Safety Data Sheet · OSHA HCS 2024

Arctic Assist 50/50 Technical Grade

Technical · 49.97%

Standard	Revised	Emergency
OSHA HCS 2024 · GHS Rev. 7	2026-11-12	Chemtel 1-800-255-3924 (24/7)

1 Identification

Product Identifier	Arctic Assist 50/50 Technical Grade
Grade	Technical
Concentration	50% v/v
CAS Number	57-55-6
Chemical Formula	C3H8O2
Molecular Weight	76.09 g/mol
Manufacturer	Alliance Chemical 204 South Edmond Street, Taylor, TX 76574
Emergency Phone	Chemtel 1-800-255-3924 (24/7)
Recommended Use	Industrial / laboratory chemical. See Section 7.
Restrictions on Use	No restrictions identified beyond the conditions of safe use in Sections 7 and 8.

2 Hazard Identification

Signal Word	Not applicable
Hazard Statements	Not classified as hazardous under GHS based on available data.
Precautionary Statements	No specific GHS precautionary statements required.

3 Composition / Information on Ingredients

Component	CAS No.	Formula	Concentration
Propylene Glycol	57-55-6	$C_3H_8O_2$	50.0-51.0% v/v (50.7-51.8% w/w)
Corrosion inhibitor + dye package (nitrite-containing hybrid organic-acid)	Mixture	Mixture	<3% (w/w)
Sodium Nitrite (in inhibitor package)	7632-00-0	$NaNO_2$	<0.6% (w/w)
Triethanolamine (in inhibitor package)	102-71-6	$C_6H_{15}NO_3$	<0.3% (w/w)
Sodium Benzoate (in inhibitor package)	532-32-1	$C_7H_5NaO_2$	<0.09% (w/w)

Component	CAS No.	Formula	Concentration
Sodium Molybdate Dihydrate (in inhibitor package)	10102-40-6	$Na_2MoO_4 \cdot 2H_2O$	<0.06% (w/w)
Water	7732-18-5	H_2O	Balance (w/w)

Concentrations are nominal; lot-specific values appear on the Certificate of Analysis. Components not contributing to classification are omitted.

4 First-Aid Measures

Eyes	Rinse with water. Get medical attention if irritation develops or persists.
Skin	Wash with soap and water. Get medical attention if irritation develops.
Inhalation	Move to fresh air if discomfort occurs.
Ingestion	Rinse mouth with water. Get medical attention if you feel unwell.
Most Important Symptoms and Effects	No specific symptoms are expected from the hazards identified in Section 2.
Immediate Medical Attention and Special Treatment	Treat symptomatically. Get medical attention if symptoms develop or persist.

5 Fire-Fighting Measures

Suitable Extinguishing Media	Use water spray, alcohol-resistant foam, dry chemical, or CO2. Use measures appropriate to local circumstances.
Unsuitable Extinguishing Media	Do not use a solid water stream as it may scatter and spread fire.
Specific Hazards Arising from the Chemical	Containers may rupture when heated.
Protective Equipment	Wear self-contained breathing apparatus and full protective clothing.
Hazardous Combustion Products	Carbon monoxide and carbon dioxide on combustion; aldehydes, alcohols, ethers and organic acids on oxidation at high temperature.

6 Accidental Release Measures

Personal Precautions	Wear safety glasses and gloves for cleanup. Spills can make floors slippery.
Environmental Precautions	Avoid releasing large quantities to drains or waterways.
Containment & Cleanup	Absorb or wipe up, then rinse the area with water. Dispose of according to local regulations.

7 Handling and Storage

Safe Handling	Use with adequate ventilation. Avoid contact with skin, eyes, and clothing. Wash thoroughly after handling. Keep container closed when not in use.
Safe Storage	Store in a cool, dry, well-ventilated area. Keep away from incompatible materials (see Section 10). Keep containers tightly closed.
Specific Storage Precautions	Keep closed in a cool place away from oxidizers. Protect from freezing below the rated freeze point. Stainless steel, carbon steel, polyethylene or polypropylene containers.

8 Exposure Controls / Personal Protection

Occupational Exposure Limits

No established occupational exposure limits.

Engineering Controls	General ventilation is normally adequate.
Eye/Face Protection	Safety glasses are recommended.
Skin Protection	Gloves are recommended for prolonged or repeated contact.
Respiratory Protection	Not normally required.

9 Physical & Chemical Properties

Appearance	Purple dyed liquid
Odor	Mild, characteristic
Odor Threshold	No data available
pH	Typically 7.0-9.0 (ASTM D1287); measured value reported on the lot Certificate of Analysis
Melting Point / Freezing Point	Freeze point approx. -33.7 °C (-28.6 °F) at 50 % v/v propylene glycol
Boiling Point	~106 °C
Flash Point	Not flammable (aqueous solution)
Evaporation Rate	No data available
Flammability (solid, gas)	No data available
Upper/Lower Flammability or Explosive Limits	No data available
Vapor Pressure	No data available
Vapor Density	No data available
Relative Density	1.046 (20 °C)
Solubility	Miscible with water
Partition Coefficient (n-octanol/water)	No data available
Auto-ignition Temperature	No data available
Decomposition Temperature	No data available
Viscosity	No data available
Particle Characteristics	Not applicable
Density	1.046 g/mL at 20 °C

Values shown reflect product-specific canonical data. Lot-specific ranges may vary; see the Certificate of Analysis for the shipped lot.

10 Stability and Reactivity

Reactivity	Not reactive under normal conditions of use and storage.
Chemical Stability	Stable under recommended storage conditions.
Possibility of Hazardous Reactions	None under normal processing conditions.
Conditions to Avoid	Contact with strong oxidizers; boiling dry (concentrates the glycol); freezing below the rated freeze point.
Incompatible Materials	Strong oxidizing agents; strong acids; strong bases.

Hazardous Decomposition Products	Carbon monoxide and carbon dioxide on combustion; aldehydes, alcohols, ethers and organic acids on oxidation at high temperature.

11 Toxicological Information

See Section 2 for GHS hazard classification.

Likely Routes of Exposure	Inhalation, skin contact, eye contact, ingestion.
Symptoms	No specific symptoms are expected from the hazards identified in Section 2.
Delayed and Chronic Effects	No delayed or chronic effects identified beyond the classification in Section 2.
Numerical Measures of Toxicity	No data available

Carcinogen Classification

Agency	Status
IARC	Group 2A — probably carcinogenic to humans (Sodium nitrite; IARC agent: Ingested nitrate or nitrite under conditions that result in endogenous nitrosation, Vol. 94).
NTP	Not listed as carcinogen.
OSHA	No substance-specific standard in 29 CFR 1910 Subpart Z; not classified as a carcinogen under the Hazard Communication Standard (29 CFR 1910.1200) as supplied. See Section 2 and the scope note.

Scope: the IARC evaluation addressed nitrate or nitrite ingested under conditions that result in endogenous nitrosation, not this product as supplied; nitrites can react with secondary and tertiary amines to form nitrosamines, which are potentially carcinogenic.

12 Ecological Information

Ecotoxicity	Algae ErC50: 19000 mg/L (96 h, Selenastrum capricornutum (14-d growth rate)); Daphnia EC50: 43500 mg/L (48 h, Daphnia magna (static))
Persistence & Degradability	Not persistent; low soil/sediment adsorption, not expected to volatilize
Bioaccumulative Potential	log Kow −0.92
Mobility in Soil	Very high mobility in soil (estimated Koc ≈ 1)

13 Disposal Considerations

Dispose of contents/container in accordance with applicable federal, state, and local regulations. Do not dispose of into drains or waterways.

14 Transport Information

Not regulated for transport under US DOT 49 CFR Subchapter C, IMDG, or IATA DGR in packages holding less than the reportable quantity below.

Hazardous substance (49 CFR 171.8)	A single package holding 16,600 lb (7,560 kg), about 1,900 US gal, or more of this product contains the reportable quantity (RQ) of a hazardous substance and is regulated as a hazardous material.

Reportable quantity (49 CFR 172.101 Appendix A)	Sodium nitrite — RQ 100 lb (45.4 kg)
Shipping description (package at or above the RQ)	UN3082, Environmentally hazardous substance, liquid, n.o.s. (Sodium nitrite), 9, III, RQ

15 Regulatory Information

Inventory / List	Status
California Proposition 65	Not listed
US EPA TSCA Active Inventory	Listed
EPCRA SARA 313 (TRI)	Contains Sodium Nitrite (in inhibitor package) (CAS 7632-00-0) at <0.6%; listed (de minimis 1.0%).

SARA 311/312 hazard categories correspond to the GHS classification in Section 2. Data retrieved as of: California Proposition 65 2026-11-02; US EPA TSCA Active Inventory 2026-11-02; EPCRA SARA 313 (TRI) 2026-11-02.

16 Other Information

Revision Date	2026-11-12
Format	16-section format per OSHA HCS 2024 (29 CFR 1910.1200, Appendix D), aligned with GHS Rev. 7.

Disclaimer: The information provided in this Safety Data Sheet is correct to the best of our knowledge at the date of publication. It relates only to the specific product identified and does not relate to its use in combination with other materials. ALLIANCE CHEMICAL MAKES NO WARRANTY, EXPRESS OR IMPLIED, INCLUDING WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. ALLIANCE CHEMICAL DOES NOT ASSUME LIABILITY FOR LOSS, INJURY, DAMAGE, OR EXPENSE ARISING FROM THE HANDLING, STORAGE, USE, OR DISPOSAL OF THIS PRODUCT.

Alliance Chemical, 204 South Edmond Street, Taylor, TX 76574. Published by Alliance Chemical from first-party canonical product data. Our authority is hands-on chemical handling, DOT/GHS-compliant shipping, and government-registered distribution — not bench chemistry. This Safety Data Sheet is prepared from the regulatory data on file for this product.