

CARMEL GROUP INC.

MATERIAL SAFETY DATA SHEET

SECTION 1 – CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Disappearing Ink Felt Pen (Single & Dual)		Revision date 8 Jan 10
Previous revision date None	Product code FM10119 & FM10001	Material use writing disappears in 2-14 days, or immediately with water.
Manufacturer's Name and issuing location CARMEL GROUP INC. 10220 ARMAND LAVERGNE, MONTRÉAL, QUEBEC, CANADA, H1H 3N4 PHONE : 514-270-5377 FAX : 514-270-2025 INTERNET : www.carmelindustries.com		EMERGENCY PHONE NUMBER CHEMTREC USA 800-424-9300 International 1-703-527-3887

SECTION 2 – CONPOSITION / INFORMATION ON INGREDIENTS

Hazardous Ingredients	Note (Sect 15)	CAS #	Amount	Exposure Limits (ppm)				
				OSHA PEL-TWA	NIOSH REL-TWA	NIOSH REL-STEL	ACGIH TLV-TWA	ACGIH TLV-STEL
Ethanol	1,2,3,4,5,6,7	64-17-5	<45%	1000	1000	N/AV	1000	N/AV
Methylethanolamine	2,4	109-83-1	<10%	N/L	N/L	N/L	N/L	N/L
Phenolphthalein (for FM10119 & FM10290)	6,8	77-09-8	<10%	N/L	N/L	N/L	N/L	N/L

SECTION 3 – HAZARD IDENTIFICATION

Emergency Overview

Flammable Liquid and Vapor. May be irritating to skin, respiratory tract and eyes. May be harmful if absorbed through the skin. May cause central nervous system effects.

SKIN CONTACT	This product may cause mild to moderate skin irritation. Prolonged or repeated exposure may result in contact dermatitis which is characterized by redness, itching, drying and/or cracking of the skin. This product contains hazardous component(s) which may be absorbed through the skin.
EYE CONTACT	This product may cause mild to moderate eye irritation. Direct contact or excessive exposure to vapors may cause redness, tearing and stinging.
INHALATION	Inhalation of excessive quantities of vapors may cause irritation of the nose, throat and respiratory tract, as well as headache, nausea, dizziness, loss of coordination and fatigue.
INGESTION	Ingestion of this product may cause gastrointestinal irritation, headache, nausea, vomiting, diarrhea, dizziness, loss of coordination and fatigue.
CHRONIC EFFECTS	Chronic overexposure may result in liver abnormalities.
Medical Condition Aggravated by Exposure	Preexisting skin disorders may be aggravated by exposure to this product. Impaired respiratory and liver functions from preexisting medical conditions may be aggravated by exposure to this product.

Potential Health Effects (NFPA Classification)

Fire hazard : 2	Health Hazard : 1	Reactivity : 0	Personal Protection : See Section 8
0 = Minimal 1 = Slight hazard 2= Moderate Hazard 3 = Serious Hazard 4 = Severe Hazard			

Potential Health Effects (HMIS Rating)

Health : 1		Flammability : 2		Reactivity : 0	
0 = Minimal 1 = Slight hazard 2= Moderate Hazard 3 = Serious Hazard 4 = Severe Hazard					
SECTION 4 – FIRST AID MEASURES					
EYE CONTACT	In case of direct contact, flush eyes with generous amounts of water for at least 15 minutes. Call a physician to attend to the injury if irritation or redness persists.				
SKIN CONTACT	Remove contaminated clothing. Wash affected area thoroughly with soap and water. Call a physician to attend to the injury if irritation or redness persists.				
INHALATION	Remove individual to a well ventilated area for fresh air. If breathing difficulties develop, oxygen should be administered by qualified personnel. Call a physician to attend to the injury.				
INGESTION	Ingestion is an unlikely route of exposure under normal industrial condition. If material is ingested, immediately call a physician.				
ADDITIONAL INFO	None				
SECTION 5 – FIRE FIGHTING MEASURES					
Flash Point Less than 23°C / 73°F	Flash Point Category (OSHA) IB - Flammable	Lower Flammability Limit in Air (% by Vol) 3			
Extinguishing Media	Extinguish with a multipurpose fire fighting CO ₂ , water spray, dry powder or foam.				
Special Fire fighting Procedure	The use of self-contained breathing apparatus is recommended for fire fighters. Water spray may be used to cool the packages exposed to heat near the flame. Avoid spreading burning liquid with water used for cooling purposes.				
Unusual Fire and Explosion Hazards	This product is (OSHA) flammable and may be ignited by heat, sparks, flame or static electricity if marker is broken. Vapors are heavier than air, may travel along the ground and may be moved by ventilation; flashback along vapor trail may occur.				
SECTION 6 – ACCIDENTAL RELEASE MEASURES					
Small Spills	Wash with water.				
Large Spills	Unlikely to occur in pen format.				
SECTION 7 – HANDLING AND STORAGE					
Handling procedures	None special needed. Don't break or burn the marker				
Storage precautions	Normal precaution should be followed in handling and storage. Store in a dry & cool place. Keep out of strong sunlight. Do not store at temperature : > 50°C / 120°F or near spark or open flame.				
SECTION 8 – EXPOSURE CONTROLS / PERSONAL PROTECTION					
PERSONAL PROTECTION					
Respiratory protection	None if product is properly used.				
Protective gloves	If marker is frequently used, wear rubber glove to prevent skin contact.				
Eye protection	None if product is properly used.				
Clothing	Standard industrial.				
SECTION 9 – PHYSICAL AND CHEMICAL PROPERTIES					
Appearance Pen with one or two tips	Odour Alcohol	Physical state liquid @ 25°C/77°F	Boiling point N / AV.		
Melting point N / AV.	Specific gravity (H ₂ O=1) < 1	Evaporation rate (vs. Butyl Acetate) N / AV.	Solubility in water Soluble		
Vapor Density vs. Air N / Av.	Partitioning coefficient N / AV.	Typical density (lbs/gal) N / AV.	Percent volatiles 85%		
SECTION 10 – STABILITY AND REACTIVITY DATA					
Stability Stable	Hazardous polymerization Will not occur.				
Incompatibility	Normally non-reactive; however avoid contact with strong oxidizing agent (ex. Peroxides, chlorine).				
Hazardous decomposition products	Burning can produce noxious and toxic fumes, and the following combustion products : Oxides of carbon.				
SECTION 11 – TOXICOLOGICAL INFORMATION					

Carcinogenicity Ethanol has been linked to cancer in humans but is not listed in NTP or IARC carcinogen list of product. However, the ethanol present in this product is unsuitable to drink.	Reproductive Effects Ethanol has been linked to birth defects in humans when ingested. However, the ethanol present in this product is unsuitable to drink.
Irritancy of Material Cause eye & skin irritation.	Sensitizing Capability None known
Mutagenicity / Teratogenicity Not listed	Synergistic Materials None known
SECTION 12 – ECOLOGICAL INFORMATION	
Toxic to aquatic organism. Avoid contact with public sewer system.	
SECTION 13 – DISPOSAL CONSIDERATION	
Dispose of in accordance with appropriate Federal, State and local regulation.	
SECTION 14 – TRANSPORT INFORMATION	
Dot Hazard Classification Consumer Commodity ORM-D (For less than 30 kg gross packaging weight). Combustible liquid, n.o.s., Hazard class 3, UN No. 1170. Packaging group III (For greater than 30 kg gross package).	
IATA Classification Flammable liquid, n.o.s., UN No. 1170.	
ICAO Classification Flammable liquid, n.o.s., UN No. 1170.	
IMO Classification Exempt (<0.5 l / marker)	
TDG Hazard Classification Consumer Commodity ORM-D (For less than 30 kg gross packaging weight). Combustible liquid, n.o.s., Hazard class 3, UN No. 1170. Packaging group III (For greater than 30 kg gross package).	
UN / NA Hazard No. 1170 for DOT, IATA & TDG	
Other N / AV.	
SECTION 15 – REGULATORY INFORMATION	
Hazard Details of SECTION 2	<ol style="list-style-type: none"> 1 Appears on the California Right-To-Know Substance List. 2 Appears on the Massachusetts Right-To-Know Substance List. 3 Appears on the New Jersey Right-To-Know Hazardous Substance List. 4 Appears on the Pennsylvania Hazardous Substance List. 5 Appears on the Minnesota Right-To-Know Substance List. 6 Appears on the Canadian WHMIS Ingredient Disclosure List. 7 Reportable under the export notification requirements of TSCA, Section 12(B). 8 Appears on the California Safe Drinking Water and Toxic Enforcement Act (Prop. 65) Substances List.
SARA Status	No reporting requirement.
SARA Hazard Cat.	Acute Health Hazard, Flammable
TSCA Status	All ingredients of this product are listed on the U.S. EPA TSCA (Toxic Substances Control Act) Chemical Substance Inventory. This product also contains ethanol (64-17-5) which is reportable under the export notification requirements of TSCA, Section 12(B).
DSL Status	All ingredients of this product are listed on the Canadian EPA (CEPA) Domestic Substances List (DSL).
EINECS Status	All ingredients of this product are listed on the European Inventory of

	Existing Chemical Substances (EINECS).	
AICS Status	All ingredients of this product are listed on the Australian Inventory of Chemical Substances (AICS).	
OSHA Status	Hazardous material as defined by U.S. OSHA HCS (29 CFR 1910.1200).	
WHMIS Status	Considered to be hazardous material as defined by Canadian WHMIS Controlled Product Regulation (CPR).	
WHMIS Rating	B2, D2B	
WHMIS Risk Phrases / Precautionary Statement	None required on containers of 100 ml or less per CPR, Section 19 [1] [a]-[d].	
OSHA HCS Compliance	MSDS of the product is classified in accordance with all the required information for his hazard criteria under the Health Communication Standards of the U.S. OSHA.	
WHMIS CPR Compliance	MSDS of the product is classified in accordance with all the required information for his hazard criteria under the Controlled Products Regulations of the Canadian WHMIS.	
ANSI Z400.1-1993 Compliance	MSDS of the product is made following the Z400.1-1993 standards of the ANSI.	
SECTION 16 – OTHER INFORMATION		
N/AV=NOT AVAILBLE		
N/L=NOT LISTED		
MSDS Originally made by Karl Pinard	Revised by Samia ghezlaoui	

The information contained in this document is derived from data supplied to CARMEL GROUP by the manufacturers or distributors of the raw materials combined to form this product. However, CARMEL GROUP makes no representations as to its completeness or accuracy. To the best of our knowledge all hazards have been noted for the intended use of the product and, since CARMEL GROUP cannot control conditions of use, the end user is obliged to determine the conditions permitting safe use of the product. In no event will ICARMEL GROUP be responsible for damage of any nature whatsoever resulting from the use of or reliance upon the information contained herein.

CARMEL GROUP INC.

DISAPPEARING INK FELT PEN PRODUCTS

Product code	Product Description
FM10119	Pink Disappearing Ink Felt Pen
FM10001	Violet Disappearing Ink Felt Pen