



## Solve 9500

# Safety Data Sheet

Date Issued: 1/20/2016

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### 1. **PRODUCT AND COMPANY IDENTIFICATION**

**Product Name:** Solve 9500

**Company Identification:** WaterSolve, LLC 5031 68th Street Caledonia, Michigan 49316, USA  
616-575-8693 www.gowatersolve.com

For Chemical Emergency Spill, Leak, Fire, Exposure, or Accident

Call CHEMTREC Day or Night

Within USA and Canada: 1-800-424-9300

Outside USA and Canada: +1 703-527-3887 (collect calls accepted)

29 CFR 1910.1200 (OSHA HazCom 2012)

### 2. **HAZARDS IDENTIFICATION**

#### **GHS CLASSIFICATION**

Combustible Dust

**GHS Label element**

**Hazard pictograms:**

**Signal word:** Warning

**Hazard Statements:** May form combustible dust concentrations in air.

**Other hazards:** None known

### 3. **COMPOSITION/INFORMATION ON INGREDIENTS**

**Substance/Mixture:** Mixture

**Hazardous components**

### 4. **FIRST AID MEASURES**

**General Advice:** No hazards which require special first aid measures.

**If swallowed:** IF SWALLOWED: Call a POISON CENTER or doctor/ physician if you feel unwell. DO NOT give milk or alcoholic beverages. Never give anything by mouth to a drowsy or unconscious person. If possible, do not leave individual unattended. If symptoms persist, call a physician.

**In case of Skin Contact:** First aid is not normally required. Remove contaminated clothing and shoes without delay. However it is recommended that exposed areas be cleaned by washing with soap and water. Do not reuse contaminated clothing without laundering. Get medical attention if irritation develops or persists.

**In case of Eye Contact:** Flush eyes with water as a precaution. Remove contact lenses. Protect unharmed eye. If eye irritation persists, consult a specialist.

**If Inhalation:** Move to fresh air. If breathed in, move person into fresh air. If unconscious place in recovery position and seek medical advice. If symptoms persist, call a physician.

#### **Most important symptoms and effects, both acute and delayed:**

- Signs and symptoms of exposure to this material through breathing, swallowing, and/or passage of the material through the skin may include: stomach or intestinal upset (nausea, vomiting, diarrhea), irritation (nose, throat, airways), cough, headache, shortness of breath, lung irritation, drowsiness, confusion, dizziness.

**Notes to physician:** No hazards which require special first aid measures.

## 5. **FIRE FIGHTING MEASURES**

**Suitable Extinguishing Media:** Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. Water spray, foam.

**Unsuitable extinguishing media:** High volume water jet

**Specific hazards during firefighting:** Organic dusts at sufficient concentration can form explosive mixtures in air. Do not allow run-off from fire fighting to enter drains or water courses.

**Hazardous combustion products:**

Carbon dioxide and carbon monoxide, Nitrogen oxides (NOx), acid vapors, ammonia, sulfur oxides

**Specific extinguishing methods:** Product is compatible with standard fire-fighting agents.

**Further information:** Standard procedure for chemical fires. When product is wet it causes a danger for slipping. Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local, state, federal, national or international regulations.

**Special Protective Equipment for fire-fighters:**

In the event of fire, firefighters, and others exposed, wear self-contained breathing apparatus and protective suit. Wear full firefighting protective clothing. Use NIOSH/MSHA approved respiratory protection.

## 6. **ACCIDENTAL RELEASE MEASURES**

**Personal precautions, protective equipment and emergency procedures:**

Avoid dust formation. Avoid breathing dust. Use personal protective equipment. Ensure adequate ventilation. Persons not wearing protective equipment should be excluded from area of spill until clean-up has been completed. Material can create slippery conditions. Comply with all federal, state, national, international and local regulations.

**Environmental precautions:**

Prevent product from entering drains. Prevent further leakage or spillage if safe to do so. If the product contaminates rivers and lakes or drains inform respective authorities. Do not flush into surface water or sanitary sewer system. Do not allow contact with soil, surface or ground water.

**Methods and materials for containment and cleaning up:**

Pick up and arrange disposal without creating dust. Keep in suitable, closed containers, for disposal.

**Other information:** Comply with all applicable federal, state, national and local regulations.

## 7. **HANDLING AND STORAGE**

**ADVICE ON SAFE HANDLING:**

Avoid dust formation. Smoking, eating and drinking should be prohibited in the application area. Provide sufficient air exchange and /or exhaust in work rooms. Do not breathe vapours/dust. This material is slippery when wet. Do not eat, drink or smoke when using this product. For personal protection (see Section 8). Dispose of rinse water in accordance with local, state, federal, national and international regulations.

**CONDITIONS FOR SAFE STORAGE:**

Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully tightly closed and resealed and kept upright to prevent leakage. Store in a dry and well-ventilated place. No smoking. Keep away from food and drink. Observe label precautions. Electrical installations/working materials must comply with the technological safety standards. Store in original container in a cool, dry ventilated area.

## 8 **EXPOSURE CONTROLS/PERSONAL PROTECTION**

Components with workplace control parameters

Components	CAS-No.	Value type (Form of exposure)	Control parameters/Permissible concentration	Basis
AMIDE	254504001- 5518	TWA	10 mg/m <sup>3</sup> Total particulate	WEEL

**Engineering measures:**

Provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below exposure guidelines (if applicable) or below levels that cause known, suspected or apparent adverse effects. Provide appropriate exhaust ventilation at places where dust is formed. Wash hands before breaks and immediately after handling the product. Avoid contact with skin and eyes. Ensure that eyewash stations and safety showers are close to the workstation location.

**Personal protective equipment**

**Hand protection:** Wear resistant gloves. The suitability for a specific workplace should be discussed with the producers of the protective gloves.

**Eye protection:** Safety glasses. Ensure that eyewash stations and safety showers are close to the workstation location.

**Skin and body protection**

Wear as appropriate: safety shoes. Dust impervious protective suit. Choose body protections according to the amount and concentration of the dangerous substances at the work place. Wear resistant gloves (consult with your safety equipment supplier). Launder clothing before reuse. Discard gloves that show tears, pinholes, or signs of wear.

**Hygiene measures:** Avoid breathing dust. Wash hands before breaks and at the end of the workday. When using do not eat, drink or smoke when using this product.

9. **PHYSICAL AND CHEMICAL PROPERTIES**

<b>Appearance:</b>	powder
<b>Physical state:</b>	solid
<b>Color:</b>	white
<b>Odor:</b>	odorless
<b>Odor threshold:</b>	No data available
<b>pH:</b>	6, Concentration: 10 g/l (20°C)
<b>Melting point/freezing point:</b>	Not applicable
<b>Boiling Point boiling range:</b>	212 °F / 100°C (1,013.33 hPa) Calculated Phase Transition Liquid/Gas
<b>Flash point:</b>	> 392°F / > 200°C Method: Closed Cup
<b>Evaporation rate:</b>	No data available
<b>Flammability (solid, gas):</b>	No data available
<b>Upper explosion limit:</b>	No data applicable
<b>Lower explosion limit:</b>	30,000 mg/m <sup>3</sup>
<b>Vapour pressure:</b>	0.00007 hPa Calculated Vapor Pressure
<b>Relative vapour Density:</b>	No data available
<b>Relative density:</b>	No data available
<b>Density:</b>	ca. 0.72 g/cm <sup>3</sup>
<b>Bulk Density:</b>	ca. 600 kg/m <sup>3</sup>
<b>Solubility in Water:</b>	soluble
<b>Solubility in other solvents:</b>	No data available
<b>Partition coefficient: n- Octanol/water:</b>	No data available
<b>Auto-ignition temperature:</b>	> 400° C
<b>Thermal decomposition:</b>	No data available
<b>Viscosity, dynamic</b>	No data available
<b>Viscosity, kinematic:</b>	No data available
<b>Oxidizing properties:</b>	No data available

10. **STABILITY AND REACTIVITY**

<b>Reactivity:</b>	No decompositions if stored and applied as directed.
<b>Chemical Stability:</b>	Stable under recommended storage conditions.
<b>Possibility of Hazardous reactions:</b>	Product will not undergo hazardous polymerization.
<b>Conditions to avoid:</b>	Heat, flames and sparks. Keep away from heat, flames, sparks and other ignition sources. Exposure to moisture

**Incompatible Materials:** Acids, Chlorates, Chlorine, nitrates, oxidizers agents, strong bases, Peroxides

**Hazardous decomposition products:** acid vapors, carbon dioxide and carbon monoxide, nitrogen oxides, ammonia, Sulphur oxides

## 11. **TOXICOLOGICAL INFORMATION**

**Information on likely routes of exposure:** Inhalation, skin contact, eye contact, ingestion

**Acute toxicity:** Not classified based on available information.

**Product:**

Acute oral toxicity: LD50 (Mouse): > 5,000 mg/kg

**Skin corrosion/irritation:** Not classified based on available information.

**Product:** Result: Not irritating to skin.

**Serious eye damage/eye irritation:** Not classified based on available information.

**Product:**

Remarks: Mildly irritating to eyes

Remarks: Unlikely to cause eye irritation or injury. Product dust may be irritating to eyes, skin and respiratory system.

**Respiratory or skin sensitization:**

**Skin sensitization:** Not classified based on available information

**Respiratory sensitization:** Not classified based on available information.

**Product:**

Species: Guinea pig Method: OECD Test Guideline 406

Assessment: Did not cause sensitization on laboratory animals.

**Germ cell mutagenicity:** Not classified based on available information.

**Carcinogenicity:** Not classified based on available information

**Reproductive toxicity:** Not classified based on available information

**STOT – single exposure:** Not classified based on available information

**STOT – repeated exposure:** Not classified based on available information

**Aspiration toxicity:** Not classified based on available information

**Product:** No aspiration toxicity classification

**Further information**

**Product:** Remarks: No data available

**Carcinogenicity:**

**IARC:** No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

**OSHA:** No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

**NTP:** No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

**12. ECOLOGICAL INFORMATION**

**Ecotoxicity**

**Product:**

**Toxicity to fish:** LC50 Golden orfe (*Leuciscus idus*): > 150 mg/l  
Exposure time: 96h Method: OECD Test Guideline 203

**Toxicity to daphnia and other aquatic invertebrates:**

EC50 Water flea (*Daphnia magna*) : > 300 mg/l  
Exposure time: 48h Method: OECD Test Guideline 202

**Toxicity to bacteria:**

EC50 (*Pseudomonas putida*): > 2,500 mg/l  
Exposure time: 24h

**Persistence and degradability:**

**Product:**

Physico-chemical removability:

Remarks: The product can be eliminated from water by abiotic processes, e.g. adsorption on activated sludge.

**Bioaccumulative potential:** No data available

**Mobility in soil:** No data available

**Other adverse effects:** No data available

**Product:**

**Additional ecological information:** No data available

**13. DISPOSAL CONSIDERATIONS**

**Disposal methods:**

**General Advice:** The product should not be allowed to enter drains, water courses or the soil. Do not dispose of waste into sewer. Do not contaminate ponds, waterways or ditches with chemical or used container. Send to a licensed waste management company. Dispose of in accordance with all applicable local, state, national and international, and federal regulations.

**Contaminated packaging:** Empty remaining contents. Dispose of as unused product. Empty containers should be taken to an approved waste handling site for recycling or disposal. Do not re-use empty containers.

**14. TRANSPORT INFORMATION**

**International Transport Regulations**

ID NUMBER	PROPER SHIPPING NAME	*HAZARD CLASS	SUBSIDIARY HAZARDS	PACKING GROUP	MARINE POLLUTANT /LTD. QTY.
<b>U.S. DOT -ROAD</b>					Not dangerous goods
<b>U.S. DOT - RAIL</b>					Not dangerous goods
<b>U.S. DOT – INLAND WATERWAYS</b>					Not dangerous goods
<b>TRANSPORT CANADA - ROAD</b>					Not dangerous goods
<b>TRANSPORT CANADA - RAIL</b>					Not dangerous goods
<b>TRANSPORT CANADA – INLAND WATERWAYS</b>					Not dangerous goods
<b>INTERNATIONAL MARITIME DANGEROUS GOODS</b>					Not dangerous goods
<b>INTERNATIONAL AIR TRANSPORT ASSOC. - CARGO</b>					Not dangerous goods
<b>INTERNATIONAL AIR TRANSPORT ASSOC. - PASSENGER</b>					Not dangerous goods
<b>MEXICAN REGULATION FOR THE LAND TRANSPORT OF HAZARDOUS MATERIALS AND WASTES</b>					Not dangerous goods

**\*ORM = ORM-D, CBL=COMBUSTIBLE LIQUID**

Marine pollutant	no
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Dangerous goods description (if indicated above) may not reflect quantity, end-use or region-specific exceptions that can be applied. Consult shipping documents for description that are specific to the shipment.

15. **REGULATORY INFORMATION**

SARA 311/312 Hazards: Fire Hazard

SARA 313

Component(s) SARA 313: AMMONIUM SULFATE 7783-20-2 3.00%

California Prop 65: Proposition 65 warnings are not required for this product based on the results of a risk assessment.

**The components of this product are reported in the following inventories:**

TSCA: On TSCA Inventory

DSL: All components of this product are on the Canadian DSL.

AUSTR: On the inventory, or in compliance with the inventory.

ENCS: On the inventory, or in compliance with the inventory.

KECL: On the inventory, or in compliance with the inventory.

PHIL: On the inventory, or in compliance with the inventory.

IECSC: On the inventory, or in compliance with the inventory.

**Inventories:**

AICS (Australia), DSL (Canada), IECSC (China), REACH (European Union), ENCS (Japan), ISHL (Japan), KECI (Korea), NZIoC (New Zealand), PICCS (Philippines), TSCA (USA)

16. **OTHER INFORMATION**

**Full text of H-Statements referred to under Sections 2 and 3.**

**DATE ISSUED: 01/20/2016 DATE REVISED: 01/20/2016**

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text. Reasonable care has been taken in the preparation of this information, but the manufacturer makes no warranty of merchantability or any other warranty, expressed or implied, with respect to this information. The manufacturer makes no representations and assumes no liability for any direct, incidental or consequential damages resulting from its use. Recipients are advised to confirm in advance of need that the information is current, applicable, and suitable to their circumstances. This information is for the specific material described only and may not be valid if the material is used in combination with any other materials or in any process. The user is responsible to determine the completeness of the information and suitability for the user's own particular use. The knowledge and belief of the company, the information is accurate and reliable as of the date indicated but the company makes no express or implied warranty of merchantability for the material or the information. The company makes no express or implied warranty of fitness for a purpose for the material or for the information. Users of any chemical should educate themselves on all aspects of its use by independent investigation of current scientific and medical knowledge that the material can be used safely. Both the supplier and manufacturer make no representations and assume no liability for any direct, incidental or consequential damages resulting from its use. Both the supplier and manufacturer make no warranty of merchantability or any other warranty, expressed or implied, with respect to this information. Recipients are advised to confirm in advance of need that the information is current, applicable, and suitable to their circumstances. This information is for the specific material described only and may not be valid if the material is used in combination with any other materials or in any process. The user is responsible to determine the completeness of the information and suitability for the user's own particular use. Users of any chemical should educate themselves on all aspects of its use by independent investigation of current scientific and medical knowledge that the material can be used safely. The buyer assumes all responsibility for using and handling the product in accordance with applicable federal, state and local regulations.

**List of abbreviations and acronyms that could be, but not necessarily are, used in the safety data sheet:**

AICS: Australian Inventory of Chemical Substances

ASTM: American Society for the Testing of Materials

ACGIH: American Conference of Industrial Hygienists

bw: Body Weight

BEI: Biological Exposure Index

CAS Chemical: Abstracts Service (Division of the American Chemical Society)

CERCLA: Comprehensive Environmental Response, Compensation, and Liability Act

CMR: Carcinogenic, Mutagenic or Toxic for Reproduction

DOT: Department of Transportation

DIN: Standard of the German Institute for Standardization

DSL: Domestic Substances List (Canada)

ECx: Concentration associated with x% response

EmS: Emergency Schedule

ENCS: Existing and New Chemical Substances

ErCx: Concentration associated with x% growth rate response

ERG: Emergency Response Guide

FG: Food grade

FIFRA: Federal Insecticide, Fungicide, and Rodenticide Act

GHS: Globally Harmonized System of Classification and Labeling of Chemicals

GLP: Good laboratory practice

H-statement: Hazard Statement

HMIRC: Hazardous Materials Information Review Commission

HMIS: Hazardous Materials Identification System

IARC: International Agency for Research on Cancer  
IATA: International Air Transport Association  
IATA-DGR: Dangerous Goods Regulation by the International Air Transport Association (IATA)  
IBC: International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk  
IC50: Half maximal inhibitory concentration  
ICAO: International Civil Aviation Organization  
ICAO-TI (ICAO): Technical Instructions by the International Civil Aviation Organization  
IECSC: Inventory of Existing Chemical Substances in China  
IMDG: International Maritime Code for Dangerous Goods  
IMO: International Maritime Organization  
ISHL: Industrial Safety and Health Law (Japan)  
ISO: International Organization for Standardization  
logPow: octanol-water partition coefficient  
LCxx: Lethal Concentration, for xx percent of test population  
LDxx: Lethal Dose, for xx percent of test population  
ICxx: Inhibitory Concentration for xx of a substance  
ECxx: Effective Concentration of xx  
KECI: Korea Existing Chemicals Inventory  
MARPOL: International Convention for the Prevention of Pollution from Ships  
MSHA: Mine Safety and Health Administration  
n.o.s.: Not otherwise Specified  
NFPA: National Fire Protection Association  
NO(A)EC: No Observable Effect Loading Rate  
NO(A)EL: No Observable (Adverse) Effect Level  
NTP: National Toxicology Program  
NIOSH: National Institute for Occupational Safety and Health  
NOELR: No Observable Effect Loading Rate  
NZIoC: New Zealand Inventory of Chemicals  
OECD: Organization for Economic Co-operation and Development  
OPPTS: Office of Chemical Safety and Pollution Prevention  
OEL: Occupational Exposure Limit  
OSHA: Occupational Safety and Health Administration  
P-Statement: Precautionary Statement  
PBT: Persistent, Bioaccumulative and Toxic  
PICCS: Philippines Inventory of Chemicals and Chemical Substances  
PMRA: Health Canada Pest Management Regulatory Agency  
PPE: Personal Protective Equipment  
Q SAR: (Quantitative) Structure Activity Relationship  
RCRA: Resource Conservation and Recovery Act  
REACH: Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorization and Restriction of Chemicals  
RQ: Reportable Quantity  
RTK: Right to Know  
SADT: Self Accelerating Decomposition Temperature  
SARA: Superfund Amendments and Reauthorization Act  
STEL: Short-term exposure limit  
SDS: Safety Data Sheet  
STOT: Specific Target Organ Toxicity  
TCSI: Taiwan Chemical Substance Inventory  
TSCA: Toxic Substances Control Act (United States)  
TLV: Threshold Limit Value  
TWA: Time-weighted average  
UN: United Nations  
UNRTDG: United Nations Recommendations on the Transport of Dangerous Goods  
vPvB: Very Persistent and Very Bioaccumulative  
WEL: Workplace Exposure Level  
WHMIS: Workplace Hazardous Materials Information System  
(WAF): *water-accommodated fraction*