

SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: CytoFix

SYNONYMS: Buffered cell wash preservative solution

CATALOG CODES: VCX

MANUFACTURER: Volu-Sol

ADDRESS: 5095 West 2100 South
Salt Lake City, UT 84120

EMERGENCY PHONE: (800) 535-5053

OTHER CALLS: (801) 974-9474

FAX: (801) 974-9553

CHEMICAL FAMILY: -

CHEMICAL FORMULA: -

PREPARED BY: Volu-Sol

RECOMMENDED USE: Laboratory chemical

RESTRICTIONS ON USE: Use as recommended

SECTION 2: HAZARD(S) IDENTIFICATION

EMERGENCY OVERVIEW:

GHS Classification: Flammable Liquids (Category 3)
Acute Toxicity, Oral (Category 4)
Acute Toxicity, Inhalation (Category 4)
Acute Toxicity, Dermal (Category 4)
Specific target organ toxicity (Category 1)
Single Exposure

GHS LABEL ELEMENTS:

Pictogram: 

Signal Word: Danger

Hazard Statement(s):

H226 Flammable liquid and vapour
H302 Harmful if swallowed
H312 Harmful in contact with skin
H332 Harmful if inhaled
H370 Causes damage to organs

Precautionary Statement(s):

P210 Keep away from heat/sparks/open flames/hot surfaces. - No smoking.;

P233 Keep container tightly closed.;

P260 Do not breathe dust/fume/gas/mist/vapours/spray.;

P264 Wash hands thoroughly after handling.;

P270 Do not eat, drink or smoke when using this product.;

P280 Wear protective gloves/protective clothing/eye protection/face protection.

P301+P310+P330 IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician. Rinse mouth

P301 + P312 IF SWALLOWED Call a POISON CENTER or doctor/physician if you feel unwell.;

P303 + P361 + P353 IF ON SKIN (or hair) Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.;

P304 + P340 IF INHALED Remove victim to fresh air and keep at rest in a position comfortable for breathing.;

P305 + P351 + P338 IF IN EYES Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.;

P307 + P311 IF exposed Call a POISON CENTER or doctor/physician.;

P330 Rinse mouth.;

P363 Wash contaminated clothing before reuse.

P403 + P235 Store in a well-ventilated place. Keep cool.;

P405 Store locked up.

P501 Dispose of contents/container to an approved waste disposal plant

OTHER HAZARDS: -

HMIS Classification:

Health hazard: 2

Chronic health hazard: -

Flammability: 3

Physical hazards: 0

NFPA Rating:

Health hazard: 2

Fire: 3

Reactivity Hazard: 0

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

INGREDIENT	CAS NO. EC-NO. Index-NO.
Methanol (14-25%)	67-56-1 200-659-6 603-001-00-X
2-[Bis(2-hydroxyethyl)amino]-2-(hydroxymethyl)propane-1,3-diol (1-5%)	6976-37-0 230-237-7

SECTION 4: FIRST AID MEASURES

INHALATION: Remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Consult a physician

INGESTION: Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician

SKIN: Immediately flush skin with plenty of soap and water. Remove contaminated clothing and shoes, wash before reuse. Consult a physician

EYE: Immediately flush eyes with plenty of water for at least 15 minutes. Consult a physician

SECTION 5: FIRE-FIGHTING MEASURES

FLAMMABLE LIMITS IN AIR: **Percentage by Volume**
Upper: -%
Lower: -%

FLASH POINT: 41 °C / 105 °F – closed cup

AUTOIGNITION TEMPERATURE: -

EXTINGUISHING MEDIA: Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide

FIRE FIGHTING PROCEDURES: Wear self-contained breathing apparatus for firefighting if necessary

FIRE AND EXPLOSION HAZARDS: Use water spray to cool unopened containers

SECTION 6: ACCIDENTAL RELEASE MEASURES

ACCIDENTAL RELEASE MEASURES: Wear respiratory protection. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Evacuate personnel to safe areas. Beware of vapours accumulating to form explosive concentrations. Vapours can accumulate in low areas. Prevent further leakage or spillage if safe to do so. Do not let product enter drains. Contain spillage, and then collect with an electrically protected vacuum cleaner or by wet-brushing and place in container for disposal according to local regulations

SECTION 7: HANDLING AND STORAGE

HANDLING AND STORAGE: Avoid contact with skin and eyes. Avoid inhalation of vapour or mist. Use explosion-proof equipment. Keep away from sources of ignition. Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage. Containers of this material may be hazardous when empty since they retain product residues (vapours, liquid); observe all warnings and precautions listed for the product. Take measures to prevent the buildup of electrostatic charge. No smoking

INCOMPATIBILITIES: Acid chlorides, acid anhydrides, oxidizing agents

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

EXPOSURE LIMITS: Reported in a time-weighted average (TWA)

Component	CAS-No.	Reference	OSHA		ACGIH	
			ppm	mg/m ³	ppm	mg/m ³
Methanol	67-56-1		200	260	200	260
			PEL	PEL	TLV	TLV

VENTILATION SYSTEM: Local and/or general exhaust is recommended to keep exposure below limits. Local exhaust ventilation is preferred for control of the emissions at its source, preventing dispersion into the general work area. Please refer to the ACGIH document, *Industrial Ventilation: A Manual of Recommended Practices*, for details

PERSONAL RESPIRATORS: If exposure limit is exceeded and engineering controls are not feasible, a half-face organic vapour respirator may be worn for up to ten times the exposure limit, or the maximum use concentration specified by the appropriate regulatory agency or respirator supplier; whichever is lowest. A full-face piece organic vapour respirator may be worn up to 50 times the exposure limit, or the maximum use concentration specified by the appropriate regulatory agency or respirator supplier, whichever is lowest. For emergencies or instances where the exposure levels are not known, use a full-face, positive-pressure, air-supplied respirator. **WARNING:** Air-purifying respirators do not protect workers in oxygen-deficient atmospheres

SKIN PROTECTION: Wear impervious protective clothing, including boots, gloves, lab coat, apron or coveralls, as appropriate, to prevent skin contact. Use proper glove removal technique to avoid skin contact with this product. Wash and dry hands

EYE PROTECTION: Use chemical safety goggles and/or a full face shield where splashing is possible. Maintain eye wash fountain and quick-drench facilities in work area

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE:	liquid
ODOR:	-
SOLUBILITY:	-
pH:	7
BOILING POINT:	-
MELTING POINT:	-
VAPOR PRESSURE:	-
SPECIFIC GRAVITY:	-
MOLECULAR WEIGHT:	-
DENSITY:	-
VISCOSITY:	-
REFRACTIVE INDEX:	-

SECTION 10: STABILITY AND REACTIVITY

CHEMICAL STABILITY:	Stable under recommended conditions of use and storage
CONDITIONS TO AVOID:	Heat, flames, ignition sources
HAZARDOUS DECOMPOSITION OR BY-PRODUCTS:	No data available

SECTION 11: TOXICOLOGICAL INFORMATION

TOXICOLOGICAL INFORMATION:	
Acute Toxicity:	No data available
Skin/Eye Irritation:	No data available
Carcinogenicity:	No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen
ROUTES OF ENTRY:	-

SECTION 12: ECOLOGICAL INFORMATION

ECOLOGICAL INFORMATION:	
Toxicity:	No data available
Persistence and degradability:	No data available
Mobility in soil:	No data available
PBT/vPvB Results:	PBT/vPvB assessment not available as chemical safety assessment not required/not conducted

SECTION 13: DISPOSAL CONSIDERATIONS

WASTE DISPOSAL METHOD: Burn in a chemical incinerator equipped with an afterburner and scrubber but exert extra care in igniting as this material is highly flammable. Whatever cannot be saved for recovery or recycling should be handled as hazardous waste and sent to a RCRA approved incinerator or disposed in an RCRA approved waste facility. Processing, use, or contamination of this product may change the waste management options. State and local disposal regulations may differ from federal disposal regulations. Dispose of container and unused contents in accordance with federal, state, and local requirements. Dispose of as unused product

SECTION 14: TRANSPORT INFORMATION

US DOT	IATA	TDG	IMDG/IMO
Shipping Name: Flammable liquid, n.o.s.	Shipping Name: Flammable liquid, n.o.s.	Shipping Name: Flammable liquid, n.o.s.	Shipping Name: Flammable liquid, n.o.s.
Hazard Class: 3	Hazard Class: 3	Hazard Class: 3	Hazard Class: 3
UN Number: 1993	UN Number: 1993	UN Number: 1993	UN Number: 1993
Packing Group: III	Packing Group: III	Packing Group: III	Packing Group: III

SECTION 15: REGULATORY INFORMATION

SARA 302	-
SARA 313	67-56-1
SARA 311/312 Hazards	Fire hazard, Acute Health Hazard, Chronic Health Hazard
State	Right to know lists: MA: 67-56-1 PA: 67-56-1, 57-55-6 NJ: 67-56-1, 57-55-6, 6976-37-0 California Prop. 65 Components: 67-56-1

SECTION 16: OTHER INFORMATION

Disclaimer: The information is provided without any representation or warranty, express or implied, regarding the accuracy or correctness. The conditions or methods of handling, storage, use, and disposal of the product are beyond our control and may be beyond our knowledge. For this and other reasons, we do 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 the product.