

MATERIAL SAFETY DATA SHEET

Product: Crystalbond 555-HMP
Revision Date: 1/03/2012

1. MATERIAL IDENTIFICATION

Product Name: Crystalbond 555-HMP

Product Description: Pale Yellow, Solid Stick, Mild Odor, Nonionic Surfactant, Alkyl Phenol Ethoxylate
Product Use: Temporary Mounting Adhesive

Manufacturer: Aremco Products, Inc.
707-B Executive Blvd.
Valley Cottage, NY 10989

Telephone: 845-268-0039
Emergency Phone: 845-268-0039 or Infotrac (24/7) 800-535-5053

2. COMPOSITION

Ingredient	CAS #	ACGIH TLV (mg/m ³)	OSHA PEL (mg/m ³)
Nonylphenol 100 moles ethoxylate	9016-45-9	10	N/E

3. HAZARDS IDENTIFICATION

Primary Route of Exposure: Eye, skin, and inhalation.

Eye Contact: May cause irritation, experienced as mild discomfort and seen as slight excess redness of the eye.

Skin Contact: Brief contact may cause slight irritation. Acute (short term) adverse effects are not expected from brief skin contact.

Inhalation Acute: Dust may cause irritation of the nose and throat. Overexposure to high concentrations of dust may cause respiratory irritation, experienced as coughing and difficulty breathing.

Ingestion Acute: Moderately toxic. May cause abdominal discomfort, nausea, vomiting, and diarrhea.

Chronic Hazards: No adverse effects have been documented in humans as a result of chronic exposure. Not listed on NTP, IARC or OSHA as carcinogen.

Physical Hazards: Hot wax can cause burns to eyes and skin. Spilled material is slippery. Dries to form a waxy film.

HMIS: Health: 1
Flammability: 1
Reactivity: 0
Personal Protection: H

4. FIRST AID MEASURES

Eye Exposure:
Hold eyelids open and flush with a steady, gentle stream of water for at least 15 minutes. Seek immediate medical attention, preferably with an ophthalmologist. If a physician is not immediately available, eye irrigation should be continued for an additional 15 minutes. Hot fluid product: Cool burns with plenty of low-pressure water and get immediate medical attention.

Skin Exposure:
Immediately wipe excess material off skin with a dry cloth then wash with plenty of soap and water for at least 5 minutes. Seek medical attention if irritation develops or persists. Remove contaminated clothing and shoes and clean thoroughly before re-use. Hot Fluid: Immediately cool skin with water and cold packs for at least 15 minutes. Do not put ice directly on skin. Do not attempt to remove solidified wax from the skin as severe tissue damage may result. Get immediate medical attention.

Inhalation:
Remove from immediate source of exposure and assure that victim is breathing. If not breathing, administer cardio-pulmonary resuscitation (CPR). If breathing is difficult, administer oxygen if available. Seek medical attention.

Ingestion:

If swallowed, do not induce vomiting. If victim is conscious and alert, give 1-2 glasses of water to drink. Do not give anything by mouth to an unconscious person. Seek medical attention immediately. Do not leave victim unattended. To prevent aspiration of swallowed product, lay victim on side with head lower than waist. Vomiting may occur spontaneously. If vomiting occurs and the victim is conscious, give water to further dilute the chemical.

Medical Conditions Possibly Aggravated by Exposure:

Inhalation of product may aggravate existing chronic respiratory problems such as asthma, emphysema or bronchitis. Skin contact may aggravate existing skin disease.

5. FIRE FIGHTING MEASURES

Flash Point:	275 °C (527 °F)
Flammable Limits:	Not determined.
Extinguishing Media:	Use water spray, dry chemical, foam, or carbon dioxide to extinguish flames. Use water spray to cool fire-exposed containers. Water or foam may cause frothing.
Special Fire Fighting Procedures:	Firefighters should wear NIOSH/MSHA approved positive pressure breathing apparatus with full face-piece and full chemical resistant protective clothing. Dike area to prevent runoff and contamination of water sources. Dispose of fire control water later.
Unusual Fire and Explosion Hazards:	None.

6. ACCIDENTAL RELEASE MEASURES

Personal Protection:	Wear chemical goggles, body-covering protective clothing, chemical resistant gloves, and rubber boots. Use NIOSH approved respirator where mist occurs.
Spill Cleanup:	Avoid breathing dust. Use vacuuming or sweeping compound for cleanup. Do not dry sweep or use methods that increase dusting. Prevent entry into sewers and waterways. Flush area with water to complete cleanup.

7. HANDLING AND STORAGE

Handling:	Avoid contact with eyes, skin and clothing. Avoid breathing dust and vapors generated when melted. Keep container closed. Promptly clean residue from closures with cloth dampened with water. Promptly clean up spills.
Storage:	Store in an area that is cool, dry, and well ventilated. Water contamination should be avoided. Store in clean plastic or steel containers.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Engineering Controls:	Use with adequate ventilation. Keep containers closed. Safety shower and eyewash fountain should be within direct access.
Respiratory Protection:	Airborne concentrations should be kept to lowest levels possible. If vapor, mist or dust is generated, appropriate personal protection equipment and local ventilation controls must be employed. If exposure limits are exceeded and local ventilation is unavailable, a supplied-air respirator or a self-contained NIOSH-approved dust and mist respirator is required.
Skin Protection:	Wear body-covering protective clothing and gloves.
Eye Protection:	Wear chemical goggles.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Solid
Color:	Pale Yellow
Odor:	Mild Odor
pH:	7
Specific Gravity, g/cc	1.08
Water Solubility:	Soluble
Melting Point:	136-145 °F
Boiling Point:	Not Determined
Vapor Pressure:	Not Applicable
Vapor Density (air=1):	> 1
VOC Content, g/l:	Not Determined

10. STABILITY AND REACTIVITY

Chemical Stability: This material is stable under all conditions of use and storage.
Conditions to Avoid: None.
Materials to Avoid: None.
Hazardous Decomposition Products: Toxic levels of carbon monoxide, carbon dioxide, irritating aldehydes and ketones may be formed on burning. Heating in air may produce irritating aldehydes, acids, and ketones.
Hazardous Polymerization: Will not occur.

11. TOXICOLOGICAL INFORMATION

Animal Toxicity Data: Oral: LD₅₀ Believed to be > .5.00 g/kg (rat) practically non-toxic
Inhalation: Not determined
Dermal: LD₅₀ Believed to be > 2.00 g/kg (rabbit) practically non-toxic

Estimation of Irritation (Species): Skin: (Draize) Believed to be > .50-3.00/8.0 (rabbit) slightly irritating
Eyes: (Draize) Believed to be > 15.00-25.00/110 (rabbit) slightly irritating.
Sensitization: Not determined

Other: This product may contain residual (less than 100 ppm) concentrations of ethylene oxide. Ethylene oxide causes tumors in laboratory animals.

12. ECOLOGICAL INFORMATION

Aquatic Toxicity: Not determined
Mobility: Not determined
Persistence & Biodegradability: Not determined
Potential to Bioaccumulate: Not determined

13. DISPOSAL CONSIDERATIONS

Disposal Method: Dispose in accordance with federal, state and local regulations and permits.

14. TRANSPORTATION INFORMATION

DOT UN Status: The material is not a regulated hazardous material for transportation.

15. REGULATORY INFORMATION

U.S. Federal Regulations

TSCA: All ingredients of this material are listed on the TSCA inventory.

CERCLA:	Chemical Name	CAS Number	Range in %	RQ
	Residual ethylene oxide (typical)	75-21-8	0.001	10

SARA Title III

Sections 302, 304, 313:	Chemical Name	CAS Number	Range in %	TPQ	RQ
	Residual ethylene oxide (typical)	75-21-8	0.001	1000	10

Sections 311, 312:

Hazard Classes	Yes/No
Fire Hazard	No
Reactivity Hazard	No
Pressure Hazard	No
Immediate Hazard	Yes
Delayed Hazard	No

<u>International Inventory</u>	<u>Status</u>
Canada (DSL)	Yes
Europe (EINECS/ELINCS)	Not determined
Australia (AICS)	Yes
Japan (MITI)	Not determined
South Korea (KECL)	Yes

16. OTHER INFORMATION

NFPA: Health:	1
Flammability:	1
Reactivity:	0

Key Legend Information

ACGIH	American Conference of Governmental Industrial Hygienists
ARD	International Agency for Research on Cancer
CAS	Chemical Abstract Service
CERCLA	Comprehensive Environmental Response, Compensation & Liability Act
DSL	Domestic Substance List
HMIS	Hazardous Materials Identification System
ND	Not Determined
NE	Not Established
NFPA	National Fire Protection Association
NIOSH	National Institute for Occupational Safety & Health
NTP	National Toxicology Program
OSHA	Occupational Safety and Health Administration
PEL	Permissible Exposure Limit
RTECS	Registry of Toxic Effects of Chemical Substances
SARA	Superfund Amendments & Reauthorization Act
SARA Title III	Emergency Planning & Community Right to Know Act
SARA Section 302	Extremely Hazardous Substances
SARA Section 304	Emergency Release
SARA Section 311	MSDS/List of Chemicals & Hazardous Inventory
SARA Section 312	Emergency & Hazardous Inventory
SARA Section 313	Toxic Chemicals & Release Reporting
STEL	Short Term Exposure Limit
TLV	Threshold Limit Value
TWA	Time Weighted Average

Disclaimer: The information contained herein is based on data taken from sources believed to be both current and reliable at the time of publication. Arengo Products, Inc. makes no warranty, expressed or implied, as to the accuracy of this MSDS and assumes no liability arising from its use by others. Compliance with all applicable Federal, State and Local laws and regulations remains the responsibility of the user.