

Material Safety Data Sheet

IMPORTANT NOTICE: This Material Safety Data Sheet (MSDS) is issued by LA-CO Industries, Inc. (LA-CO) in accordance with the U.S. OSHA Hazard Communication Standard, Canadian WHMIS Controlled Products Regulations, British CHIP2 regulation 6, Australian NMRCWHS and ANSI Z400.1-1993 guidelines. The information contained herein must not be altered, deleted or added to, with the exception of adding supplier/importer information in the space provided. LA-CO has no objection to its MSDS being copied if: a) the copy is made for safety-related purposes; and b) no alterations or amendments are made to the text or format of the MSDS, with the exception of adding supplier/importer information in the space provided. LA-CO does not guaranty the accuracy of any MSDS for our products which: a) is not prepared by LA-CO; b) is not authorized by LA-CO; c) is not in the format originally supplied by LA-CO; or d) has otherwise been amended or altered by a third party, with the exception of adding supplier/importer information in the space provided.

Section 1 Product and Company Identification

Product Name: Thermomelt 463°F / 239°C
Revision #: 2.3 **Date Prepared:** August 17, 2001 **Date Revised:** May 27, 2010

Manufacturer:

LA-CO INDUSTRIES, Inc. *Markal Co.*

1201 Pratt Blvd.

Elk Grove Village, IL, USA 60007-5746

Information Telephone: 847-956-7600

Emergency Telephone: Call CHEMTREC

USA 800-424-9300

International (Call Collect) 1-703-527-3887

Chemical Formula: Mixture

CAS No.: Not Applicable. **Derivation:** Not Applicable.

Synonyms: Not Applicable.

General Use: Temperature Indicator

Supplier/Importer:

Section 2 Composition/Information on Ingredients

<u>Ingredient</u>	<u>CAS No.</u>	<u>%</u>
p-Nitrobenzoic acid ⁶	62-23-7	95

(For Section 2 footnotes: See Section 15)

Section 3 Hazards Identification

EMERGENCY OVERVIEW: WARNING: Harmful if swallowed. Risk of serious damage to eyes. In case of contact with eyes, rinse immediately with plenty of water and seek medical advice. Wear eye/face protection. KEEP OUT OF REACH OF CHILDREN. FOR INDUSTRIAL USE ONLY.

POTENTIAL HEALTH EFFECTS

Primary Exposure Routes: Eyes, Skin, Ingestion, Inhalation

Acute Effects

Eyes: Causes severe eye irritation. Exposure can cause damage to the eyes.

Skin: May cause skin irritation. May be harmful if absorbed through the skin.

Ingestion: Harmful if swallowed.

Inhalation: May be harmful if inhaled. Material may be irritating to mucous membranes and upper respiratory tract.

Chronic Effects

Eyes: None known.

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Skin: None known.

Ingestion: None known.

Inhalation: None known.

Carcinogenicity: This product is or contains a component that is not classifiable as to its carcinogenicity based on ITS IARC, ACGIH, NTP or EPA classification.

Target Organ Effects: Sense organs and special senses (lacrimation)
Behavioral (somnolence)
Behavioral (convulsions or effect on seizure threshold)
Behavioral (aggression)

Medical Conditions Aggravated by Long-Term Exposure: Not Determined.

Other Information: Not Applicable.

Section 4 First Aid

Eye Contact: 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.

Skin Contact: In case of skin contact, flush with copious amounts of water for at least 15 minutes. Remove contaminated clothing and shoes. Call a physician.

Ingestion: If swallowed, wash out mouth with water provided person is conscious. Call a physician. NEVER GIVE ANYTHING BY MOUTH TO AN UNCONSCIOUS OR CONVULSING PERSON.

Inhalation: If inhaled, remove to fresh air. If not breathing give artificial respiration. If breathing is difficult, give oxygen.

Other Information: None known.

Section 5 Fire Fighting Measures

Flash Point (method): Non-liquid product. Not applicable per OSHA Regulations, Standards - 29 CFR 1910.106 (a) (14). (458°F / 237°C for melted product.)

Autoignition Temperature: Not determined.

LEL: Not determined. **UEL:** Not determined.

Flammability Classification: Not determined.

Extinguishing Media: Water spray. Carbon dioxide, dry chemical powder or appropriate foam.

Hazardous Combustion Products: Carbon monoxide, carbon dioxide, nitrogen oxides

Unusual Fire or Explosion Hazards: None known.

Fire-Fighting Instructions/Equipment: Keep personnel removed and upwind of any fire. Wear full fire-fighting turn-out gear (full Bunker gear), and respiratory protection (SCBA).

Section 6 Accidental Release Measures

Use recommended personal protective equipment (see Section 8).

Small and Large Spills: Sweep or scrape up.

Section 7 Handling and Storage

Handling Precautions: Use recommended personal protective equipment (see Section 8). Wash thoroughly after handling.

Storage Requirements: Store away from incompatible chemicals (see Sec. 10). Store in a cool, dry area.

Section 8 Exposure Controls/Personal Protection

Eye/Face Protection: Where contact with the eyes is likely, use chemical goggles. Use a face shield as needed.

Skin/Hand Protection: Use impervious gloves. Use clean protective body-covering clothing as needed to minimize contact with clothing and skin.

Respiratory Protection: Use a NIOSH/MSHA approved air-purifying respirator as needed to control exposure. Consult with respirator manufacturer to determine respirator selection, use, and limitations. Use a positive pressure air supplied respirator for uncontrolled releases or when air purifying respirator limitations may be exceeded. Follow respiratory protection program requirements (OSHA 1910.134 and ANSI Z88.2) for all respirator use.

Other Equipment: Eye wash and safety shower. Suitable for related activities where this product is used.

Engineering Controls: Use process enclosures, local exhaust ventilation, or other engineering controls to control sources of dust or fumes. Suitable for related activities where this product is used.

Administrative Controls: Users of this product must be properly trained and qualified in its use.

Other Information: No food or beverage should be consumed in the work area. Wash thoroughly before eating, drinking, or smoking.

Section 9 Physical and Chemical Properties

Appearance/Physical State: Solid cylindrical stick.

Odor: Low

Odor Threshold (ppm): Not Determined.

Specific Gravity (H₂O = 1): >1

Solubility - Water: Insoluble

- Fat: Soluble

Coefficient of Water/Oil Solubility: <1

Partition Coefficient (n-octanol/water): >1

pH: Not applicable.

Melting Point: 463°F / 239°C

Boiling Point: Not determined.

Vapor Pressure (mm Hg at 20°C): Not determined.

Vapor Density (Air = 1): Not determined.

Evaporation Rate (n-BuAc=1): Not determined.

V.O.C. (U.S. Clean Air Act Section 111): 95%(w/w), 95%(v/v), 8.7 lbs./gal.(U.S.), 1.05 kg/l

Flash Point (method): (see Section 5)

Autoignition Temperature: (see Section 5)

Flammability Classification: (see Section 5)

Unusual Fire or Explosion Hazards: (see Section 5)

Oxidizing Properties: Not Applicable.

Other Information: None.

Note: The physical data represented above are typical values and should not be construed as a specification.

Section 10 Stability and Reactivity

Chemical Stability: Stable

Hazardous Polymerization: Will Not Occur

Conditions to Avoid: None known.

Chemicals to Avoid: Sensitive to moisture, strong oxidizing agents, strong bases.

Hazardous Decomposition Products (non-thermal): None known.

Section 11 Toxicological Information

Sensitization to Product: Not Applicable.
Reproductive Toxicity: Not Applicable.
Teratogenicity: Not Applicable.
Mutagenicity: Not Applicable.

RTECS #: DH5075000 BENZOIC ACID, P-NITRO-

IRRITATION DATA	
EYE-RBT 20 MG/24H MOD	85JCAE -,739,1986
TOXICITY DATA	
ORL-RAT LD50:1960 MG/KG	CRSBAW 160,1097,1966
IPR-RAT LD50:1210 MG/KG	CRSBAW 160,1097,1966
PAR-RAT LD50:1960 MG/KG	CRSBAW 160,1097,1966
IPR-MUS LD50:880 MG/KG	CRSBAW 160,1097,1966
IVN-MUS LD50:770 MG/KG	CRSBAW 160,1097,1966
PAR-MUS LD50:1470 MG/KG	CRSBAW 160,1097,1966

Further hazard information, if applicable, may be found in Section 3. Toxicological information regarding individual ingredients, if applicable, may be found in Section 2.

Section 12 Ecological Information

Mobility: Not Determined. **Ecotoxicity:** Not Determined.
Degradability: Not Determined. **Other Adverse Effects:** Not Determined.
Accumulation: Not Determined.

Section 13 Disposal Considerations

Dispose of in accordance with all applicable regulations.

The conditions of handling, storage, and use of this product are beyond our control and may be beyond our knowledge. For this and other reasons, LA-CO Industries, Inc. does not assume responsibility and expressly disclaim liability for loss, damage or expense arising out of or in any way connected with the handling, storage, use or disposal of this product.

Section 14 Transport Information

D.O.T. (U.S.)
Proper Shipping Name: Not Regulated.
Hazard Class or Division: Not Regulated.
Hazard Label: Not Regulated.
I.D. Number: Not Regulated.
TDG (Canada): Not Regulated.
IATA: Not Regulated.
ICAO: Not Regulated.
IMO: Not Regulated.
Australian Code for the Transport of Dangerous Goods
Dangerous Goods Class and Subsidiary Risk: Not Determined.

Section 15 Regulatory Information

Footnotes for Section 2:
1 Subject to the reporting requirements of SARA Title III, Section 313.
2 Appears on the California Safe Drinking Water and Toxic Enforcement Act (Prop. 65) Substances List.
3 Appears on the Massachusetts Substances List.

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- 4 Appears on the New Jersey Right-To-Know Hazardous Substances List.
- 5 Appears on the Pennsylvania Hazardous Substances List.
- 6 Appears on the Canadian WHMIS Ingredient Disclosure List.

U.S.A.

OSHA Hazard Status: This product is considered to be hazardous as defined by the U.S. OSHA HCS (29 CFR 1910.1200).

EPA SARA sec. 311/312 Hazard Categories: Immediate (Acute) Health Hazard.

Toxic Substances Control Act (TSCA): All ingredients contained in this product are listed on the U.S. EPA TSCA Chemical Substance Inventory.

HMIS® Rating: Health 1, Flammability 1, Reactivity 1

NFPA® (704) Rating: Health 2, Flammability 1, Reactivity 1

CANADA

WHMIS Status: This product is considered to be hazardous as defined by Canadian WHMIS Controlled Products Regulations.

WHMIS Rating: D-1B

WHMIS Risk Phrases: None required on containers of 100 ml or less per CPR, Section 19[1][a]-[d].

WHMIS Precautionary Statements: None required on containers of 100 ml or less per CPR, Section 19[1][a]-[d].

Domestic Substances List (DSL): All ingredients contained in this product are listed on the Canadian EPA (CEPA) Domestic Substances List (DSL).

E.U.

European Inventory of Existing Chemical Substances (EINECS): All ingredients contained in this product are listed on the European Inventory of Existing Chemical Substances (EINECS).

Categories of Danger (Labeling Information): Harmful(Xn)

Risk (R) Phrases: Not required per regulation 9 (8) of CHIP.

Safety (S) Phrases: Not required per regulation 9 (8) of CHIP.

AUSTRALIA

Worksafe Australia Status: Not determined.

HAZCHEM Code: Not determined.

Poisons Schedule Number: Not determined.

Further regulatory information regarding individual ingredients, if applicable, may be found in Section 2.

This product has been classified in accordance with the hazard criteria of the U.S. OSHA Hazard Communication Standard, the Canadian WHMIS Controlled Products Regulations, the British CHIP2 regulation 6, and the Australian NMRCWHS. This MSDS contains the information required by the above regulations and conforms to ANSI Z400.1-1993.

Section 16

Other Information

HMIS is a registered trademark of the National Paint and Coatings Association.

NFPA is a registered trademark of the National Fire Protection Association.

MSDS Prepared By: Director of Chemical Safety

The information contained herein is based on data available to us and is accurate and reliable to the best of our knowledge and belief. However, LA-CO Industries, Inc. makes no representations as to its completeness or accuracy. Information is supplied on condition that persons receiving such information will make their own determination as to its suitability for their purposes prior to use. In no event will LA-CO Industries, Inc. be responsible for damages of any nature whatsoever resulting from the use of or reliance upon the information contained herein.