

Reproductive toxicity
No data available.

STOT-single exposure
No data available.

STOT-repeated exposure
No data available.

Aspiration hazard
Not applicable to gases and gas mixtures

SECTION 12: Ecological information

12.1. Toxicity
Contains CO2 - When discharged in large quantities may contribute to the greenhouse effect.

12.2. Persistence and degradability
Not applicable.

12.3. Bioaccumulative potential
Not applicable.

12.4. Mobility in soil
The product is a gas, not applicable.

Gases in pressure containers excluding those, which are mentioned under 16 05 04
EWC Nr. 16 05 05

SECTION 14: Transport information

ADR/RID

14.1. UN number
1956

14.2. UN proper shipping name
Compressed Gas, N.O.S. (Argon, Carbon Dioxide)

14.3. Transport hazard class(es)
Class: 2
Classification Code: 1A
Labels: 2.2
Hazard number: 20
Tunnel restriction code: (E)
Emergency Action Code: 2TE

14.4. Packing group (Packing Instruction)
P200

14.5. Environmental hazards
None.

14.6. Special precautions for user
None.

IMDG

14.1. UN number
1956

14.2. UN proper shipping name
Compressed Gas, N.O.S. (Argon, Carbon Dioxide)

14.3. Transport hazard class(es)
Class: 2.2
Labels: 2.2
EmS: F-C, S-V

14.4. Packing group (Packing Instruction)
P200

14.5. Environmental hazards
None.

14.6. Special precautions for user
None.

14.4. Packing group (Packing Instruction)
P200

14.5. Environmental hazards
None.

14.6. Special precautions for user
None.

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

Other regulations
Management of Health and Safety at Work Regulations (1999 No. 3242)
The Regulatory Reform (Fire Safety) Order 2005 (2005 No. 1541)
Control of Substances Hazardous to Health Regulations (COSHH, 2002 No. 2677)
Provision and Use of Work Equipment Regulations (PUWER, 1998 No. 2306)
Personal Protective Equipment Regulations (1992 No. 2966)
Control of Major Accident Hazards Regulations (COMAH, 1999 No. 743)
Chemical Hazards Information and Packaging for Supply (CHIP, 1994 No. 3247)
Pressure Systems Safety Regulations (PER, 2000 No. 128)

This Safety Data Sheet has been produced to comply with Regulation (EU) 453/2010.

15.2. Chemical safety assessment
This product is either exempt from REACH, does not meet the minimum volume threshold for a CSR or the CSA has not yet been carried out.

SECTION 16: Other information

Ensure all national/local regulations are observed. Before using this product in any new process or experiment, a thorough material compatibility and safety study should be carried out.
Advice
Whilst proper care has been taken in the preparation of this document, no liability for injury or damage resulting from its use can be accepted. Details given in this document are believed to be correct at the time of going to press.
Further information
Note:
When using this document care should be taken, as the decimal sign and its position complies with rules for the structure and

ISO 10156:2010 Gases and gas mixtures -- Determination of fire potential and oxidizing ability for the selection of cylinder valve outlets.
International Programme on Chemical Safety (http://www.inchem.org/)
Matheson Gas Data Book, 7th Edition.
National Institute for Standards and Technology (NIST) Standard Reference Database Number 69
The ESIS (European chemical Substances 5 Information System) platform of the former European Chemicals Bureau (ECB) ESIS (http://ecb.jrc.ec.europa.eu/esis/).
The European Chemical Industry Council (CEFIC) ERICards.
United States of America's National Library of Medicine's toxicology data network TOXNET (http://toxnet.nlm.nih.gov/index.html)
Substance specific information from suppliers.
EH40 (as amended) Workplace exposure limits.

End of document

Safety data sheet
Carbon dioxide.

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier
Product name
Carbon dioxide.

EC No (from EINECS): 204-696-9
CAS No: 124-38-9
Index-Nr. -
Chemical formula CO2
REACH Registration number:
Listed in Annex IV/V of Regulation (EC) No 1907/2006 (REACH), exempted from registration.

1.2. Relevant identified uses of the substance or mixture and uses advised against
Relevant identified uses
Industrial and professional. Perform risk assessment prior to use.
Uses advised against
Consumer use.

1.3. Details of the supplier of the safety data sheet
Company identification
BOC, Priestley Road, Worsley, Manchester M28 2UT
E-Mail Address ReachSDS@boc.com

1.4. Emergency telephone number
Emergency phone numbers (24h): 0800 111 333

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification acc. to Regulation (EC) No 1272/2008/EC (CLP/GHS)
Press. Gas (Compressed gas) - Contains gas under pressure; may explode if heated.

Classification acc. to Directive 67/548/EEC & 1999/45/EC
Not classified as hazardous to health.
Risk advice to man and the environment
Liquefied gas.

2.2. Label elements
- Labelling Pictograms

- Signal word

Precautionary Statement Storage
P403 Store in a well-ventilated place.

Precautionary Statement Disposal
None.

2.3. Other hazards
Contact with liquid may cause cold burns/frost bite.

SECTION 3: Composition/information on ingredients

Substance / Mixture: Substance.

3.1. Substances
Carbon dioxide.
CAS No: 124-38-9
Index-Nr.: -
EC No (from EINECS): 204-696-9
REACH Registration number:
Listed in Annex IV/V of Regulation (EC) No 1907/2006 (REACH), exempted from registration.
Contains no other components or impurities which will influence the classification of the product.

3.2. Mixtures
Not applicable.

SECTION 4: First aid measures

4.1. Description of first aid measures
First Aid General Information:
Remove victim to uncontaminated area wearing self contained breathing apparatus. Keep victim warm and rested. Call a doctor. Apply artificial respiration if breathing stopped.
First Aid Inhalation:
Remove victim to uncontaminated area wearing self contained breathing apparatus. Keep victim warm and rested. Call a doctor. Apply artificial respiration if breathing stopped.
First Aid Skin / Eye:
In case of frostbite spray with water for at least 15 minutes. Apply a sterile dressing. Obtain medical assistance. Immediately flush eyes thoroughly with water for at least 15 minutes.
First Aid Ingestion:
Ingestion is not considered a potential route of exposure.

4.2. Most important symptoms and effects, both acute and delayed
In high concentrations may cause asphyxiation. Symptoms may include loss of mobility/consciousness. Victim may not be aware of asphyxiation. Low concentrations of CO2 cause increased respiration and headache.

None.

5.3. Advice for fire-fighters
Specific methods
If possible, stop flow of product. Move container away or cool with water from a protected position.
Special protective equipment for fire-fighters
In confined space use self-contained breathing apparatus.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures
Evacuate area. Wear self-contained breathing apparatus when entering area unless atmosphere is proved to be safe. Ensure adequate air ventilation. Prevent from entering sewers, basements and workpits, or any place where its accumulation can be dangerous.

6.2. Environmental precautions
Try to stop release.

6.3. Methods and material for containment and cleaning up
Ventilate area.

6.4. Reference to other sections
See also sections 8 and 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling
Suck back of water into the container must be prevented. Do not allow backfeed into the container. Use only properly specified equipment which is suitable for this product, its supply pressure and temperature. Contact your gas supplier if in doubt. Check regularly tightness of the plant. Refer to supplier's handling instructions. The substance must be handled in accordance with good industrial hygiene and safety procedures. Purge system with dry inert gas (e.g. helium or nitrogen) before gas is introduced and when system is placed out of service. Do not smoke while handling product. Only experienced and properly instructed persons should handle gases under pressure. Protect cylinders from physical damage; do not drag, roll, slide or drop. Never use direct flame or electrical heating devices to raise the pressure of a container. Do not remove or deface labels provided by the supplier for the identification of the cylinder contents. When moving cylinders, even for short distances, use a cart (trolley, hand truck, etc.) designed to transport cylinders. Leave valve protection caps in place until the container has been secured against either a wall or bench or placed in a container stand and is ready for use. Ensure the complete gas system has been (or is regularly) checked for leaks before use. If user experiences any difficulty operating cylinder valve discontinue use and contact

should be stored in the vertical position and properly secured to prevent falling over. Stored containers should be periodically checked for general conditions and leakage. Container valve guards or caps should be in place. Store containers in location free from fire risk and away from sources of heat and ignition. Keep away from combustible materials.

7.3. Specific end use(s)
None.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters
Exposure limit value

Value type	value	Note
Great Britain - STEL	15.000 ppm	EH 40/07
Great Britain - LTEL	5.000 ppm	EH 40/07

8.2. Exposure controls
Appropriate engineering controls
Product to be handled in a closed system. Gas detectors should be used when toxic quantities may be released. Keep concentrations well below occupational exposure limits. Oxygen detectors should be used when asphixiating gases may be released. The substance must be handled in accordance with good industrial hygiene and safety procedures. Consider work permit system e.g. for maintenance activities. Systems under pressure should be regularly checked for leakages. Provide adequate general or local ventilation.
Personal protective equipment
Eye and face protection
Safety eyewear, goggles or face shield to EN166 should be used to avoid exposure to liquid splashes.
Skin protection
Other protection
Wear leather safety gloves and safety shoes when handling cylinders.
Respiratory protection
Not required
Thermal hazards
Not required
Environmental Exposure Controls
Specific risk management measures are not required beyond good industrial hygiene and safety procedures. Refer to local regulations for restriction of emissions to the atmosphere. See section 13 for specific methods for waste gas treatment.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties
General information
Appearance/Colour: Colourless gas.

Sublimation point: -78,5 °C

Critical temperature: 31 °C
Relative density, liquid: 1,03

9.2. Other information
Gas/vapour heavier than air. May accumulate in confined spaces, particularly at or below ground level.

SECTION 10: Stability and reactivity

10.1. Reactivity
Unreactive under normal conditions.

10.2. Chemical stability
Stable under normal conditions.

10.3. Possibility of hazardous reactions
None.

10.4. Conditions to avoid
None.

10.5. Incompatible materials
For material compatibility see latest version of ISO-11114.

10.6. Hazardous decomposition products
Under normal conditions of storage and use, hazardous decomposition products should not be produced.

SECTION 11: Toxicological information

11.1. Information on toxicological effects
General
In high concentrations may cause rapid circulatory insufficiency even at normal levels of oxygen concentration . Symptoms are headache, nausea and vomiting, which may lead to unconsciousness and even death.

SECTION 12: Ecological information

12.1. Toxicity
When discharged in large quantities may contribute to the greenhouse effect.

12.2. Persistence and degradability
Not applicable.

12.3. Bioaccumulative potential
Not applicable.

13.1. Waste treatment methods
Do not discharge into any place where its accumulation could be dangerous. Vent to atmosphere in a well ventilated place. Discharge to atmosphere in large quantities should be avoided. Contact supplier if guidance is required.
EWC Nr. 16 05 05

SECTION 14: Transport information

ADR/RID

14.1. UN number
1013

14.2. UN proper shipping name
Carbon dioxide

14.3. Transport hazard class(es)
Class: 2
Classification Code: 2A
Labels: 2.2
Hazard number: 20
Emergency Action Code: 2T

14.4. Packing group (Packing Instruction)
P200

14.5. Environmental hazards
None.

14.6. Special precautions for user
None.

IMDG

14.1. UN number
1013

14.2. UN proper shipping name
Carbon dioxide

14.3. Transport hazard class(es)
Class: 2.2
Labels: 2.2
EmS: FC, SV

14.4. Packing group (Packing Instruction)
P200

14.5. Environmental hazards
None.

14.3. Transport hazard class(es)
Class: 2.2
Labels: 2.2

14.4. Packing group (Packing Instruction)
P200

14.5. Environmental hazards
None.

14.6. Special precautions for user
None.

Other transport information
Avoid transport on vehicles where the load space is not separated from the driver's compartment. Ensure vehicle driver is aware of the potential hazards of the load and knows what to do in the event of an accident or an emergency. Before transporting product containers ensure that they are firmly secured. Ensure that the cylinder valve is closed and not leaking. Ensure that the valve outlet cap nut or plug (where provided) is correctly fitted. Ensure that the valve protection device (where provided) is correctly fitted. Ensure adequate ventilation. Ensure compliance with applicable regulations.

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture
Seveso Directive 96/82/EC: Not covered.

15.2. Chemical safety assessment
A CSA does not need to be carried out for this product.

SECTION 16: Other information

Ensure all national/local regulations are observed. The hazard of asphyxiation is often overlooked and must be stressed during operator training. Before using this product in any new process or experiment, a thorough material compatibility and safety study should be carried out.
Advice
Whilst proper care has been taken in the preparation of this document, no liability for injury or damage resulting from its use can be accepted. Details given in this document are believed to be correct at the time of going to press.
Further information
Note:
When using this document care should be taken, as the decimal sign and its position complies with rules for the structure and drafting of international standards, and is a comma on the line.
As an example 2,000 is two (to three decimal places) and not two

Safety data sheet
Oxygen, compressed.

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier
Product name
Oxygen, compressed.

EC No (from EINECS): 231-956-9
CAS No: 7782-44-7
Index-Nr. 008-001-00-8
Chemical formula O2
REACH Registration number:
Listed in Annex IV/V of Regulation (EC) No 1907/2006 (REACH), exempted from registration.

1.2. Relevant identified uses of the substance or mixture and uses advised against
Relevant identified uses
Industrial and professional. Perform risk assessment prior to use.
Uses advised against
Consumer use.

1.3. Details of the supplier of the safety data sheet
Company identification
BOC, Priestley Road, Worsley, Manchester M28 2UT
E-Mail Address ReachSDS@boc.com

1.4. Emergency telephone number
Emergency phone numbers (24h): 0800 111 333

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification acc. to Regulation (EC) No 1272/2008/EC (CLP/GHS)
Press. Gas (Compressed gas) - Contains gas under pressure; may explode if heated.
Ox. Gas 1 - May cause or intensify fire; oxidiser.

Classification acc. to Directive 67/548/EEC & 1999/45/EC
O; R8
Contact with combustible material may cause fire.
Risk advice to man and the environment
Compressed gas.

2.2. Label elements
- Labelling Pictograms

Precautionary Statement Response
P370 + P376 In case of fire: Stop leak if safe to do so.

Precautionary Statement Storage
P403 Store in a well-ventilated place.

Precautionary Statement Disposal
None.

2.3. Other hazards
None.

SECTION 3: Composition/information on ingredients

Substance / Mixture: Substance.

3.1. Substances
Oxygen, compressed.
CAS No: 7782-44-7
Index-Nr.: 008-001-00-8
EC No (from EINECS): 231-956-9
REACH Registration number:
Listed in Annex IV/V of Regulation (EC) No 1907/2006 (REACH), exempted from registration.
Contains no other components or impurities which will influence the classification of the product.

3.2. Mixtures
Not applicable.

SECTION 4: First aid measures

4.1. Description of first aid measures
First Aid General Information:
Remove victim to uncontaminated area.
First Aid Inhalation:
Remove victim to uncontaminated area.
First Aid Skin / Eye:
Adverse effects not expected from this product.
First Aid Ingestion:
Ingestion is not considered a potential route of exposure.

4.2. Most important symptoms and effects, both acute and delayed
Continuous inhalation of concentrations higher than 75% may cause nausea, dizziness, respiratory difficulty and convulsion.

4.3. Indication of any immediate medical attention and special treatment needed
None.

Specific methods
If possible, stop flow of product. Move container away or cool with water from a protected position.
Special protective equipment for fire-fighters
None.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures
Evacuate area. Ensure adequate air ventilation. Prevent from entering sewers, basements and workpits, or any place where its accumulation can be dangerous. Eliminate ignition sources. Monitor concentration of released product.

6.2. Environmental precautions
Try to stop release.

6.3. Methods and material for containment and cleaning up
Ventilate area.

6.4. Reference to other sections
See also sections 8 and 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling
Use no oil or grease. Suck back of water into the container must be prevented. Use only properly specified equipment which is suitable for this product, its supply pressure and temperature. Contact your gas supplier if in doubt. Keep away from ignition sources (including static discharges). Refer to supplier's handling instructions. Purge system with dry inert gas (e.g. helium or nitrogen) before gas is introduced and when system is placed out of service. Use only with equipment cleaned for oxygen service and rated for cylinder pressure. Do not smoke while handling product. Only experienced and properly instructed persons should handle gases under pressure. Protect cylinders from physical damage; do not drag, roll, slide or drop. Never use direct flame or electrical heating devices to raise the pressure of a container. Do not remove or deface labels provided by the supplier for the identification of the cylinder contents. When moving cylinders, even for short distances, use a cart (trolley, hand truck, etc.) designed to transport cylinders. Leave valve protection caps in place until the container has been secured against either a wall or bench or placed in a container stand and is ready for use. Ensure the complete gas system has been (or is regularly) checked for leaks before use. If user experiences any difficulty operating cylinder valve discontinue use and contact supplier. Close container valve after each use and when empty, even if still connected to equipment. Never attempt to repair or modify container valves or safety relief devices. Damaged valves should be reported immediately to the supplier. Replace valve outlet

Containers should not be stored in conditions likely to encourage corrosion. Containers should be stored in the vertical position and properly secured to prevent falling over. Stored containers should be periodically checked for general conditions and leakage. Container valve guards or caps should be in place. Store containers in location free from fire risk and away from sources of heat and ignition. Keep away from combustible materials.

7.3. Specific end use(s)
None.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters
No occupational exposure limit.

8.2. Exposure controls
Appropriate engineering controls
Product to be handled in a closed system. The substance must be handled in accordance with good industrial hygiene and safety procedures. Consider work permit system e.g. for maintenance activities. Systems under pressure should be regularly checked for leakages. Provide adequate general or local ventilation. Gas detectors should be used when quantities of oxidising gases may be released.
Personal protective equipment
Eye and face protection
Wear eye protection to EN 166 when using gases.
Skin protection
Other protection
Wear suitable hand, body and head protection. Wear goggles with suitable filter lenses when use is cutting/welding. Avoid oxygen rich (>23,5%) atmospheres. Wear leather safety gloves and safety shoes when handling cylinders.
Respiratory protection
Not required
Thermal hazards
Not required
Environmental Exposure Controls
Specific risk management measures are not required beyond good industrial hygiene and safety procedures. Refer to local regulations for restriction of emissions to the atmosphere. See section 13 for specific methods for waste gas treatment.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties
General information
Appearance/Colour: Colourless gas.
Odour: None.
Melting point: -219 °C

9.2. Other information
Gas/vapour heavier than air. May accumulate in confined spaces, particularly at or below ground level.

SECTION 10: Stability and reactivity

10.1. Reactivity
Unreactive under normal conditions.

10.2. Chemical stability
Stable under normal conditions.

10.3. Possibility of hazardous reactions
Violently oxidises organic material.

10.4. Conditions to avoid
Consider the potential toxicity hazard due to the presence of chlorinated or fluorinated polymers in high pressure (>30 bars) oxygen lines in case of combustion.

10.5. Incompatible materials
Combustible materials. Reducing agents. Organic material. Keep equipment free from oil and grease. For material compatibility see latest version of ISO-11114.

10.6. Hazardous decomposition products
Under normal conditions of storage and use, hazardous decomposition products should not be produced.

SECTION 11: Toxicological information

11.1. Information on toxicological effects
General
No known toxicological effects from this product.

SECTION 12: Ecological information

12.1. Toxicity
No ecological damage caused by this product.

12.2. Persistence and degradability
The substance is naturally occuring.

12.3. Bioaccumulative potential
Not applicable.

12.4. Mobility in soil
The substance is a gas, not applicable.

12.5. Results of PBT and vPvB assessment

SECTION 14: Transport information

ADR/RID

14.1. UN number
1072

14.2. UN proper shipping name
Oxygen, compressed

14.3. Transport hazard class(es)
Class: 2
Classification Code: 1O
Labels: 2.2, 5.1
Hazard number: 25
Emergency Action Code: 2S

14.4. Packing group (Packing Instruction)
P200

14.5. Environmental hazards
None.

14.6. Special precautions for user
None.

IMDG

14.1. UN number
1072

14.2. UN proper shipping name
Oxygen, compressed

14.3. Transport hazard class(es)
Class: 2.2
Labels: 2.2, 5.1
EmS: FC, SW

14.4. Packing group (Packing Instruction)
P200

14.5. Environmental hazards
None.

14.6. Special precautions for user
None.

14.7. Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code
Not applicable.

IATA

14.6. Special precautions for user
None.

Other transport information
Avoid transport on vehicles where the load space is not separated from the driver's compartment. Ensure vehicle driver is aware of the potential hazards of the load and knows what to do in the event of an accident or an emergency. Before transporting product containers ensure that they are firmly secured. Ensure that the cylinder valve is closed and not leaking. Ensure that the valve outlet cap nut or plug (where provided) is correctly fitted. Ensure that the valve protection device (where provided) is correctly fitted. Ensure adequate ventilation. Ensure compliance with applicable regulations.

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture
Seveso Directive 96/82/EC: Listed

15.2. Chemical safety assessment
A CSA does not need to be carried out for this product.

SECTION 16: Other information

Ensure all national/local regulations are observed. Before using this product in any new process or experiment, a thorough material compatibility and safety study should be carried out. Ensure operators understand the hazard of oxygen enrichment.
Advice
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Further information
Note:
When using this document care should be taken, as the decimal sign and its position complies with rules for the structure and drafting of international standards, and is a comma on the line.
As an example 2,000 is two (to three decimal places) and not two thousand, whilst 1.000 is one thousand and not one (to three decimal places).

End of document

MATERIAL SAFETY DATA SHEET

1. CHEMICAL PRODUCT & COMPANY IDENTIFICATION

Rockler SKU: 97594

Product name	**TOP-COTE Aerosol**
Product name(s) covered	V205801 - TOP-COTE Aerosol 10.75 oz (Bulk Pack12 per case) V205805 - TOP-COTE AERO 5.5 OZ BULK-PAK
MSDS name	TOP-COTE Aerosol
CAS number	Mixture
Generic description	Aerosol Spray Flammable
Manufacturer	Bostik, Inc. 211 Boston Street Middleton , MA 01949 USA
24 hour emergency assistance	Telephone: 1-800-227-0332
General assistance	Telephone: 1-978-777-0100
MSDS assistance	Telephone: 1-414-607-1407

2. COMPOSITION / INFORMATION ON INGREDIENTS

Component(s)	CAS #	Percent
Isooctane	540-84-1	7 - 13
Isobutane	75-28-5	5 - 10
Acetone	67-64-1	30 - 60
Propane	74-98-6	10 - 30

3. HAZARDS IDENTIFICATION

Emergency overview

Product is a flammable aerosol. Pressurized container may explode when exposed to heat or flame. Contact may cause skin and eye irritation. Mist may cause nose and throat irritation. Ingestion will cause nausea, vomiting, pain, upset stomach, and diarrhea.

Potential health effects

Skin

This product may cause irritation to the skin. Prolonged or repeated contact with this product may dry and/or defat the skin. This product may be harmful if it is absorbed through the skin. Contact with liquefied gas may cause frostbite.

Eyes

Liquid or vapors may irritate the eyes. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Eye contact may lead to permanent damage if not treated promptly.

Inhalation

This product may cause irritation to the respiratory system. Excessive inhalation of this material causes headache, dizziness, nausea and incoordination. Possibly unconsciousness and asphyxiation.

Ingestion

This product is harmful if swallowed. Ingestion can cause gastrointestinal irritation, nausea, vomiting and diarrhea.

Target organs

Central Nervous System. Lungs. Skin. Eyes.

Signs and symptoms of overexposure

Signs and symptoms of overexposure to this product include headache, irritation of upper respiratory tract, asthmatic symptoms, chest tightness, breathing difficulty, coughing, eye irritation, skin irritation, diarrhea.

4. FIRST AID MEASURES

First aid

Skin

For skin contact, wash immediately with soap and water. If irritation persists, get medical attention.

Eye

Immediately flush with plenty of water for at least 15 minutes, holding eyelids open at all times. Get medical attention immediately.

Inhalation

Move person to non-contaminated air. If the affected person is not breathing, apply artificial respiration. Call a physician if symptoms develop or persist.

Ingestion	If the material is swallowed, get immediate medical attention or advice -- Do not induce vomiting. If vomiting occurs naturally, have victim lean forward to reduce risk of aspiration.
Notes to physician	This material, if aspirated into the lungs, may cause chemical pneumonitis; treat the affected person appropriately. If overexposure to the solvents in this product is suspected, testing should include nervous system and brain effects including recent memory, mood, concentration, headaches and altered sleep patterns. Liver and kidney function should be evaluated.

5. FIRE FIGHTING MEASURES

Extinguishing media	Use dry chemical, carbon dioxide, or foam. Use water to cool fire-exposed containers and to protect personnel. Do not direct a solid stream of water or foam into hot, burning pools; this may result in frothing and increase fire intensity.
Basic fire fighting procedures	DANGEROUS when exposed to heat or flame. This material can be ignited by flame or spark under all normal atmospheric conditions. Vapors are heavier than air and may travel along the ground to some distant source of ignition and flash back. Pressurized Container: May explode when exposed to heat or flame. Empty containers may retain product residue including Flammable or Explosive vapors. Do not cut, drill, grind, or weld near full, partially full, or empty product containers.
Dust explosion hazard	None Known
Sensitivity to mechanical impact	Container could potentially burst or be punctured upon mechanical impact, releasing flammable vapors.
Sensitivity to static discharge	Sparks generated by static discharge may ignite this product or its vapors. All containers and equipment must be bonded or grounded to minimize risk.
Unusual fire & explosion hazards	During a fire, irritating and highly toxic gases may be generated during combustion or decomposition. High temperatures can cause sealed containers to rupture due to a buildup of internal pressures. Cool with water.
Fire fighting equipment/instructions	Wear full protective clothing, including helmet, self-contained positive pressure or pressure demand breathing apparatus, protective clothing and face mask.
Flash point	-134 °F (-92.2 °C)

6. ACCIDENTAL RELEASE MEASURES

Emergency action	Evacuate the area promptly and keep upwind of the spilled material. Isolate the spill area to prevent people from entering. Keep upwind of the spilled material and isolate exposure. Wear appropriate protective equipment and clothing during clean-up.
Containment	Stop discharge if safe to do so. Stop material from contaminating soil or from entering sewers or water streams. Cover spills with non-flammable absorbent and place in closed chemical waste containers.
Reporting	See Federal reporting requirements listed in Section 15. We recommend you contact local authorities to determine if there may be other local reporting requirements.

7. HANDLING & STORAGE

For Commercial Use Only - Not Packaged or Labeled for Home Use!

Handling	Keep this product from heat, sparks, or open flame. Avoid getting this material into contact with your skin and eyes. Avoid breathing mists or aerosols of this product. Use this product with adequate ventilation. Do not reuse the empty container.
Storage	Store in a cool, dry, well-ventilated area. Do not handle or store near an open flame, heat or other sources of ignition. Keep out of direct sunlight. Do not store above 120 F (49 C).
Empty container precaution	Attention! Follow label warnings even after container is emptied since empty containers may retain product residues. Do not reuse empty container without professional cleaning for food, clothing, or products for human or animal consumption, or where skin contact can occur.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Engineering controls	Provide local and general exhaust ventilation to effectively remove and prevent buildup of any vapors or mists generated from the handling of this product. Additional area ventilation or local exhaust may be required to maintain air concentrations below recommended exposure limits. Explosion proof exhaust ventilation should be used.
Eye protection	Wear goggles or safety glasses with side shields.
Skin and body protection	Impervious gloves should be used at all times when handling this product. Recommended gloves include rubber, neoprene, nitrile or viton. Use of protective coveralls and long sleeves is recommended.

Exposure limits

ACGIH - Threshold Limits Values - Time Weighted Averages (TLV-TWA)

Acetone	67-64-1	500 ppm TWA
Isobutane	75-28-5	1000 ppm TWA (listed under aliphatic hydrocarbon gases alkane C1-C4)
Propane	74-98-6	1000 ppm TWA (listed under aliphatic hydrocarbon gases alkane C1-C4)

OSHA - Vacated PELs - TWAs

Acetone	67-64-1	750 ppm TWA; 1800 mg/m3 TWA
Propane	74-98-6	1000 ppm TWA; 1800 mg/m3 TWA

9. PHYSICAL & CHEMICAL PROPERTIES

Vapor density	3.4
Target solids	25 %
pH	N/A
Density	0.66 g/cc
Odor threshold	N/A
Octanol/H2O coeff	N/A
Odor	Solvent
Color	None
Physical state	Aerosol
Freeze protect	No
VOC (Volatile Organic Compounds)	357.4 g/l

10. STABILITY & REACTIVITY

Hazardous reactions/decomposition products	Upon decomposition of this product, the following oxides will be produced: Carbon dioxide, carbon monoxide, oxides of sulfur and nitrogen.
Hazardous polymerization	Will not occur.
Conditions to avoid	Keep away from sources of ignition. Avoid contact with Strong Oxidizers, Reducers, Acids and Alkalis.
Stability	Stable under normal conditions.

11. TOXICOLOGICAL INFORMATION

Toxicological data If any toxicological data is available, it will be listed below:

LD50

Toxicology Data - Selected LD50s and LC50s

Acetone	67-64-1	Inhalation LC50 Rat: 76 mg/L/4H; Oral LD50 Rat: 1800 mg/kg; Dermal LD50 Rabbit: 20000 mg/kg
Isobutane	75-28-5	Inhalation LC50 Rat: 658 mg/L/4H
Isooctane	540-84-1	Inhalation LC50 Rat: 37.2 mg/L/4H; Inhalation LC50 Rat: 47.4 mg/L/1H; Oral LD50 Rat: >2500 mg/kg
Propane	74-98-6	Dermal LD50 Rat: 658 mg/kg

Carcinogenicity If this product contains any carcinogens, they will be noted below:

12. ECOLOGICAL INFORMATION

VOC (Volatile Organic Compounds)	357.4 g/l
Ecotoxicological information	Organic solvents produce slight to moderate toxicity to aquatic life. Insufficient data exists to evaluate the effect on plants, birds or land animals.

13. DISPOSAL CONSIDERATIONS

It is the obligation of each user of the product mentioned herein to determine and comply with the requirements of all applicable local, state and federal regulations.

Waste disposal Dispose of waste material according to Local, State, Federal, and Provincial Environmental Regulations. Wastes must be tested using methods described in 40 CFR Part 261 to determine if it meets applicable definitions of hazardous wastes.

14. TRANSPORT INFORMATION

DOT

Basic shipping requirements:	
Proper shipping name	Consumer Commodity
UN number	ORM-D

IATA

Basic shipping requirements:	
Proper shipping name	Aerosols
Hazard class	2.1
UN number	UN1950
Additional information:	
Packaging exceptions	306
Packaging non bulk	None
Packaging bulk	None
Labels required	2.1

IMDG

Basic shipping requirements:	
Proper shipping name	Aerosols
Hazard class	2.1
UN number	UN1950
Additional information:	
Packaging exceptions	306
Labels required	2.1

15. REGULATORY INFORMATION

This MSDS is prepared and distributed pursuant to the Federal Hazard Communication Standard, 29 CFR 1910.1200.

Federal regulations All components are on the U.S. EPA TSCA Inventory List.

CERCLA/SARA - Hazardous Substances and their Reportable Quantities

Acetone	67-64-1	5000 lb final RQ; 2270 kg final RQ
Isooctane	540-84-1	1000 lb final RQ; 454 kg final RQ

TSCA (Toxic Substances Control Act) - Section 12(b) - Export Notification

Carbonyl fluoride	353-50-4	Section 5
Xylenes (o-, m-, p- isomers)	1330-20-7	Section 4

State regulations If this product contains any ingredients listed under California Proposition 65, they will be noted below:

California - Proposition 65 - Carcinogens List

Ethyl benzene	100-41-4	carcinogen, initial date 6/11/04 Trace impurity

International regulations All components are included on the Canadian Domestic Substances List (DSL).

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and contains all the information required by the Controlled Products Regulations.

HMIS Ratings
Health: 2
Flammability: 4
Physical hazard: 0
Personal protection: X

SARA 311/312 HAZARD CATEGORIES
Immediate Hazard - Yes
Delayed Hazard - Yes
Fire Hazard - Yes
Pressure Hazard - Yes
Reactivity Hazard - No

WHMIS status Controlled

WHMIS labeling

WHMIS classification

A - Compressed Gas
B5 - Flammable/Combustible
D2B - Other Toxic Effects-TOXIC

16. OTHER INFORMATION

Disclaimer

The data in this MSDS has been compiled from publicly available sources. This data relates only to the designated product and not to the use of said product in combination with other materials. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards which exist. Responsibility for proper precautions and safe use of the product lies with the user. All data in this MSDS is typical of the product as a whole, and does not represent any individual lot or batch, therefore, Bostik, Inc. makes no warranty about the accuracy of the data herein and assumes no liability for the use of such data. It is the responsibility of the user to comply with all applicable federal, state, and local laws and regulations.

Issue date 03/06/2006

Prepared by Michael Simon

Supercedes 03/03/2006

RECKITT BENCKISER

Material Safety Data Sheet

Section 1. Product and Company Identification

Product Name	**BRASSO® MULTI-PURPOSE METAL POLISH**
Product Description	Multi-purpose metal polish for cleaning and polishing brass, pewter, chrome, copper and stainless steel.
Manufacturer	Reckitt Benckiser North America, Inc. Morris Corporate Center IV 399 Interpace Parkway (P.O. Box 225) Parsippany, N.J. 07054-0225
Product Identifier	Not available.
Item Number	0024708
Formula Number	1341-014 (0024708)
UPC Number	26600-06200 (8 oz.); 26600-76523 (8 oz.); 26600-05315 (1 gal.).

MSDS#	Not available.
Validation Date	**3/24/2005**
Print Date	3/24/2005

In case of Emergency:	Telephone: 800-228-4722
Transportation Emergencies:	Chemtrec: 1-800-424-9300 (U.S. & Canada) Outside the U.S & Canada (North America), call: 703-527-3887

Section 2. Composition and Information on Ingredients

Name	CAS #	% by Weight	Exposure Limits : TLV/PEL
1) PETROLEUM DISTILLATE (STODDARD SOLVENT)	8052-41-3	25-30	TWA: 525 (mg/m^3) from ACGIH (TLV) [United States] TWA: 100 (ppm) from ACGIH (TLV) [United States] TWA: 2900 (mg/m^3) from OSHA (PEL) [United States] TWA: 500 (ppm) from OSHA (PEL) [United States]
2) DESULFURIZED PETROLEUM DISTILLATE	64742-81-0	30-35	Not available.
3) SILICA, CRYSTALLINE	14808-60-7	9-12	TWA: 0.1 (mg/m^3) from ACGIH (TLV) [United States] Respirable. TWA: 0.3 (mg/m^3) from OSHA (PEL) [United States] Respirable.
4) KAOLIN	1332-58-7	10-15	TWA: 5 (mg/m3) from OSHA (PEL) [United States] Respirable. TWA: 15 (mg/m3) from OSHA (PEL) [United States] Total Dust. TWA: 2 (mg/m3) from ACGIH (TLV) [United States] Respirable.
5) OLEIC ACID	112-80-1	7-10	Not available.
6) AMMONIUM HYDROXIDE	1336-21-6	2-3	Not available.

Section 3. Hazards Identification

Emergency Overview

DANGER: HARMFUL OR FATAL IF SWALLOWED. EYE AND SKIN IRRITANT. VAPORS HARMFUL IF INHALED. COMBUSTIBLE. Do not ingest. DO NOT inhale. DO NOT breathe dust from dried product. Use product in a well ventilated area. Keep away from heat, sparks and flame. Keep container closed when not in use. Contains petroleum distillates and silica.

Section 4. First Aid Measures

Eye Contact	Immediately rinse eyes with water, remove any contact lenses, and continue rinsing eyes for fifteen minutes. Call a doctor or poison control center if symptoms persist.
Skin Contact	In case of skin contact, wash skin thoroughly with soap and water. If irritation persists, consult a physician.
Inhalation	Remove to fresh air. If irritation persists or there is any trouble breathing, get immediate medical attention.
Ingestion	If swallowed, DO NOT induce vomiting! Rinse mouth with water. IMMEDIATELY contact a physician or poison control center . NEVER give an unconscious person anything to ingest.

Section 5. Fire and Explosion Data

Flammability	Combustible. See Section 14 for any Shipping Classifications.
Flash Point	CLOSED CUP: 41.5°C (106.7°F). (Setaflash.)
Explosive Limits in Air	Not available.
Products of Combustion	Not available.
Fire and Explosion Hazards	Keep away from heat, sparks or open flame.
Fire Fighting Media and Instructions	Use water fog, foam, dry chemical or carbon dioxide. Product will float and can be reignited on surface of water.
Special Fire Fighting Instructions	The use of a direct stream of water can spread burning liquid. Wear self-contained breathing apparatus and full protective clothing appropriate for fighting a chemical fire.

Section 6. Accidental Release Measures

Accidental Spill	Small spills: Soak up with an inert absorbent material and dispose of in an appropriate waste container. Wipe surface residue with dry paper towels and discard into trash. Large spills should be diked, contained and collected for later disposal according to local, state or federal regulations.

Section 7. Handling and Storage

Handling and Storage	DANGER: HARMFUL OR FATAL IF SWALLOWED. EYE AND SKIN IRRITANT. VAPORS HARMFUL IF INHALED. COMBUSTIBLE. Do not ingest. DO NOT inhale. DO NOT breathe dust from dried product. Use product in a well ventilated area. Keep away from heat, sparks and flame. Keep container closed when not in use. Contains petroleum distillates and silica. Store in an area inaccessable to children and pets. Close container after each use. KEEP OUT OF REACH OF CHILDREN.

Section 8. Exposure Controls/Personal Protection

Ventilation Requirements	None normally required. Use sufficient ventilation to keep hazardous ingredients below their Threshold Limit Values (see Section #2) during major spills, clean-up or fire operations.
Eye Protection	Avoid contact with eyes. Emergency responders should wear full eye and face protection.

Section 9. Physical and Chemical Properties

Description	Liquid. (Slightly viscous. Opaque liquid.)
pH	Not applicable.
Boiling/Condensation Point	82.22 - 93.33° C (180 - 200° F)
Specific Gravity	0.97 (Water = 1)
Vapor Pressure	Not available.
Vapor Density	Not available.
Viscosity	Not available.
Solubility	Insoluble.
Physical Chemical Comments	Not available.

Odor	Ammoniacal.
Color	Beige to Tan. (Light.)

Section 10. Stability and Reactivity Data

Chemical Stability	The product is stable.
Conditions of Instability	Keep away from heat and open flame.
Incompatibility with Various Substances	Strong oxidizing agents.
Hazardous Decomposition Products	Carbon monoxide, carbon dioxide and unidentified organic compounds.
Hazardous Polymerization	Will not occur.

Section 11. Toxicological Information

Exposure effects

Eye Contact	Eye irritant.
Skin Contact	Skin irritant.
Inhalation	Harmful if inhaled.
Ingestion	May be harmful or fatal if swallowed.
Carcinogenicity	Respirable crystalline silica is designated as an IARC Group 1 carcinogen, NTP suspect carcinogen and OSHA suspect carcinogen. However, the silica present in this product is not in a respirable form, when used according to label directions.

Section 12. Ecological Information

Ecotoxicity	Not available.

Section 13. Disposal Considerations

Waste Disposal	Dispose of in accordance with local, state and federal regulations.

Section 14. Transport Information

DOT Classification	Not regulated (Non Bulk Road / Rail) see 49 CFR 173.150 (f) (2) (3).
Proper Shipping Name	Not applicable.
DOT Identification Number	Not applicable.
Packing Group	Not applicable.
Maritime Transportation	Not applicable.
Hazardous Substances Reportable Quantity	Not applicable.
Special Provisions for Transport	IMDG / IMO: See IMDG Code and EMS = F-E, S-E. ICAO / IATA: See DG List.
TDG Classification	Not regulated (Non Bulk Road / Rail) see TDG Part 2.17.2 & Part 23.2.
ADR Classification	Not applicable.
IMDG Classification	UN 1993, Flammable Liquid, N.O.S. (Petroleum Distillate), Class 3, PG III, Limited Quantity.
IATA Classification	UN 1993, Flammable Liquid, N.O.S. (Petroleum Distillate), Class 3, PG III

Section 15. Regulatory Information

Federal and State Regulations

SARA Title III, Section 313 Toxic Chemical Notification & Release Reporting:

1) AMMONIUM HYDROXIDE	Not available.	2-3	Not avai

California Proposition 65: This product contains the following ingredients which require a warning under the Safe Drinking Water & Toxic Enforcement Act:

1) SILICA, CRYSTALLINE	Not available.	10.5	Not avai

Other Classifications

WHMIS (Canada) Not a WHMIS controlled product.

Section 16. Other Information

HMIS (U.S.A.)

Health Hazard	2
Fire Hazard	2

National Fire Protection Association (U.S.A.)

Health

Fire Hazard

Reactivity