Material Safety Data Sheet

Section 1. Product and Company Identification

Product Name Fuchsin-Basic

Product Code 6039X

Manufacturer
EMD Chemicals Inc.
P.O. Box 70
480 Democrat Road
Gibbstown, NJ 08027
Prior to January 1, 2003 EMD Chemicals Inc. was EM Industries, Inc. or EM Science, Division of EM Industries, Inc.

Effective Date **5/11/2004**

Print Date 5/11/2004

For More Information Call
856-423-6300 Technical Service
Monday-Friday: 8:00 AM - 5:00 PM

In Case of Emergency Call
800-424-9300 CHEMTREC (USA)
613-996-6666 CANUTEC (Canada)
24 Hours/Day: 7 Days/Week

Synonym None.

Material Uses Laboratory Reagent

Chemical Family Dye Solution

Section 2. Composition and Information on Ingredients

Component	CAS #	% by Weight
Basic Fuchsin	569-61-9	28.2
Ethanol	64-17-5	0.9
Phenol	108-95-2	<0.5
Water	7732-18-5	>71

Section 3. Hazards Identification

Physical State and Appearance Liquid.

Emergency Overview
WARNING !
MAY BE HARMFUL IF INHALED, ABSORBED THROUGH SKIN OR SWALLOWED.
MAY CAUSE EYE INJURY.
CAUSES EYE AND SKIN IRRITATION.
CANCER HAZARD
CONTAINS MATERIAL WHICH CAN CAUSE CANCER
POSSIBLE BIRTH DEFECT HAZARD.
CONTAINS MATERIAL WHICH MAY CAUSE BIRTH DEFECTS BASED ON ANIMAL DATA.

WARNING: This product contains a chemical(s) known to the State of California to cause cancer.

Routes of Entry Absorbed through skin. Dermal contact. Eye contact. Inhalation. Ingestion.

Potential Acute Health Effects

Eyes Hazardous in case of eye contact (irritant). Inflammation of the eye is characterized by redness, watering, and itching. MAY CAUSE EYE INJURY.

Skin Hazardous in case of skin contact (irritant). Skin inflammation is characterized by itching, scaling, reddening, or, occasionally, blistering. May be hazardous in case of skin contact (permeator).

Inhalation May be hazardous in case of inhalation.

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Ingestion	May be hazardous in case of ingestion.

Potential Chronic Health Effects

Carcinogenic Effects	Classified A1 (Confirmed for human.) by ACGIH [Basic Fuchsin]. Classified 2B (Possible for human.) by IARC [Basic Fuchsin].
	Additional information See Toxicological Information (section 11)
Medical Conditions Aggravated by Overexposure:	Repeated or prolonged contact with spray mist may produce chronic eye irritation and severe skin irritation. Repeated or prolonged exposure to spray mist may produce respiratory tract irritation leading to frequent attacks of bronchial infection. Repeated exposure to a highly toxic material may produce general deterioration of health by an accumulation in one or many human organs.

Section 4. First Aid Measures

Eye Contact	Check for and remove any contact lenses. In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Cold water may be used. Get medical attention immediately.
Skin Contact	In case of contact, immediately flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Cover the irritated skin with an emollient. Cold water may be used. Wash clothing before reuse. Thoroughly clean shoes before reuse. Get medical attention immediately.
Inhalation	If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical attention.
Ingestion	Do NOT induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. If large quantities of this material are swallowed, call a physician immediately. Loosen tight clothing such as a collar, tie, belt or waistband.

Section 5. Fire Fighting Measures

Flammability of the Product	Non-flammable.
Auto-ignition Temperature	Not applicable.
Flash Points	Not applicable.
Flammable Limits	Not applicable.
Products of Combustion	Not applicable.
Fire Hazards in Presence of Various Substances	Not applicable.
Explosion Hazards in Presence of Various Substances	**Risks of explosion of the product in presence of static discharge:** No. **Risks of explosion of the product in presence of mechanical impact:** No.
Fire Fighting Media and Instructions	Use DRY chemicals, CO2, water spray or foam.
Protective Clothing (Fire)	Wear self-contained breathing apparatus.
Special Remarks on Fire Hazards	Not available.
Special Remarks on Explosion Hazards	Development of hazardous combustion gases or vapors possible in the event of fire.

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Section 6. Accidental Release Measures

Small Spill and Leak

Dilute with water and mop up, or absorb with an inert dry material and place in an appropriate waste disposal container.

Large Spill and Leak

Stop leak if without risk. Absorb with DRY earth, sand or other non-combustible material. Do not get water inside container. Do not touch spilled material. Use water spray curtain to divert vapor drift. Prevent entry into sewers, basements or confined areas; dike if needed. Call for assistance on disposal. Finish cleaning by spreading water on the contaminated surface and allow to evacuate through the sanitary system. Be careful that the product is not present at a concentration level above TLV. Check TLV on the MSDS and with local authorities.

Spill Kit Information

The following EMD Chemicals Inc. SpillSolv (TM) absorbent is recommended for this product:
SX1330 Solvent Treatment Kit

Section 7. Handling and Storage

Handling

Avoid contact with eyes, skin and clothing. Avoid prolonged contact with eyes, skin, and clothing. Do not ingest. Avoid breathing vapors or spray mists. Keep container closed. Use only with adequate ventilation. Wash thoroughly after handling.

Storage

Keep in a well-ventilated place.

Section 8. Exposure Controls/Personal Protection

Engineering Controls

Provide exhaust ventilation or other engineering controls to keep the airborne concentrations of vapors below their respective occupational exposure limits. Ensure that eyewash stations and safety showers are proximal to the work-station location.

Personal Protection

Eyes Face shield.

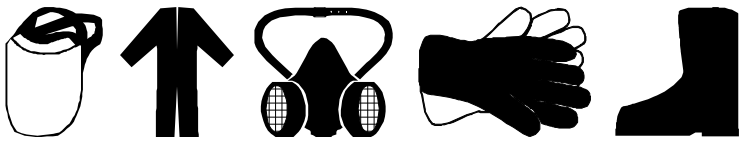
Body Full suit.

Respiratory Vapor respirator. Be sure to use an approved/certified respirator or equivalent. Wear appropriate respirator when ventilation is inadequate.

Hands Gloves.

Feet Boots.

Protective Clothing (Pictograms)



Personal Protection in Case of a Large Spill

Splash goggles. Full suit. Vapor respirator. Boots. Gloves. A self-contained breathing apparatus should be used to avoid inhalation of the product. Suggested protective clothing might not be sufficient; consult a specialist BEFORE handling this product.

Product Name	Exposure Limits
Basic Fuchsin	Not available.
Ethanol	**AUVA (Austria, 1995).** Spitzenbegrenzung: 3800 mg/m^3 3 times per shift, 60 minute(s). Spitzenbegrenzung: 2000 ML/M3 3 times per shift, 60 minute(s). TWA: 1900 mg/m^3 8 hour(s). TWA: 1000 ML/M3 8 hour(s). **NOHSC (Australia, 1995).** TWA: 1880 mg/m^3 8 hour(s). TWA: 1000 ppm 8 hour(s). **Lijst Grenswaarden (Belgium, 1998).** VL: 1907 mg/m^3 8 hour(s). VL: 1000 ppm 8 hour(s). **SUVA (Switzerland, 1997).** MAK: 1900 mg/m^3 8 hour(s). MAK: 1000 ML/M3 8 hour(s).

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Ministry of Health (CL, 1992).
TWA: 1500 mg/m^3 8 hour(s).
TWA: 800 ppm 8 hour(s).
MAK-Werte Liste (Germany, 1998).
Spitzenbegrenzung: 1920 mg/m^3 4 times per shift, 30 minute(s).
Spitzenbegrenzung: 1000 ML/M3 4 times per shift, 30 minute(s).
TWA: 960 mg/m^3 8 hour(s).
TWA: 500 ML/M3 8 hour(s).
TRGS900 (Germany, 1999).
Spitzenbegrenzung: 7600 mg/m^3
Spitzenbegrenzung: 4000 ML/M3
TWA: 1900 mg/m^3 8 hour(s).
TWA: 1000 ML/M3 8 hour(s).
Arbejdstilsynet (Denmark, 1996).
GV: 1900 mg/m^3 8 hour(s).
GV: 1000 ppm 8 hour(s).
Tyterveyslaitos (Finland, 1998).
STEL: 2500 mg/m^3 15 minute(s).
STEL: 1300 ppm 15 minute(s).
TWA: 1900 mg/m^3 8 hour(s).
TWA: 1000 ppm 8 hour(s).
INRS (France, 1999).
VLE: 9500 mg/m^3 15 minute(s).
VLE: 5000 ppm 15 minute(s).
VME: 1900 mg/m^3 8 hour(s).
VME: 1000 ppm 8 hour(s).
EH40-OES (United Kingdom (UK), 2000).
TWA: 1920 mg/m^3 8 hour(s).
TWA: 1000 ppm 8 hour(s).
NAOSH (Ireland, 1999).
OEL: 1900 mg/m^3 8 hour(s).
OEL: 1000 ppm 8 hour(s).
Ministry of Labour (KR, 1997).
TWA: 1900 mg/m^3 8 hour(s).
TWA: 1000 ppm 8 hour(s).
Secretary of Work and Social security (MX, 1994).
CPT: 1900 mg/m^3 8 hour(s).
CPT: 1000 ppm 8 hour(s).
Nationale MAC-lijst (Netherlands, 2000).
TGG 8 uur: 1000 mg/m^3 8 hour(s).
TGG 8 uur: 500 ppm 8 hour(s).
NZ OSH (NZ, 1994).
TWA: 1880 mg/m^3 8 hour(s).
TWA: 1000 ppm 8 hour(s).
AFS (Sweden, 1996).
TGV: 1900 mg/m^3
TGV: 1000 ppm
NGV: 1000 mg/m^3 8 hour(s).
NGV: 500 ppm 8 hour(s).
ACGIH TLV (United States, 2000).
TWA: 1880 mg/m^3 8 hour(s).
TWA: 1000 ppm 8 hour(s).
NIOSH REL (United States, 2000).
TWA: 1900 mg/m^3 10 hour(s).
TWA: 1000 ppm 10 hour(s).
OSHA Final Rule (United States, 1989).
TWA: 1900 mg/m^3 8 hour(s).
TWA: 1000 ppm 8 hour(s).

Phenol

EH40-OES (United Kingdom (UK), 1997). Skin
STEL: 39 mg/m^3 15 minute(s).
STEL: 10 ppm 15 minute(s).
TWA: 20 mg/m^3 8 hour(s).
TWA: 5 ppm 8 hour(s).

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	ACGIH (United States, 1996). Skin TWA: 19 mg/m^3 8 hour(s). TWA: 5 ppm 8 hour(s). **NIOSH REL (United States, 1994). Skin** CEIL: 60 mg/m^3 15 minute(s). CEIL: 15.6 ppm 15 minute(s). TWA: 19 mg/m^3 10 hour(s). TWA: 5 ppm 10 hour(s). **OSHA Final Rule (United States, 1989). Skin** TWA: 19 mg/m^3 8 hour(s). TWA: 5 ppm 8 hour(s).
Water	Not available.

Section 9. Physical and Chemical Properties

Odor	Alcohol like.
Color	Purple.
Physical State and Appearance	Liquid.
Molecular Weight	Not applicable.
Molecular Formula	Not applicable.
pH	Not available.
Boiling/Condensation Point	The lowest known value is 99.9°C (211.8°F) (Water).
Melting/Freezing Point	May start to solidify at -0.1°C (31.8°F) based on data for: Water.
Specific Gravity	Not available.
Vapor Pressure	Not available.
Vapor Density	Not available.
Odor Threshold	Not available.
Evaporation Rate	0.36 (Water) compared to(n-Butyl Acetate =1)
LogK$_{ow}$	Not available.
Solubility	Soluble in water.

Section 10. Stability and Reactivity

Stability and Reactivity	The product is stable.
Conditions of Instability	FLAMMABLE LIQUID AND VAPOR. (Ethanol)
Incompatibility with Various Substances	Reactive with oxidizing agents.
Rem/Incompatibility	Avoid all possible sources of ignition (spark or flame).
Hazardous Decomposition Products	These products are hydrogen chloride, COx, NOx
Hazardous Polymerization	Will not occur.

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Section 11. Toxicological Information

RTECS Number:

Basic Fuchsin	CX9850100
Ethanol	KQ6300000
Phenol	SJ3325000
Water	ZC0110000

Toxicity

LD_{50}: Not available.
LC_{50}: Not available.

Chronic Effects on Humans

CARCINOGENIC EFFECTS: Classified A1 (Confirmed for human.) by ACGIH [Basic Fuchsin]. Classified 2B (Possible for human.) by IARC [Basic Fuchsin].
DEVELOPMENTAL TOXICITY: Classified Reproductive system/toxin/female, Reproductive system/toxin/male [SUSPECTED] [Ethanol].
Contains material which causes damage to the following organs: mucous membranes.
Contains material which may cause damage to the following organs: blood, the reproductive system, central nervous system (CNS).

Acute Effects on Humans

Hazardous in case of eye contact (irritant). Inflammation of the eye is characterized by redness, watering, and itching. Hazardous in case of skin contact (irritant). Skin inflammation is characterized by itching, scaling, reddening, or, occasionally, blistering. May be hazardous in case of skin contact (permeator). May be hazardous in case of inhalation. May be hazardous in case of ingestion.

Special Remarks on Other Toxic Effects on Humans

MAY CAUSE EYE INJURY. Irritating to mucous membranes.

Synergetic Products (Toxicologically)

Not available.

Irritancy

Draize Test: Not available.

Sensitization

Not available.

Carcinogenic Effects

Classified A1 (Confirmed for human.) by ACGIH [Basic Fuchsin]. Classified 2B (Possible for human.) by IARC [Basic Fuchsin].

Toxicity to Reproductive System

Classified Reproductive system/toxin/female, Reproductive system/toxin/male [SUSPECTED] [Ethanol].

Teratogenic Effects

Not available.

Mutagenic Effects

Not available.

Section 12. Ecological Information

Ecotoxicity

Not available.

BOD5 and COD

Not available.

Toxicity of the Products of Biodegradation

The products of degradation are as toxic as the product itself.

Section 13. Disposal Considerations

EPA Waste Number

U188

Treatment

Specified technology-Contact your local permitted waste disposal site (TSD) for permissible treatment sites. Always contact permitted waste disposer (TSD) to asure compliance with all Current local, State and Federal Regulations.

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Section 14. Transport Information

DOT Classification Not available.

TDG Classification Not available.

IMO/IMDG Classification Not available.

ICAO/IATA Classification Not available.

Section 15. Regulatory Information

U.S. Federal Regulations

TSCA 8(b) inventory: Basic Fuchsin; Ethanol; Phenol; Water
TSCA 8(d) H and S data reporting: Phenol: 1987
SARA 302/304/311/312 extremely hazardous substances: Phenol
SARA 302/304 emergency planning and notification: Phenol
SARA 302/304/311/312 hazardous chemicals: Basic Fuchsin; Ethanol; Phenol
SARA 311/312 MSDS distribution - chemical inventory - hazard identification: Basic Fuchsin: Delayed (Chronic) Health Hazard; Ethanol: Fire Hazard, Immediate (Acute) Health Hazard, Delayed (Chronic) Health Hazard; Phenol: Fire Hazard, Immediate (Acute) Health Hazard, Delayed (Chronic) Health Hazard

Clean Water Act (CWA) 307: Phenol

Clean Water Act (CWA) 311: Phenol

Clean air act (CAA) 112 accidental release prevention: No products were found.
Clean air act (CAA) 112 regulated flammable substances: No products were found.
Clean air act (CAA) 112 regulated toxic substances: No products were found.

WHMIS (Canada)

Class D-2A: Material causing other toxic effects (VERY TOXIC).
Class D-2B: Material causing other toxic effects (TOXIC).

CEPA DSL: Basic Fuchsin; Ethanol; Phenol; Water

This product has been classifed in accordance with the hazard criteria of the Controlled Product Regulations and the MSDS contains all required information.

International Regulations

EINECS

Basic Fuchsin	209-321-2
Ethanol	200-578-6
Phenol	203-632-7
Water	231-791-2

DSCL (EEC) This product is not classified according to the EU regulations.

International Lists

Australia (NICNAS): Ethanol; Phenol; Water

Germany water class: Ethanol

Japan (MITI): Ethanol; Phenol; Water

Korea (TCCL): Ethanol; Phenol; Water

Philippines (RA6969): Basic Fuchsin; Ethanol; Phenol; Water
China: No products were found.

State Regulations

Pennsylvania RTK: Ethanol: (generic environmental hazard); Phenol: (environmental hazard, generic environmental hazard)
Massachusetts RTK: Basic Fuchsin; Ethanol; Phenol
New Jersey: Fuchsin-Basic

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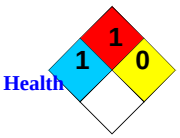
California prop. 65: This product contains the following ingredients for which the State of California has found to cause cancer, birth defects or other reproductive harm, which would require a warning under the statute: Basic Fuchsin
California prop. 65 (no significant risk level): Basic Fuchsin
California prop. 65: This product contains the following ingredients for which the State of California has found to cause cancer which would require a warning under the statute: Basic Fuchsin

Section 16. Other Information

National Fire Protection Association (U.S.A.)



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