

Part Number(s): Not Established

## MATERIAL SAFETY DATA SHEET

### SECTION I - MATERIAL IDENTIFICATION AND USE

**Material Name Identifier:**

**Type M Ink (Black)**

Supplier Name: Sterling Marking Products Inc.  
 Street Address: 349 Ridout St. N.,  
 City and Province: London, Ontario  
 Postal Code: N6A 2N8

Telephone Numbers: (519) 434-5785, (800) 265-5957  
 Fax Number: (519) 434-9516, (800) 667-6600  
 Webpage: <http://www.sterling.ca>  
 E-Mail: [sales@sterling.ca](mailto:sales@sterling.ca)

**Emergency Telephone Number: CANUTEC (613) 996-6666; Cellular \*666**

Material Use: Ink

**TDG Shipping Information:**

**PRINTING INK, UN1210**

**Class: 3 - Flammable Liquid**

**PG: III - Relatively Minor Danger**

**WHMIS Classification:**

Class B, Division 3 – Combustible Liquid  
 Class D, Division 2B – Skin/eye Irritant

**IATA Shipping (Air):**

Printing ink  
**Packaging Instruction for Limited Quantity: Y344**  
**Maximum Net Quantity** (per outer package): 10L  
 Refer to Pkg. Inst. No. for inner packaging type and maximum quantity per inner package. DGR – 54<sup>th</sup> edition

### SECTION II - HAZARDOUS INGREDIENTS

Component	CAS Registry	Toxicology	Concentration % (w/w)
Ethyl Alcohol	64-17-5	ACGIH TLV: 1000 ppm LD50: LC50:	22.75
N-Propyl Alcohol	71-23-8	ACGIH STEL: 250 ppm LD50: Not Available LC50: Not Available	22.09
Ethylene Glycol Monobutyl Ether	111-76-2	ACGIH TLV: 20 ppm LD50: Not Available LC50: Not Available	25.71
Resin	Proprietary	TLV: Not Available LD50: Not Available LC50: Not Available	19.17
Carbon Black, Amorphous	1333-86-4	TLV: Not Available LD50: Not Available LC50: Not Available	10.28

**Note:** All ingredients are listed on the Domestic Substances List (DSL) and the Toxic Substances Control Act (TSCA) list.



### SECTION III - PHYSICAL DATA

<b>Physical State:</b> Liquid	<b>% Volatile:</b> 70.55
<b>Density:</b> 7.57 Lbs/Gl	<b>Boiling Point (°C):</b> Not Available
<b>Colour:</b> Black	<b>Odour:</b> Alcohol
<b>Viscosity:</b> N/A	<b>Solubility in Water (20 °C):</b> Not Available
<b>Clarity:</b> Not Available	<b>Flash Point (°C):</b> 15.72
<b>Vapour Pressure(20 °C):</b> Not Available	<b>Vapour Density (Air =1) :</b> >1

### SECTION IV - FIRE AND EXPLOSION DATA

**Flammability:** Flammable

**Flash Point (°C TCC):** 15.72

LEL (% vol) lowest value of components: Not Available

UEL (% vol) highest value of components: Not Available

**Hazardous Combustion Products:** During a fire, smoke may contain the original material in addition to unidentified toxic and/or irritating compounds.

**Potential Hazards:** HIGHLY FLAMMABLE: Will be easily ignited by heat, sparks or flames. Vapours may form explosive mixtures with air. Vapours may travel to source of ignition and flash back. Most vapours are heavier than air. They will spread along ground and collect in low or confined areas (sewers, basements, tanks). Vapour explosion hazard indoors, outdoors or in sewers. Runoff to sewer may create fire or explosion hazard. Containers may explode when heated.

**Means of Extinction Fire:** CAUTION: This product has a low flash point: Use of water spray when fighting fire may be inefficient. Dry chemical, carbon dioxide, water spray or alcohol-resistant foam. Use media suitable for surrounding fire. Plan fire protection and response strategy through consultation with local fire protection authorities or appropriate specialists.

**Special Fire-Fighting Procedures:** Clear area of unprotected personnel. Firefighters should wear NIOSH-approved, self-contained breathing apparatus (SCBA). Use water spray to cool fire-exposed surfaces. Also, use water to flush spilled material away from source. Vapours are harmful; stay upwind of a fire to minimize breathing of vapours, gases, fumes, or decomposition products being generated.

**Unusual Fire & Explosion Hazards:** Containers exposed to intense heat from fire must be cooled to prevent vapour pressure build-up that may result in container rupture. Cool containers exposed directly to flames with large quantities of water as needed to prevent weakening of container itself. Never use a welding or cutting torch on or near container.

**Empty Container Warning:** “Empty” containers contain residues (liquid, solid, and/or vapour) that can be dangerous. DO NOT pressurize, cut, weld, braze, grind, drill, solder, or expose containers to heat, sparks, open flame. They may explode and cause injury and/or death. DO NOT attempt to clean drums. Residues are difficult to remove. “Empty” drums should be completely drained, properly bunged and promptly returned to a drum reconditioned. Dispose of all containers in an environmentally safe way and in accordance with governmental regulations. For work on tasks, refer to OSHA regulations ANSIZ49.1 and other governmental and industrial references pertaining to cleaning, repairing, welding, or other operations.

### SECTION V - REACTIVITY DATA

**Stability:** Stable

**Incompatibility:** Oxidizing materials, heat, sparks, electrical equipment and open flames

**Hazardous Decomposition Products:** None known

### SECTION VI - TOXICOLOGICAL PROPERTIES

**Routes of Entry:** Eye, Skin, Inhalation, Ingestion

**Effects of Acute Exposure:**

**Eye:** Contact should be prevented with the use of splash goggles

**Skin:** Should be prevented with the use of protective clothing. Repeated exposure may cause irritation, even a burn. May cause more severe response on covered skin (under clothing, gloves)

**Inhalation:** If use conditions generate vapour in areas where adequate ventilation is not available, NIOSH approved vapor respirator should be worn.

**Ingestion:** All food should be kept in separate areas from those where the ink is stored or used. Eating or drinking should be prohibited from these areas. Moderate toxicity if swallowed. Small amounts swallowed incidental to normal handling operations are not likely to cause injury; however swallowing larger amounts may cause injury.

**Effects of Chronic Exposure:** Although this product has not been tested, materials contained in the formulation have the following information.

**Irritancy:** Hazardous by WHMIS criteria

**Sensitization (Animal and Human Studies):** Did not cause allergic skin reactions when tested in humans.

**Chronic Toxicity and Carcinogenicity:** In long-term animal studies with ethylene glycol butyl ether, small but statistically significant increases in tumors were observed in mice but not rats. The effects are not believed to be relevant to humans. If the material is handled in accordance with proper industrial handling, exposures should not pose a carcinogenic risk to humans.

**Genetic Toxicology:** In Vitro mutagenicity studies were predominantly negative. Animal mutagenicity studies were negative.

**Reproductive Effects:** Did not cause birth defects in lab animals. Has been toxic to the fetus in lab animals at doses toxic to the mother.

**Significant Data with Possible Relevance to Humans** – In animals, effects have been reported on the following organs:

- Blood (hemolysis)
- Secondary effects to the kidney and liver
- Human red blood cells have been shown to be significantly less sensitive to hemolysis than those of rodents and rabbits.

## SECTION VII - PREVENTATIVE MEASURES

**Gloves:** Solvent impermeable gloves are required for repeated or prolonged contact.

**Eye Protection:** Wear safety glasses where contact with the eye is anticipated. Chemical safety goggles should be worn whenever there is a possibility of splashing or other contact with the eyes.

**Respiratory Protection:** Proper selection of respiratory protection depends upon many factors, including duration and level of exposure and conditions of use. In general, exposure to organic chemicals, such as those contained in this product, may not require the use of respiratory protection, if used in a well-ventilated area. In areas of restricted ventilation, a NIOSH approved organic vapour respirator may be required. Under certain conditions, such as spraying, a mechanical pre-filter may also be required. In confined areas, or in high exposure situations, a NIOSH/MSHA approved air-supplied respirator may be required. If the TLV's listed in Section II are exceeded, use a properly fitted NIOSH/MSHA approved respirator with an appropriate protection factor.

Use material only with adequate ventilation to prevent exceeding the recommended exposure limit or a build-up of explosive concentrations in the air. Use explosion proof equipment.

**Other Protective Equipment Recommended:** Eye wash station in the work area.

**Engineering Controls:** Use general dilution and local exhaust in sufficient volume, and pattern to keep concentrations of hazardous ingredients the lowest exposure limit stated.

**Leak and Spill Procedure:**

All personnel involved with spill cleanup should follow good industrial hygiene. Wear protective clothing and eye protection to prevent skin and eye contact. Contain spilled material immediately with an inert substance such as sand, granulated clay or earth. Use plastic or aluminum shovel to transfer waste material into an appropriate container for disposal. Store in appropriate sealed container for proper disposal. Disposal should be made in accordance with all applicable state, local and federal regulations.

**Waste Disposal:** Review federal, provincial and local government requirements prior to disposal. Use a licensed waste treatment facility or reclaimer.

**Storage Requirements:** Store in a tightly closed container. Store away from incompatible materials. Store in a cool, dry, well-ventilated area. Ensure all bottles are properly labeled.

**Special Precautions:** Ground all equipment to prevent static discharge. Keep containers away from heat, sparks, and open flame. Wash thoroughly with soap and water after handling material.

## SECTION VIII - FIRST AID

Effects of exposure (inhalation, ingestion or skin contact) to substance may be delayed. Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves.

**Eye:** Immediately flush eyes with a directed stream of water for at least 15 minutes, while holding eyelids open. If irritation or redness develops or persists, get medical attention.

**Skin:** Flush affected areas with large amounts of water, remove contaminated clothing. Wash affected areas thoroughly with soap and water. If irritation or redness develops or persists, get medical attention.

**Inhalation:** Remove victim to fresh air. If breathing difficulties develop, administer oxygen and get medical attention. If victim is not breathing, administer artificial respiration and get medical attention.

**Ingestion:** DO NOT INDUCE VOMITING. If vomiting occurs spontaneously, keep head below hips to prevent aspiration of liquid into lungs (Aspiration pneumonitis can be fatal). If victim conscious and alert, give victim lukewarm water. GET IMMEDIATE MEDICAL ATTENTION.

## SECTION IX - PREPARATION AND ADDITIONAL INFORMATION

**Prepared by:** Sterling Marking Products Inc.  
Quality Planning and Engineering Department  
349 Ridout St., N.  
London, Ontario N6A 2N8

Supersedes: June 6, 2011  
Updated: March 04, 2015

**Expires: 04-Mar-2018**

Information for this material safety data sheet was obtained from sources considered technically accurate and reliable. While every effort has been made to ensure full disclosure of product hazards, in some cases data is not available and is so stated. Since conditions of actual product use are beyond the control of the supplier, it is assumed that user of this material has been fully trained according to the mandatory requirements of WHMIS. If user requires independent information on ingredients in this or any other material, we recommend contact with the Canadian Centre for Occupational Health and Safety (CCOHS) in Hamilton, Ontario (1-800-263-8276) or CSST in Montreal, Quebec (514-873-3990).