

Material Safety Data Sheet

Section 1. Product Identification and Use

Product Name - Trade Name 441-007 PLASTICOLOR® VALENCENEW 1997

Supplier - Manufacturer Chemcraft International Inc.,
155 Rose Glen Road North
P.O. Box 458
Port Hope, ON.
Canada L1A 3Z3

Telephone (905) 885-6388 **Fax** (905) 885-5097

In case of Emergency (905) 885-6388, (800) 263-7951

For Transport Emergency or After Hours

CANUTEC (613) 996-6666

Code 441-007

Synonym PLASTICOLOR® VALENCE NEW 1997

Chemical Name Not applicable.

Chemical Family Synthetic polymer in organic solvent. (Paint.)

Chemical Formula Not applicable.

Material Uses Coatings: Surface coatings and finishes.

Product Identification Number (PIN) 1263 PAINT

Section 2. Hazardous Ingredients

Exposure limits

Name	CAS #	% by Weight	LC ₅₀ /LD ₅₀	TLV/PEL
Isobutyl acetate	110-19-0	5-10	ORAL (LD50): Acute: 4763 mg/kg [Rabbit]. 3200 mg/kg [Rat].	Not available.
Toluene	108-88-3	1-5	ORAL (LD50): Acute: 2600 mg/kg [Rat]. DERMAL (LD50): Acute: 12210 mg/kg [Rabbit].	ACGIH (Canada, 1993). TWA: 50 ppm TWA: 188 mg/m ³
Ethylbenzene	100-41-4	0.1-1	ORAL (LD50): Acute: 3500 mg/kg [Rat]. DERMAL (LD50): Acute: 5000 mg/kg [Rabbit].	ACGIH (Canada). TWA: 100 ppm STEL: 125 ppm
Xylenes	1330-20-7	1-5	ORAL (LD50): Acute: 4300 mg/kg [Rat].	ACGIH (Canada, 1992). TWA: 100 ppm STEL: 150 ppm TWA: 434 mg/m ³ STEL: 651 mg/m ³
Methyl n-amyl ketone	110-43-0	5-10	ORAL (LD50): Acute: 1670 mg/kg [Rat]. 730 mg/kg [Mouse]. DERMAL (LD50): Acute: 10220 mg/kg [Rabbit].	Not available.
Isobutyl alcohol	78-83-1	1-5	ORAL (LD50): Acute: 2500 mg/kg [Rat]. 3200 mg/kg [Mouse]. DERMAL (LD50): Acute: 4200 mg/kg [Rabbit].	ACGIH (Canada, 1993). TWA: 50 ppm
Ethyl alcohol	64-17-5	1-5	ORAL (LD50): Acute: 7060 mg/kg [Rat].	OSHA (Canada). TWA: 1000 ppm ACGIH (Canada). TWA: 1000 ppm
Formaldehyde	50-00-0	0.1-1	ORAL (LD50): Acute: 100 mg/kg [Rat]. DERMAL	OSHA (Canada). STEL: 2 ppm

Continued on Next Page

Potential additional emission of formaldehyde	50-00-0*	1-5	(LD50): Acute: 270 mg/kg [Rabbit]. ORAL (LD50): Acute: 100 mg/kg [Rat]. DERMAL (LD50): Acute: 270 mg/kg [Rabbit].	TWA: 0.75 ppm	OSHA (Canada). STEL: 2 ppm TWA: 0.75 ppm
---	----------	-----	---	---------------	---

Trace impurities and additional material names not listed above may appear in other sections of this MSDS. These materials may be listed for toxicological concerns, local compliance, or other reasons.

Section 3. Physical Data

Physical State and Appearance	Liquid.
Color	Not available.
Odor	Not available.
Taste	Not available.
Molecular Weight	Not applicable.
pH (1% soln/water)	Neutral.
Boiling Point	The lowest known value is 78.5°C (173.3°F) (Ethanol). Weighted average: 122.05°C (251.7°F)
Melting Point	May start to solidify at -33°C (-27.4°F) based on data for: 2-Heptanone. Weighted average: -85.16°C (-121.3°F)
Critical Temperature	Not available.
Specific Gravity	1.16 (Water = 1)
Vapor Pressure	The highest known value is 5.7 kPa (43 mm Hg) (at 20°C) (Ethanol). Weighted average: 1.54 kPa (11.55 mm Hg) (at 20°C)
Vapor Density	The highest known value is 4 (Air = 1) (Acetic acid, 2-methylpropyl ester). Weighted average: 3.44 (Air = 1)
Volatility	Not available.
Odor Threshold	The lowest known value is 0.02 ppm (2-Heptanone) Weighted average: 21.21 ppm
Water/Oil Dist. Coeff.	The product is much more soluble in octanol.
Ionicity (in Water)	Not available.
Dispersion Properties	Is not dispersed in cold water, hot water, methanol. See solubility in methanol, diethyl ether, n-octanol, acetone.
Solubility	Easily soluble in methanol, diethyl ether, n-octanol, acetone. Insoluble in cold water, hot water.

Section 4. Fire and Explosion Hazard

The Product is:	Flammable.
Fire Hazards in Presence of Various Substances	Flammable in presence of open flames, sparks and static discharge.
Fire Fighting Media and Instructions	SMALL FIRE: Use DRY chemical powder. LARGE FIRE: Use water spray or fog. Never direct a water jet in the container in order to prevent any splashing of the product which could cause spreading of the fire. Cool containing vessels with water jet in order to prevent pressure build-up, autoignition or explosion.
Special Remarks on Fire Hazards	Vapor may travel considerable distance to source of ignition and flash back. When heated to decomposition it emits acrid smoke and fumes. (Acetic acid, 2-methylpropyl ester)
Flash Points	The lowest known value is Closed cup: 6°C (42.8°F). (Tagliabue.). Open cup: 9°C (48.2°F). (Tagliabue). (Benzene, methyl-)
Flammable Limits	The greatest known range is Lower: 3.3% Upper: 19% (Ethanol)
Auto-Ignition Temperature	The lowest known value is 393°C (739.4°F) (2-Heptanone).
Products of Combustion	These products are carbon oxides (CO, CO ₂), nitrogen oxides (NO, NO ₂ ...). Some metallic oxides.
Explosion Hazards in Presence of Various Substances	Risks of explosion of the product in presence of mechanical impact: Not available. Explosive in presence of open flames, sparks and static discharge.

Continued on Next Page

NEW 1997

Special Remarks on Explosion Hazards Not available.

Section 5. Reactivity Data

Stability The product is stable.

Decomposition products Not available.

Conditions of Instability Not available.

Incompatibility with various substances Reactive with oxidizing agents. Slightly reactive to reactive with reducing agents, organic materials, metals, acids, alkalis.

Corrosivity Not available.

Special Remarks on Reactivity Not available.

Special Remarks on Corrosivity Not available.

Section 6. Toxicological Properties

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

Toxicity to Animals Acute oral toxicity (LD50): 100 mg/kg [Rat]. (Formaldehyde).
Acute dermal toxicity (LD50): 270 mg/kg [Rabbit]. (Formaldehyde).
Acute toxicity of the vapor (LC50): 3500 ppm 4 hour(s) [Rat]. (Acetic acid, 2-methylpropyl ester).
Acute toxicity of the dust (LC50): >6820 mg/m³ 4 hour(s) [Rat]. (Titanium dioxide (TiO₂)).

Effects of Acute Exposure Very hazardous in case of skin contact (irritant). Hazardous in case of skin contact (sensitizer), of eye contact (irritant), of ingestion, of inhalation. Slightly hazardous in case of skin contact (permeator). Severe over-exposure can result in death.

Chronic Effects on Humans **CARCINOGENIC EFFECTS:** Classified 4 (Probably not for human.) by IARC, None. by OSHA [Titanium dioxide (TiO₂)]. Classified A4 (Not classifiable for human or animal.) by ACGIH [Ethanol]. Classified 1 (Proven for human.) by IARC [Formaldehyde]. Classified A2 (Suspected for human.) by ACGIH [Formaldehyde]. Classified A2 (Suspected for human.) by ACGIH, 2A (Probable for human.) by IARC [Formaldehyde]. Classified A5 (Not suspected for human.) by ACGIH, 4 (Probably not for human.) by IARC, None. by OSHA [1-Butanol].
MUTAGENIC EFFECTS: Not available.
TERATOGENIC EFFECTS: Not available.
DEVELOPMENTAL TOXICITY: Classified Reproductive system/toxin/female, Reproductive system/toxin/male [PROVEN] [Ethanol]. Classified Reproductive system/toxin/female, Reproductive system/toxin/male [PROVEN] [Formaldehyde]. Classified Reproductive system/toxin/female, Reproductive system/toxin/male [PROVEN] [Formaldehyde].
The substance is toxic to the nervous system, the reproductive system, liver.
Repeated or prolonged exposure to the substance can produce target organs damage. Repeated exposure to a highly toxic material may produce general deterioration of health by an accumulation in one or many human organs.

Special Remarks on Toxicity to Animals Formaldehyde has caused cancer in test animals at high concentrations (5-15 ppm). (Formaldehyde)

Special Remarks on Chronic Effects on Humans 0070 Passes through the placental barrier in human. (1-Propanol, 2-methyl-)

Special Remarks on Other Toxic Effects on Humans Material is irritating to mucous membranes and upper respiratory tract. (Acetic acid, 2-methylpropyl ester)

Exposure Limits Not available.

Section 7. Preventive Measures

Personal Protection	Splash goggles. Lab coat. Vapor respirator. Be sure to use an approved/certified respirator or equivalent. Gloves.
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.
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.
Small Spill	Absorb with an inert material and put the spilled material in an appropriate waste disposal.
Large Spill	Keep away from heat. Keep away from sources of ignition. 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 to reduce vapors. Prevent entry into sewers, basements or confined areas; dike if needed. Call for assistance on disposal.
Waste Disposal	Waste must be disposed of in accordance with federal, state and local environmental control regulations.
Precautions	Keep locked up. Keep away from heat. Keep away from sources of ignition. Ground all equipment containing material. Do not ingest. Do not breathe gas/fumes/ vapor/spray. Wear suitable protective clothing. In case of insufficient ventilation, wear suitable respiratory equipment. If ingested, seek medical advice immediately and show the container or the label. Avoid contact with skin and eyes. Keep away from incompatibles such as oxidizing agents.
Storage	Store in a segregated and approved area. Keep container in a cool, well-ventilated area. Keep container tightly closed and sealed until ready for use. Avoid all possible sources of ignition (spark or flame).
TDG Classification	3
PIN	1263 PAINT PG: II
Special Provisions for Transport	
Federal and State Regulations	<p>WARNING: This product contains chemical(s) known to the State of California to cause cancer, birth defects or other reproductive harm: Benzene, methyl-; Formaldehyde; Carbon Black</p> <p>WARNING: This product contains the following ingredients for which the State of California has found to cause birth defects which would require a warning under the statute: Benzene, methyl-</p> <p>WARNING: 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: Formaldehyde; Carbon Black</p> <p>Illinois toxic substances disclosure to employee act: Benzene, ethyl-</p> <p>New York release reporting list: Acetic Acid, Butyl Ester</p> <p>New York acutely hazardous substances: Benzene, ethyl-</p> <p>Rhode Island RTK hazardous substances: Benzene, ethyl-</p> <p>Pennsylvania RTK: Acetic acid, 2-methylpropyl ester; Benzene, methyl-; Benzene, ethyl-; Benzene, dimethyl-; Ethanol; Ethanol, 2-(2-butoxyethoxy)-; Acetic Acid, Butyl Ester;</p> <p>Florida: Benzene, ethyl-; Acetic Acid, Butyl Ester</p> <p>Minnesota: Benzene, ethyl-; Ethanol; Acetic Acid, Butyl Ester</p> <p>Massachusetts RTK: Acetic acid, 2-methylpropyl ester; Benzene, ethyl-; Ethanol; Acetic Acid, Butyl Ester</p> <p>New Jersey: Acetic acid, 2-methylpropyl ester; Benzene, methyl-; Benzene, ethyl-; Ethanol; Ethanol, 2-(2-butoxyethoxy)-; Acetic Acid, Butyl Ester;</p> <p>TSCA 8(b) inventory: Acetic acid, 2-methylpropyl ester; Benzene, methyl-; Benzene, ethyl-; Benzene, dimethyl-; Ethanol; N-Butyl Alcohol; Acetic Acid, Butyl Ester</p> <p>TSCA 5(e) substance consent order: Acetic Acid, Butyl Ester</p> <p>TSCA 8(d) H and S data reporting: Benzene, ethyl-</p> <p>TSCA 12(b) annual export notification: Acetic Acid, Butyl Ester</p> <p>SARA 302/304/311/312 extremely hazardous substances: Formaldehyde; N-Butyl Alcohol</p> <p>SARA 311/312 MSDS distribution - chemical inventory - hazard identification: Acetic acid, 2-methylpropyl ester: Fire hazard, Immediate (Acute) Health Hazard; Benzene, methyl-: Fire hazard, Immediate (Acute) Health Hazard, Delayed (Chronic) Health Hazard; Benzene, ethyl-: Fire hazard, Immediate (Acute) Health Hazard; Benzene, dimethyl-: Fire hazard, Immediate</p>

Continued on Next Page

(Acute) Health Hazard, Delayed (Chronic) Health Hazard; Methyl Amyl Ketone; Isobutyl alcohol: Fire hazard, Delayed (Chronic) Health Hazard; Cymel UI-27-EI; Acetic Acid, Butyl Ester
SARA 313 toxic chemical notification and release reporting: Benzene, methyl- 1.03989%; Benzene, dimethyl- 3.12418%; Formaldehyde 0.143609%; N-Butyl Alcohol 0.22152%
CERCLA: Hazardous substances.: Acetic acid, 2-methylpropyl ester; Benzene, methyl-: 1000 lbs. (453.6 kg); Benzene, ethyl-: 1000 lbs. (453.6 kg); Benzene, dimethyl-: 100 lbs. (45.36 kg); Isobutyl alcohol; N-Butyl Alcohol; Acetic Acid, Butyl Ester;

Other Regulations

OSHA: Hazardous by definition of Hazard Communication Standard (29 CFR 1910.1200).

Other Classifications

WHMIS (Canada) **Class B-2: Flammable liquid with a flash point lower than 37.8°C (100°F).**
Class D-1B: Material causing immediate and serious toxic effects (TOXIC).
Class D-2A: Material causing other toxic effects (VERY TOXIC).
Class D-2B: Material causing other toxic effects (TOXIC).

HCS (U.S.A.) Contains material which can cause cancer
Highly toxic material
Flammable liquid
Class: Target organ effects.
Reproductive toxin

Hazardous Material Information System (U.S.A.)

Health Hazard * 3
Fire Hazard 3
Reactivity 0
Personal Protection H

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

Health 3
Fire Hazard 3
Reactivity 0
Specific Hazard

Section 8. 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. Get medical attention.
- 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. Wash clothing before reuse. Thoroughly clean shoes before reuse. Get medical attention immediately.
- Hazardous Skin Contact** Wash with a disinfectant soap and cover the contaminated skin with an anti-bacterial cream. Seek immediate medical attention.
- Inhalation** If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical attention.
- Hazardous Inhalation** Evacuate the victim to a safe area as soon as possible. Loosen tight clothing such as a collar, tie, belt or waistband. If breathing is difficult, administer oxygen. If the victim is not breathing, perform mouth-to-mouth resuscitation. **WARNING:** It may be hazardous to the person providing aid to give mouth-to-mouth resuscitation when the inhaled material is toxic, infectious or corrosive. Seek medical attention.
- Ingestion** Do not induce vomiting. Examine the lips and mouth to ascertain whether the tissues are damaged, a possible indication that the toxic material was ingested; the absence of such signs, however, is not conclusive. Loosen tight clothing such as a collar, tie, belt or waistband. If the victim is not breathing, perform mouth-to-mouth resuscitation. Seek immediate medical attention.
- Hazardous Ingestion** Not available.

Section 9. Preparation Information

References	-Manufacturers Material Safety Data Sheets.
Other Special Considerations	Not available.
Related Information	This product has been classified in accordance with the hazard criteria of the CPR, and the MSDS contains all the information required by CPR.
Preparation Information	Validated by C.M. Kelly on 11/2/2004. Verified by C.M. Kelly. Printed 9/15/2005.
Information Contact	Prepared by the Health, Safety and Environment Department, Chemcraft International Inc., P.O. Box 458, 155, Rose Glen Road North, Port Hope, ON. Canada. Phone: 905 885-6388 Fax: 905 885-5097

Notice to Reader

To the best of our knowledge, the information contained herein is accurate. However, neither the above named supplier nor any of its subsidiaries assumes any liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist.