CRC MATERIAL SAFETY DATA SHEET

Section 1: Product & Company Identification

Product Name: CRC Seal Coat® Clear Urethane Coating (aerosol)

Product Number (s): 18411

Product Use: Electrical coating

Manufacturer / Supplier Contact Information:

In United States: CRC Industries, Inc. 885 Louis Drive Warminster, PA 18974 <u>www.crcindustries.com</u> 1-215-674-4300(General) (800) 521-3168 (Technical) (800) 272-4620 (Customer Service) In Canada: CRC Canada Co. 2-1246 Lorimar Drive Mississauga, Ontario L5S 1R2 <u>www.crc-canada.ca</u> 1-905-670-2291 In Mexico: CRC Industries Mexico Av. Benito Juárez 4055 G Colonia Orquídea San Luís Potosí, SLP CP 78394 www.crc-mexico.com 52-444-824-1666

24-Hr Emergency - CHEMTREC: (800) 424-9300 or (703) 527-3887

Section 2: Hazards Identification

Emergency Overview

DANGER: Extremely Flammable. Harmful or Fatal if Swallowed. Vapor Harmful. Contents Under Pressure. Appearance & Odor: Clear viscous liquid, solvent odor.

Potential Health Effects:

ACUTE EFFECTS:

EYE: May cause moderate eye irritation and moderate corneal injury. Vapors may irritate eyes.

- SKIN: Prolonged contact may cause irritation or defatting of the skin.
- INHALATION: May cause nose and throat irritation. May cause nervous system depression characterized by the following progressive steps: headache, dizziness, nausea, staggering gait, confusion, unconsciousness. Reports have associated repeated and prolonged overexposure to solvents with permanent brain and nervous system damage. Eye watering, headaches, nausea, dizziness and loss of coordination are signs that solvent levels are too high.
- INGESTION: If aspirated (liquid enters the lungs), it may be rapidly absorbed through the lungs and result in injury to other body systems. May cause gastro-intestinal distress.
- CHRONIC EFFECTS: Repeated and prolonged overexposure to solvents may lead to permanent brain and nervous system damage.
- TARGET ORGANS: liver, kidney, central nervous system

Medical Conditions Aggravated by Exposure: respiratory and skin conditions

See Section 11 for toxicology and carcinogenicity information on product ingredients.

Section 3: Composition/Information on Ingredients

COMPONENT	CAS NUMBER	% by Wt.
Liquefied petroleum gas	68476-86-8	20 – 30
Acetone	67-64-1	20 – 30
Hexane isomers	64742-49-0	15 – 20
Oil modified urethane	proprietary	10 – 15
Xylene	1330-20-7	10 – 15
1-methoxy-2-propanol acetate	108-65-6	2-6
Ethylbenzene	100-41-4	2.75
n-hexane	110-54-3	0.5

Section 4: First Aid Measures

Eye Contact:	Immediately flush with plenty of water for 15 minutes. Call a physician if irritation persists.
Skin Contact:	Remove contaminated clothing and wash affected area with soap and water. Call a physician if irritation persists. Wash contaminated clothing prior to re-use.
Inhalation:	Remove person to fresh air. Keep person calm. If not breathing, give artificial respiration. If breathing is difficult give oxygen. Call a physician.
Ingestion:	Do NOT induce vomiting. Contact a physician immediately. Give victim a glass of water to drink. Do not give anything by mouth to an unconscious person.
Note to Physicians:	Aspiration hazard. A component of this material has produced hyperglycemia and ketosis following substantial ingestion.

Section 5: Fire-Fighting Measures

Flammable Properties: Th	This product is extremely flammable in accordance with aerosol flammability definitions.				
(S	ee 16 CFR 1500.3(c)(6)).				
Flash Point:	-4°F / -20°C (TCC)	Upper Explosive Limit:	10.0 (estimate)		
Autoignition Temperature:	ND	Lower Explosive Limit:	1.0 (estimate)		

Fire and Explosion Data:

Suitable Extinguishing Media: Alcohol foam, dry chemical, carbon dioxide or any Class B fire extinguisher

Products of Combustion: Fumes, smoke and oxides of carbon

Explosion Hazards: Aerosol containers, when exposed to heat from fire, may build pressure and explode. Vapors may accumulate in a confined space and create a flammable atmosphere.

Protection of Fire-Fighters: Firefighters should wear self-contained, NIOSH-approved breathing apparatus for protection against suffocation and possible toxic decomposition products. Proper eye and skin protection should be provided. Use water spray to keep fire-exposed containers cool and to knock down vapors which may result from product decomposition.

Section 6: Accidental Release Measures

Personal Precautions: Use personal protection recommended in Section 8.

- Environmental Precautions: Take precautions to prevent contamination of ground and surface waters. Do not flush into sewers or storm drains.
- Methods for Containment & Clean-up: Eliminate all sources of ignition. Dike area to contain spill. Ventilate the area with fresh air. If in confined space or limited air circulation area, clean-up workers should wear appropriate respiratory protection. Recover or absorb spilled material using an absorbent designed for chemical spills. Place used absorbents into proper waste containers.

Section 7: Handling and Storage

Handling Procedures:	Avoid prolonged or repeated contact with skin. Avoid inhaling vapors. Use in a well ventilated area. Do not use near open flame, sparks or other sources of ignition. Do not use on energized equipment. Use caution around energized equipment. The metal container will conduct electricity if it contacts a live source. This may result in injury to the user from electrical shock and/or flash fire. For product use instructions, please see the product label.
Storage Procedures:	Store in a cool dry area out of direct sunlight. Aerosol cans must be maintained below 120°F /

49°C to prevent cans from rupturing. Do not store near heat sources or incompatible materials.

Aerosol Storage Level: III

Section 8: Exposure Controls/Personal Protection

Exposure Guidelines:

	05	SHA	AC	GIH	0	THER	
COMPONENT	TWA	STEL	TWA	STEL	TWA	SOURCE	UNIT
Liquefied petroleum gas	1000	NE	1000	NE	NE		ppm
Acetone	750 (v)	1000 (v)	500	750	NE		ppm
Hexane isomers	500 (v)	1000 (v)	500	1000	NE		ppm
Oil modified urethane	NE	NE	NE	NE	NE		
Xylene	100	NE	100	150	NE		ppm
1-methoxy-2-propanol acetate	NE	NE	NE	NE	NE		
Ethylbenzene	100	NE	100	125	NE		ppm
n-hexane	500	NE	50 (s)	NE	NE		ppm
N.E. – Not Established (c) – ceiling (s) – skin (v) – vacated							

Controls and Protection:

Engineering Controls: Area should have ventilation to provide fresh air. Local exhaust ventilation is generally preferred because it can control the emissions of the contaminant at the source, preventing dispersion into the general work area. Use mechanical means if necessary to maintain vapor levels below the exposure guidelines. If working in a confined space, follow applicable OSHA regulations.

Respiratory Protection: None required for normal work where adequate ventilation is provided. If engineering controls are not feasible or if exposure exceeds the applicable exposure limits, use a NIOSH-approved

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	cartridge respirator with organic vapor cartridge. Air monitoring is needed to determine actual employee exposure levels. Use a self-contained breathing apparatus in confined spaces and for emergencies.
Eye/face Protection:	For normal conditions, wear safety glasses. Where there is reasonable probability of liquid contact, wear splash-proof goggles.
Skin Protection:	Use protective gloves such as nitrile, rubber, or PVA. Also, use full protective clothing if there is prolonged or repeated contact of liquid with skin.

Section 9: Physical and Chemical Properties

Physical State: liquid, viscous				
Color: clear				
Odor: solvent				
Odor Threshold: ND				
Specific Gravity: 0.717				
Initial Boiling Point: 150°F / 66°C				
Freezing Point: ND				
Vapor Pressure: ND				
Vapor Density: > 1 (a	(air = 1)			
Evaporation Rate: fast				
Solubility: slight in water				
Coefficient of water/oil distribution:	ND			
pH: NA				
Volatile Organic Compounds: wt c	<u>%</u> : 63.9 <u>g/L</u> :	457.8	<u>lbs./gal:</u>	3.8

Section 10: Stability and Reactivity

Stability: Stable		
Conditions to Avoid:	Temperatur	e extremes, sources of ignition
Incompatible Materials:	Oxidizing m	aterials such as peroxides, chlorates, and permanganates; strong acids or alkalis
Hazardous Decompositio	n Products:	Oxides of carbon and various hydrocarbons
Possibility of Hazardous F	Reactions:	No

Section 11: Toxicological Information

Long-term toxicological studies have not been conducted for this product. The following information is available for components of this product.

Acute Toxicity:

<u>Component</u>	Oral LD50 (rat)	Dermal LD50 (rabbit)	Inhalation LC50 (rat)
Liquefied petroleum gas	No data	No data	658 mg/L/4H
Acetone	5800 mg/kg	> 15,800 mg/kg	> 16,000 ppm/4H
Hexane isomers	> 5000 mg/kg	> 2000 mg/kg	No data
Oil modified urethane	No data	No data	No data
xylene	3523 mg/kg	> 2000 mg/kg	6700 ppm/4H
1-methoxy-2-propanol acetate	> 5000 mg/kg	> 2000 mg/kg	5320 ppm/4H
ethylbenzene	3500 mg/kg	> 2000 mg/kg	4000 ppm/4H
n-hexane	28,710 mg/kg	> 3000 mg/kg	48,000 ppm/4H

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Chronic Toxicity:

	OSHA	IARC	NTP		
<u>Component</u>	Carcinogen	Carcinogen	Carcinogen	Irritant	<u>Sensitizer</u>
Liquefied petroleum gas	No	No	No	No	No
Acetone	No	No	No	Eye	No
Hexane isomers	No	No	No	No	Unknown
Oil modified urethane	No	No	No	Unknown	Unknown
xylene	No	No	No	skin	no
1-methoxy-2-propanol acetate	No	No	No	eye	no
ethylbenzene	No	Group 2B	No	eye, skin	Unknown
n-hexane	No	No	No	skin	no

Reproductive Toxicity:	No information available
Teratogenicity:	No information available
Mutagenicity:	No information available
Synergistic Effects:	No information available

Section 12: Ecological Information

Ecological studies have not been conducted for this product. The following information is available for components of this product.

Ecotoxicity:	Acetone - 48 Hr EC50 Daphnia magna: 12600 mg/L			
	n-hexane - 48 H	Ir EC50 water flea: 3.87 mg/L		
Persistence / Degr	adability:	No information available		
Bioaccumulation / Accumulation:		No information available		
Mobility in Environ	ment:	No information available		

Section 13: Disposal Considerations

<u>Waste Classification</u>: The dispensed liquid product is a RCRA hazardous waste for the characteristic of ignitability with a waste code of D001. (See 40 CFR Part 261.20 – 261.33) Empty aerosol containers may be recycled. Liquids should be collected and handled as hazardous waste.

All disposal activities must comply with federal, state, provincial and local regulations. Local regulations may be more stringent than state, provincial or national requirements.

Section 14: Transport Information

US DOT (ground): UN1950, Aerosols, flammable, 2.1, Limited Quantity**

ICAO/IATA (air): UN1950, Aerosols, flammable, 2.1, Limited Quantity

- IMO/IMDG (water): UN1950, Aerosols, 2.1, Limited Quantity
- Special Provisions: **This product can be classified and labeled as 'Consumer Commodity, ORM-D' for domestic ground shipping until January 1, 2014. If shipping as limited quantity by ground, note that shipping papers are not required.

Section 15: Regulatory Information

U.S. Federal Regulations:

Toxic Substances Control Act (TSCA):

All ingredients are either listed on the TSCA inventory or are exempt.

Comprehensive Environmental Response, Compensation and Liability Act (CERCLA):

Reportable Quantities (RQ's) exist for the following ingredients: acetone (5000 lbs), xylene (100 lbs) n-hexane (5000 lbs), ethylbenzene (1000 lbs)

Spills or releases resulting in the loss of any ingredient at or above its RQ require immediate notification to the National Response Center (800-424-8802) and to your Local Emergency Planning Committee.

Superfund Amendments Reauthorization Act (SARA) Title III: Section 302 Extremely Hazardous Substances (EHS): None

Section 311/312 Hazard Categories:	Fire Hazard	Yes
_	Reactive Hazard	No
	Release of Pressure	Yes
	Acute Health Hazard	Yes
	Chronic Health Hazard	Yes

Section 313 Toxic Chemicals: This product contains the following substances subject to the reporting requirements of Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 and 40 CFR Part 372:

xylene (<15%), ethylbenzene (2.75%), n-hexane (0.5%)

Clean Air Act:

Section 112 Hazardous Air Pollutants (HAPs): xylene, ethylbenzene, n-hexane

Occupational Safety and Health Administration:

This product is regulated by the Hazard Communications Standard.

U.S. State Regulations:

California Safe Drinking Water and Toxic Enforcement Act (Prop 65):

This product may contain the following chemicals known to the state of California to cause cancer, birth defects or other reproductive harm: ethylbenzene

Consumer Products VOC Regulations: This product is not regulated.

State Right to Know:

New Jersey:110-54-3, 67-64-1, 8052-41-3, 64742-49-0, 1330-20-7, 100-41-4Pennsylvania:110-54-3, 67-64-1, 8052-41-3, 64742-49-0, 1330-20-7, 100-41-4Massachusetts:110-54-3, 67-64-1, 8052-41-3, 64742-49-0, 1330-20-7, 100-41-4Rhode Island :110-54-3, 67-64-1, 8052-41-3, 64742-49-0, 1330-20-7, 100-41-4

Canadian Regulations:

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 Hazard Class: A, B5, D2A, D2B

Canadian DSL Inventory: All ingredients are either listed on the DSL Inventory or are exempt.

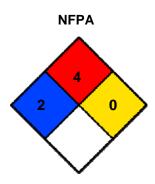
European Union Regulations:

RoHS Compliance: This product is compliant with Directive 2002/95/EC of the European Parliament and of the Council of 27 January 2003. This product does not contain any of the restricted substances as listed in Article 4(1) of the RoHS Directive.

Additional Regulatory Information: None

Section 16: Other Information

HMIS® (II)	
Health:	2
Flammability:	4
Reactivity:	0
PPE:	В



Ratings range from 0 (no hazard) to 4 (severe hazard)

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Changes since last revision: formula change

The information contained in this document applies to this specific material as supplied. It may not be valid for this material if it is used in combination with any other materials. This information is accurate to the best of CRC Industries' knowledge or obtained from sources believed by CRC to be accurate. Before using any product, read all warnings and directions on the label. For further clarification of any information contained on this MSDS consult your supervisor, a health & safety professional, or CRC Industries.

- ACGIH: American Conference of Governmental Industrial Hygienists
- **Chemical Abstract Service** CAS:
- CFR: Code of Federal Regulations
- Department of Transportation DOT:
- DSL: Domestic Substance List
- grams per Liter g/L:
- HMIS: Hazardous Materials Identification System
- IARC: International Agency for Research on Cancer
- International Air Transport Association IATA:
- International Civil Aviation Organization ICAO:
- IMDG: International Maritime Dangerous Goods
- IMO: International Maritime Organization
- lbs./gal: pounds per gallon Lethal Concentration
- LC:
- LD: Lethal Dose

Not Applicable
Not Determined
National Institute of Occupational Safety & Health
National Fire Protection Association
National Toxicology Program
Occupational Safety and Health Administration
Pensky-Martens Closed Cup
Personal Protection Equipment
Parts per Million
Restriction of Hazardous Substances
Short Term Exposure Limit
Tag Closed Cup
Time Weighted Average
Workplace Hazardous Materials Information
System