93060

Nasco

NASCO-Guard® Preserved Specimens

Safety Data Sheet

According To Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules And Regulations
Revision Date: 05/21/2015 Date of issue: 05/21/2015 Supersedes Date: 01/02/2014 Version: 1.0

SECTION 1: IDENTIFICATION

Product Identifier

Product Name: NASCO-Guard® Preserved Specimens

Intended Use of the Product

Science education applications.

Name, Address, and Telephone of the Responsible Party

Nasco
901 Janesville Ave.
Fort Atkinson, WI 53538-0901
800-558-9595

Emergency Telephone Number

Emergency Number: 800-558-9595 (7am-4pm CST, M-F) 24-Hour Emergency Contact — CHEMTREC 800-424-9300

SECTION 2: HAZARDS IDENTIFICATION

This document has been prepared in accordance with the SDS requirements of the OSHA Hazard Communication Standard 29 CFR 1910.1200.

Classification of the Substance or Mixture

Classification (GHS-US)

Skin Irrit. 2	H315
Eye Irrit. 2A	H319
Skin Sens. 1	H317
Carc. 2	H351

Full text of H-phrases: see section 16

Label Elements

GHS-US Labeling

Signal Word (GHS-US): **WARNING**

Hazard Pictograms (GHS-US):

GHS07 GHS08

Hazard Statements (GHS-US):

H315 - Causes skin irritation.
H317 - May cause an allergic skin reaction.
H319 - Causes serious eye irritation.
H351 - Suspected of causing cancer.

Precautionary Statements (GHS-US):

P201 - Obtain special instructions before use.
P202 - Do not handle until all safety precautions have been read and understood.
P261 - Avoid breathing vapors, mist, or spray.
P264 - Wash hands, forearms, and other exposed areas thoroughly after handling.
P272 - Contaminated work clothing must not be allowed out of the workplace.
P280 - Wear protective gloves, protective clothing, and eye protection.
P302+P352 - IF ON SKIN: Wash with plenty of water.
P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P308+P313 - If exposed or concerned: Get medical advice/attention.
P333+P313 - If skin irritation or rash occurs: Get medical advice/attention.
P337+P313 - If eye irritation persists: Get medical advice/attention.
P362+P364 - Take off contaminated clothing and wash it before reuse.
P405 - Store locked up.
P501 - Dispose of contents/container in accordance with local, regional, national, and international regulations.

Other Hazards

Exposure may aggravate those with pre-existing eye, skin, or respiratory conditions.

Unknown Acute Toxicity (GHS-US)

No data available.

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

Substance

Not applicable.

Mixture

Name	Product Identifier	%	Classification (GHS-US)
1,2-Propylene glycol	(CAS No) 57-55-6	< 50	Not classified
Water	(CAS No) 7732-18-5	Balance	Not classified
Phenol	(CAS No) 108-95-2	< 1	Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Dermal), H311 Acute Tox. 3 (Inhalation:gas), H331 Skin Corr. 1B, H314 Eye Dam. 1, H318 Muta. 2, H341 STOT RE 2, H373 Aquatic Acute 3, H402
Formaldehyde	(CAS No) 50-00-0	0.1 - 0.5	Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Dermal), H311 Acute Tox. 3 (Inhalation:gas), H331 Skin Corr. 1B, H314 Eye Dam. 1, H318 Skin Sens. 1, H317 Carc. 2, H351 Aquatic Acute 2, H401

Full text of H-phrases: See section 16.

SECTION 4: FIRST AID MEASURES

Description of First-Aid Measures

General First-Aid Measures: Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label if possible).

Inhalation: Remove to fresh air and keep at rest in a position comfortable for breathing. Obtain medical attention if breathing difficulty persists.

Skin Contact: Remove contaminated clothing. Gently wash skin with plenty of soap and water followed by rinsing with water for at least 15 minutes. Call a POISON CENTER or doctor if you feel unwell. Wash contaminated clothing before reuse.

Eye Contact: Rinse cautiously with water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Obtain medical attention.

Ingestion: Do NOT induce vomiting. Rinse mouth. Immediately call a POISON CENTER or doctor.

Most Important Symptoms and Effects, Both Acute and Delayed

General Symptoms/Injuries: Causes skin irritation. Causes serious eye irritation. May cause an allergic skin reaction.

Inhalation: May cause respiratory irritation. Suspected of causing cancer by inhalation. Formaldehyde has been classified as a known human carcinogen. The risk of injury depends on duration and level of exposure. This product contains a small amount of formaldehyde; exposures during expected use conditions are expected to be low.

Skin Contact: Causes skin irritation. Redness, pain, swelling, itching, burning, dryness, and dermatitis.May cause an allergic skin reaction.

Eye Contact: Causes serious eye irritation. Redness, pain, swelling, itching, burning, tearing, and blurred vision.

Ingestion: Ingestion is likely to be harmful or have adverse effects. Ingestion of this product is unlikely, however, if ingested in sufficient quantities, it may cause metabolic acidosis.

Chronic Symptoms: Suspected of causing cancer by inhalation.May cause an allergic skin reaction.

Indication of Any Immediate Medical Attention and Special Treatment Needed

If you feel unwell, seek medical advice (show the label where possible).

SECTION 5: FIRE-FIGHTING MEASURES

Extinguishing Media

Suitable Extinguishing Media: Water spray, fog, alcohol-resistant foam, carbon dioxide (CO_2), dry chemical.

Unsuitable Extinguishing Media: Do not use a heavy water stream. Use of heavy stream of water may spread fire.

Special Hazards Arising from the Substance or Mixture

Fire Hazard: Not considered flammable but may burn at high temperatures.

Explosion Hazard: Product is not explosive.

Reactivity: Hazardous reactions will not occur under normal conditions.

Advice for Firefighters

Precautionary Measures Fire: Exercise caution when fighting any chemical fire.

Firefighting Instructions: Use water spray or fog for cooling exposed containers. In case of major fire and large quantities: Evacuate area.

Protection During Firefighting: Do not enter fire area without proper protective equipment, including respiratory protection.

Hazardous Combustion Products: Under expected usage conditions, hazardous decomposition products are not expected. Hazardous decomposition products such as carbon monoxide, aldehydes, alcohols, ethers, organic acids, and other compounds may be generated when material is subjected to high temperatures or fires.

Other Information: Refer to Section 9 for flammability properties.

SECTION 6: ACCIDENTAL RELEASE MEASURES

Personal Precautions, Protective Equipment, and Emergency Procedures

General Measures: Avoid all contact with skin, eyes, or clothing. Avoid breathing (vapor, mist, spray).

For Non-Emergency Personnel

Emergency Procedures: Evacuate unnecessary personnel.

For Emergency Responders

Protective Equipment: Equip cleanup crew with proper protection.

Emergency Procedures: Stop leak if safe to do so. Eliminate ignition sources. Ventilate area.

Environmental Precautions

Prevent entry to sewers and public waters. Notify authorities if liquid enters sewers or public waters.

Methods and Material for Containment and Cleaning Up

For Containment: Contain any spills with dikes or absorbents to prevent migration and entry into sewers or streams.

Methods for Cleaning Up: Clean up spills immediately and dispose of waste safely. Spills should be contained with mechanical barriers. Transfer spilled material to a suitable container for disposal. Contact competent authorities after a spill.

Reference to Other Sections

See Heading 8. Exposure controls and personal protection. For further disposal information refer to section 13.

SECTION 7: HANDLING AND STORAGE

Precautions for Safe Handling

Hygiene Measures: Handle in accordance with good industrial hygiene and safety procedures. Wash hands and other exposed areas with mild soap and water before eating, drinking, or smoking and when leaving work.

Conditions for Safe Storage, Including Any Incompatibilities

Technical Measures: Comply with applicable regulations.

Storage Conditions: Store in a dry, cool, and well-ventilated place. Keep container closed when not in use. Keep/store away from direct sunlight, extremely high or low temperatures, and incompatible materials.

Incompatible Products: Strong acids. Strong bases. Strong oxidizers.

Specific End Use(s) Science education applications.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

Control Parameters

For substances listed in section 3 that are not listed here, there are no established exposure limits from the manufacturer, supplier, importer, or the appropriate advisory agency including: ACGIH (TLV), NIOSH (REL), or OSHA (PEL).

Formaldehyde (50-00-0)		
USA ACGIH	ACGIH Ceiling (ppm)	0.3 ppm
USA ACGIH	ACGIH chemical category	Sensitizer, Suspected Human Carcinogen
USA NIOSH	NIOSH REL (TWA) (ppm)	0.016 ppm
USA NIOSH	NIOSH REL (ceiling) (ppm)	0.1 ppm
USA IDLH	US IDLH (ppm)	20 ppm
USA OSHA	OSHA PEL (TWA) (ppm)	0.75 ppm
USA OSHA	OSHA PEL (STEL) (ppm)	2 ppm (see 29 CFR 1910.1048)

Phenol (108-95-2)		
USA ACGIH	ACGIH TWA (ppm)	5 ppm
USA ACGIH	ACGIH chemical category	Skin - potential significant contribution to overall exposure by the cutaneous route, Not Classifiable as a Human Carcinogen
USA NIOSH	NIOSH REL (TWA) (mg/m³)	19 mg/m³
USA NIOSH	NIOSH REL (TWA) (ppm)	5 ppm
USA NIOSH	NIOSH REL (ceiling) (mg/m³)	60 mg/m³
USA NIOSH	NIOSH REL (ceiling) (ppm)	15.6 ppm
USA IDLH	US IDLH (ppm)	250 ppm
USA OSHA	OSHA PEL (TWA) (mg/m³)	19 mg/m³
USA OSHA	OSHA PEL (TWA) (ppm)	5 ppm
USA OSHA	Limit value category (OSHA)	prevent or reduce skin absorption

Exposure Controls

Appropriate Engineering Controls: Ensure adequate ventilation, especially in confined areas. Emergency eye wash fountains and safety showers should be available in the immediate vicinity of any potential exposure. Ensure all national/local regulations are observed.

Personal Protective Equipment: Protective goggles. Gloves. Protective clothing. Insufficient ventilation: Wear respiratory protection.

Materials for Protective Clothing: Chemically resistant materials and fabrics.

Hand Protection: Wear chemically resistant protective gloves.

Eye Protection: Chemical safety goggles.

Skin and Body Protection: Wear suitable protective clothing.

Respiratory Protection: If exposure limits are exceeded or irritation is experienced, approved respiratory protection should be worn.

Environmental Exposure Controls: Do not allow the product to be released into the environment.

Consumer Exposure Controls: Do not eat, drink, or smoke during use.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Information on Basic Physical and Chemical Properties

Physical State: Liquid.

Appearance: Clear, colorless liquid.

Odor: Faint disinfectant-like odor.

Odor Threshold: No data available.

pH: No data available.

Evaporation Rate: No data available.

Melting Point:	No data available.
Freezing Point:	No data available.
Boiling Point:	No data available.
Flash Point:	No data available.
Auto-ignition Temperature:	No data available.
Decomposition Temperature:	No data available.
Flammability (solid, gas):	No data available.
Vapor Pressure:	No data available.
Relative Vapor Density at 20° C:	No data available.
Relative Density:	No data available.
Solubility:	No data available.
Partition Coefficient; N-Octanol/Water:	No data available.
Viscosity:	No data available.

Other Information No additional information available.

SECTION 10: STABILITY AND REACTIVITY

Reactivity: Hazardous reactions will not occur under normal conditions.

Chemical Stability: Stable under recommended handling and storage conditions (see section 7).

Possibility of Hazardous Reactions: Hazardous polymerization will not occur.

Conditions to Avoid: Direct sunlight. Extremely high or low temperatures. Ignition sources. Incompatible materials.

Incompatible Materials: Strong acids. Strong bases. Strong oxidizers.

Hazardous Decomposition Products: Under expected usage conditions, hazardous decomposition products are not expected. Hazardous decomposition products such as carbon monoxide, aldehydes, alcohols, ethers, organic acids, and other compounds may be generated when material is subjected to high temperatures or fires.

SECTION 11: TOXICOLOGICAL INFORMATION

Information on Toxicological Effects

Acute Toxicity: Not classified.

1,2-Propylene glycol (57-55-6)	
LD50 Oral Rat	20000 mg/kg
LD50 Dermal Rabbit	20800 mg/kg
Formaldehyde (50-00-0)	
LD50 Oral Rat	100 mg/kg
LD50 Dermal Rat	270 mg/kg
ATE (Gases)	700.00 ppmV/4h
Phenol (108-95-2)	
LD50 Oral Rat	340 mg/kg
LD50 Dermal Rabbit	630 mg/kg
LC50 Inhalation Rat	0.316 mg/l/4h (reported as 316 mg/m3/4h)
ATE (Oral)	100.00 mg/kg body weight
ATE (Gases)	700.00 ppmV/4h
ATE (Vapors)	0.32 mg/l/4h
ATE (Dust/Mist)	0.32 mg/l/4h

Skin Corrosion/Irritation: Causes skin irritation.

Serious Eye Damage/Irritation: Causes serious eye irritation.

Respiratory or Skin Sensitization: May cause an allergic skin reaction.

Germ Cell Mutagenicity: Not classified.

Carcinogenicity: Suspected of causing cancer.

Formaldehyde (50-00-0)	
IARC group	1
National Toxicology Program (NTP) Status	Known Human Carcinogens.
OSHA Hazard Communication Carcinogen List	In OSHA Hazard Communication Carcinogen list.
OSHA Specifically Regulated Carcinogen List	In OSHA Specifically Regulated Carcinogen list.

Phenol (108-95-2)	
IARC group	3
National Toxicology Program (NTP) Status	Twelfth Report - Items under consideration.

Reproductive Toxicity: Not classified.

Specific Target Organ Toxicity (Single Exposure): Not classified.

Specific Target Organ Toxicity (Repeated Exposure): Not classified.

Aspiration Hazard: Not classified.

Inhalation Symptoms/Injuries: May cause respiratory irritation. Suspected of causing cancer by inhalation. Formaldehyde has been classified as a known human carcinogen. The risk of injury depends on duration and level of exposure. This product contains a small amount of formaldehyde; exposures during expected use conditions are expected to be low.

Skin Contact Symptoms/Injuries: Causes skin irritation. Redness, pain, swelling, itching, burning, dryness, and dermatitis.May cause an allergic skin reaction.

Eye Contact Symptoms/Injuries: Causes serious eye irritation. Redness, pain, swelling, itching, burning, tearing, and blurred vision.

Ingestion Symptoms/Injuries: Ingestion is likely to be harmful or have adverse effects. Ingestion of this product is unlikely, however, if ingested in sufficient quantities, it may cause metabolic acidosis.

Chronic Symptoms: Suspected of causing cancer by inhalation. May cause an allergic skin reaction.

SECTION 12: ECOLOGICAL INFORMATION

Toxicity

1,2-Propylene glycol (57-55-6)	
LC50 Fish 1	51600 mg/l (Exposure time: 96 h - Species: Oncorhynchus mykiss [static])
EC50 Daphnia 1	10000 mg/l (Exposure time: 24 h - Species: Daphnia magna)
EC50 Daphnia 2	1000 mg/l (Exposure time: 48 h - Species: Daphnia magna [Static])

Formaldehyde (50-00-0)	
LC50 Fish 1	22.6 - 25.7 mg/l (Exposure time: 96 h - Species: Pimephales promelas [flow-through])
EC50 Daphnia 1	2 mg/l (Exposure time: 48 h - Species: Daphnia magna)
LC 50 Fish 2	1510 µg/l (Exposure time: 96 h - Species: Lepomis macrochirus [static])
EC50 Daphnia 2	11.3 - 18 mg/l (Exposure time: 48 h - Species: Daphnia magna [static])

Phenol (108-95-2)	
LC50 Fish 1	11.9 - 50.5 mg/l (Exposure time: 96 h - Species: Pimephales promelas [flow-through])
EC50 Daphnia 1	4.24 - 10.7 mg/l (Exposure time: 48 h - Species: Daphnia magna [static])
LC 50 Fish 2	20.5 - 25.6 mg/l (Exposure time: 96 h - Species: Pimephales promelas [static])
EC50 Daphnia 2	10.2 - 15.5 mg/l (Exposure time: 48 h - Species: Daphnia magna)

Persistence and Degradability No additional information available.

Bioaccumulative Potential

1,2-Propylene glycol (57-55-6)	
BCF fish 1	< 1
Log Pow	-0.92

Formaldehyde (50-00-0)	
Log Pow	0.35 (at 25 °C)

Phenol (108-95-2)	
BCF fish 1	(no significant bioaccumulation)
Log Pow	1.47

Mobility in Soil No additional information available.

Other Adverse Effects

Other Information: Avoid release to the environment.

SECTION 13: DISPOSAL CONSIDERATIONS

Waste Treatment Methods

Waste Disposal Recommendations: Dispose of waste material in accordance with all local, regional, national, and international regulations.

SECTION 14: TRANSPORT INFORMATION

In Accordance with DOT Not regulated for transport.

In Accordance with IMDG Not regulated for transport.

In Accordance with IATA Not regulated for transport.

SECTION 15: REGULATORY INFORMATION

US Federal Regulations

NASCO-Guard® Preserved Specimens	
SARA Section 311/312 Hazard Classes	Immediate (acute) health hazard. Delayed (chronic) health hazard.

1,2-Propylene glycol (57-55-6)	
Listed on the United States TSCA (Toxic Substances Control Act) Inventory	
EPA TSCA Regulatory Flag	Y2 - Y2 - indicates an exempt polymer that is a polyester and is made only from reactants included in a specified list of low concern reactants that comprises one of the eligibility criteria for the exemption rule.

Formaldehyde (50-00-0)	
Listed on the United States TSCA (Toxic Substances Control Act) Inventory Listed on the United States SARA Section 302 Listed on United States SARA Section 313	
SARA Section 302 Threshold Planning Quantity (TPQ)	500
SARA Section 311/312 Hazard Classes	Delayed (chronic) health hazard. Immediate (acute) health hazard. Fire hazard.
SARA Section 313 - Emission Reporting	0.1 %

Phenol (108-95-2)	
Listed on the United States TSCA (Toxic Substances Control Act) Inventory. Listed on the United States SARA Section 302. Listed on United States SARA Section 313.	
EPA TSCA Regulatory Flag	T - T - Indicates a substance that is the subject of a Section 4 test rule under TSCA.
SARA Section 302 Threshold Planning Quantity (TPQ)	≤ 10000
SARA Section 313 - Emission Reporting	1.0 %

Water (7732-18-5)
Listed on the United States TSCA (Toxic Substances Control Act) Inventory

US State Regulations

Formaldehyde (50-00-0)	
U.S. - California - Proposition 65 - Carcinogens List	WARNING: This product contains chemicals known to the State of California to cause cancer.

1,2-Propylene glycol (57-55-6)
U.S. - New Jersey - Right to Know Hazardous Substance List U.S. - Pennsylvania - RTK (Right to Know) List

Formaldehyde (50-00-0)
U.S. - Massachusetts - Right To Know List U.S. - New Jersey - Right to Know Hazardous Substance List

U.S. - Pennsylvania - RTK (Right to Know) - Environmental Hazard List
U.S. - Pennsylvania - RTK (Right to Know) - Special Hazardous Substances
U.S. - Pennsylvania - RTK (Right to Know) List

Phenol (108-95-2)
U.S. - Massachusetts - Right To Know List
U.S. - New Jersey - Right to Know Hazardous Substance List
U.S. - Pennsylvania - RTK (Right to Know) - Environmental Hazard List
U.S. - Pennsylvania - RTK (Right to Know) List

SECTION 16: OTHER INFORMATION, INCLUDING DATE OF PREPARATION OR LAST REVISION

Revision Date: 05/21/2015

Other Information: This document has been prepared in accordance with the SDS requirements of the OSHA Hazard Communication Standard 29 CFR 1910.1200.

GHS Full Text Phrases:

Acute Tox. 3 (Dermal)	Acute Toxicity (dermal) Category 3
Acute Tox. 3 (Inhalation: gas)	Acute Toxicity (inhalation: gas) Category 3
Acute Tox. 3 (Oral)	Acute Toxicity (oral) Category 3
Aquatic Acute 2	Hazardous to the Aquatic Environment - Acute Hazard Category 2
Aquatic Acute 3	Hazardous to the Aquatic Environment - Acute Hazard Category 3
Carc. 2	Carcinogenicity Category 2
Eye Dam. 1	Serious Eye Damage/Eye Irritation Category 1
Eye Irrit. 2A	Serious Eye Damage/Eye Irritation Category 2A
Muta. 2	Germ Cell Mutagenicity Category 2
Skin Corr. 1B	Skin Corrosion/Irritation Category 1B
Skin Irrit. 2	Skin Corrosion/Irritation Category 2
Skin Sens. 1	Skin Sensitization Category 1
STOT RE 2	Specific Target Organ Toxicity (repeated exposure) Category 2
H301	Toxic if swallowed.
H311	Toxic in contact with skin.
H314	Causes severe skin burns and eye damage.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H319	Causes serious eye irritation.
H331	Toxic if inhaled.
H341	Suspected of causing genetic defects.
H351	Suspected of causing cancer.
H373	May cause damage to organs through prolonged or repeated exposure.
H401	Toxic to aquatic life.
H402	Harmful to aquatic life.

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety, and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.

SDS US (GHS HazCom)

NP069-15