



Solve 3300

Safety Data Sheet

Date Issued: 1/25/2018

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1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: **SOLVE 3300**

PRODUCT TYPE: Mixture

COMPANY: WaterSolve, LLC, 5031 68th Street, Caledonia, Michigan 49316, USA

For Product information call 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)

Identified uses: Processing aid for industrial applications.

Uses advised against: All non-professional uses.

2. HAZARDS IDENTIFICATION

U.S. Code of Federal Regulations 29 CFR 1910.1200, Hazard Communication

2.1 Classification of the substance or mixture

Classification according to paragraph (d) of Regulation 29 CFR 1910.1200.

Met. Corr. 1; H290, eye Dam. 1; H318

2.2 Label elements

Labeling according to paragraph (f) of Regulation 29 CFR 1910.1200:



Hazard symbol(s):

Signal word: **DANGER**

Hazard statement(s):

H290-May be corrosive to metals

H318-Causes serious eye damage

Precautionary statement(s):

P234-Keep only in original container

P390-Absorb spillage to prevent material damage

P280-Wear eye protection/face protection

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

P310-Immediately call a POISON CENTER or doctor/physician

2.3 Other hazards

Spills produce extremely slippery surfaces.

For explanation of abbreviations see Section 16.

3. **COMPOSITION/INFORMATION ON INGREDIENTS**

3.1 Substances: Not applicable, this product is a mixture.

3.2 Mixtures: This product is a mixture.

Hazardous components:

Hydrochloric acid

Concentration/-range: <1%

CAS Number: 7647-01-0

Classification according to Paragraph (d) of 29 CFR 1910.1200:

Met. Corr. 1; H290, Skin Corr. 1B; H314, STOT SE 3; H335

Formaldehyde

Concentration/-range: < 0.1%

CAS Number: 50-00-0

Classification according to Paragraph (d) of 29 CFR 1910.1200:

Falm. Liq. 4; H227, Acute Tox. 3; H301, Acute Tox. 3; H311, Acute Tox. 3; H331, Skin Corr. 1B; H314, Skin Sens. 1A; H317, Carc 1B; H350, Muta. 2; H341

For explanation of abbreviations see Section 16.

4. **FIRST AID MEASURES**

Description of first aid measures

Inhalation: Move to fresh air. If breathing is difficult, give oxygen. If not breathing, give artificial respiration. Get medical attention if symptoms occur.

Skin Contact: In case of contact, immediately flush skin with plenty of water for at least 15 minutes while removing all contaminated clothes and shoes. Call a physician immediately.

Eye Contact: In case of contact, immediately with plenty of water, also under the eyelids for at least 15 minutes. Call a physician.

Ingestion: If swallowed, Do NOT induce vomiting unless directed to do so by medical personnel. Get medical attention.

Most important symptoms and effects, both acute and delayed

Causes eye burns. Repeated or prolonged skin contact may cause allergic reactions with susceptible persons.

Indication of any immediate medical attention and special treatment needed.

None reasonably foreseeable.

Other Information: None

5. **FIRE-FIGHTING MEASURES**

5.1 Extinguished media

Suitable extinguishing media: Water, water spray, foam, carbon dioxide (CO₂), dry powder.

WARNING! SPILLS PRODUCE EXTREMELY SLIPPERY SURFACES.

Unsuitable extinguishing media: None

5.2 Special hazards arising from the substance or mixture:

Hazardous decomposition products:

Carbon oxides, nitrogen oxides, hydrogen chloride, hydrogen cyanide (hydrocyanic acid) may be produced in the event of combustion in an oxygen deficient atmosphere.

5.3 Advice for fire-fighters

Protective measures: Wear self-contained breathing apparatus and protective suit.

Other information: Spills produce extremely slippery surfaces.

6. ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures.

Personal precautions: Avoid contact with skin and the eyes. Spills produce extremely slippery surfaces. Do not touch or walk through spilled material.

Protective equipment: Wear adequate personal protective equipment (see Section 8 Exposure Controls/Personal Protection).

Emergency procedures: Keep people away from spill/leak. Prevent further leakage or spillage if safe to do so.

6.2 Environmental precautions: As with all chemical products, do not flush into surface water.

6.3 Methods and material for containment and cleaning up

Small spills: Do not flush with water. Soak up with inert absorbent material. Sweep up and shovel into suitable containers for disposal.

Large spills: Do not flush with water. Dam up. Clean up promptly by scoop or vacuum.

Residues: Soak up with inert absorbent material. After cleaning, flush away traces with water.

6.4 Reference to other sections

Section 7: Handling and storage; Section 8: Exposure controls/personal protection; Section 13: Disposal considerations

7. HANDLING AND STORAGE

7.1 Precautions for safe handling

Avoid contact with skin and eyes. Renders surfaces extremely slippery when spilled. When using do not smoke, drink or eat.

Conditions for safe storage, including any incompatibilities.

Keep container tightly closed. Keep away from heat and sources of ignition. Freezing will affect the physical condition and may damage the material. Incompatible with oxidizing agents. Materials to avoid: Aluminum. Stainless steel. Brass. Mild steel. Viton.

a. Specific end uses

Processing aid for industrial applications.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters

Occupational Exposure limits:

Hydrochloric acid

OSHA: 5 ppm (8 hours); 5 ppm (15 minutes)

ACGIH: 2 ppm (8 hours); 2ppm (15 minutes)

Formaldehyde

OSHA: 0.75 ppm (8 hours); 2 ppm (15 minutes)

ACGIH: 0.3ppm (8 hours)

8.2 Exposure controls

Appropriate engineering controls:

Ensure adequate ventilation, especially in confined areas. Use local exhaust if misting occurs. Natural ventilation is adequate in absence of mists.

Individual protection measures, such as personal protective equipment:

- a) **Eye/face protection:** safety glasses with side-shields.
- b) **Skin protection:** Chemical resistant apron or protective suit if splashing or repeated contact with solution is likely. Rubber footwear where physical contact can occur.
- c) **Hand protection:** Imperious gloves.
- d) **Respiratory protection:** Not required; except in case of aerosol formation. Ensure adequate ventilation, especially in confined areas.

- e) **Additional advice:** Handle in accordance with good industrial hygiene and safety practice. Wash hands and face before breaks and immediately after handling the product. Wash hands before breaks and at the end of workday.
- f) **Environmental exposure controls:** Do not allow uncontrolled discharge of product into the environment.

9. PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

a) Appearance:	Liquid, Opalescent
b) Odor:	Slight
c) Odor threshold:	Not applicable
d) pH:	1.0 ó 2.5
e) Melting point/freezing point:	< 0°C
f) Initial boiling point /boiling range:	> 100°C
g) Flash point:	Does not flash.
h) Evaporation rate:	No data available.
i) Flammability (solid, gas):	Not applicable
j) Upper/lower flammability/explosive limits:	Not expected to create explosive atmospheres.
k) Vapor pressure:	No data available.
l) Vapor density:	No data available.
m) Relative density:	1.0 ó 1.2
n) Solubility:	Completely miscible in water.
o) Partition coefficient:	No data available.
p) Autoignition temperature:	Does not self-ignite (based on the chemical structure).
q) Decomposition temperature:	No data available.
r) Viscosity:	No data available
s) Explosive properties:	Not expected to be explosive based on the chemical structure.
t) Oxidizing properties:	Not expected to be oxidizing based on the chemical structure.
9.2 Other information:	None.

10. STABILITY AND REACTIVITY

10.1 Reactivity: Stable under recommended storage conditions.

10.2 Chemical Stability: Product is stable under recommended storage conditions.

10.3 Possibility of Hazardous reactions: Oxidizing agents may cause exothermic reactions.

10.4 Conditions to avoid: Protect from frost, heat and sunlight.

10.5 Incompatible materials: Brass. Aluminum. Mild Steel. Stainless steel. Incompatible with bases. Oxidizing agents. Viton

10.6 Hazardous decomposition products: Thermal decomposition may produce: hydrogen chloride gas, nitrogen oxides, carbon oxides, hydrogen chloride gas. Hydrogen cyanide (hydrocyanic acid) may be produced in the event of combustion in an oxygen deficient atmosphere.

11. TOXICOLOGICAL INFORMATION

11.1 Information on toxicological effects

Information on the product as supplied:

Acute Oral toxicity:	No data available.
Acute Dermal toxicity:	No data available.
Acute Inhalation toxicity:	The product is not expected to be toxic by inhalation.
Skin corrosion/irritation:	Not irritating. (OECD 404)
Serious Eye damage/ irritation:	Risk of serious damage to eyes.

Respiratory/skin Sensitization:	The product contains a small amount of sensitizing substances which may provoke an allergic reaction among sensitive individuals in contact with skin.
Mutagenicity:	Not mutagenic.
Carcinogenicity:	Not carcinogenic.
Reproductive Effects:	Not toxic for reproduction.
STOT single exposure:	May cause respiratory tract irritation.
STOT- repeated exposure:	No known effects.
Aspiration hazard:	No hazards resulting from the material as supplied.

Relevant information on the hazardous components:

Hydrochloric acid

Acute Oral toxicity:	No data available.
Acute Dermal toxicity:	No data available.
Acute Inhalation toxicity:	LC50/inhalation/0.5 hours/rat = 8.3 mg/L
Skin corrosion/irritation:	Causes burns. (OECD 404)
Serious Eye damage/ irritation:	Risk of serious damage to eyes. (OECD 405)
Respiratory/skin Sensitization:	Not sensitizing. (OECD 406)
Mutagenicity:	Not mutagenic.
Carcinogenicity:	Not carcinogenic.
Reproductive Effects:	Not toxic for reproduction.
STOT single exposure:	Irritating to respiratory tract.
STOT- repeated exposure:	NOAEC/inhalation/390 h/rat= 20 ppm (OECD 413)
Aspiration hazard:	No known effects.

Formaldehyde

Acute Oral toxicity:	LD50/oral/rat = 5 ó 50 mg/kg. (OECD 401)
Acute Dermal toxicity:	LD50/dermal/rat = 270 mg/kg.
Acute Inhalation toxicity:	LC50/inhalation/4 hours/rat = 600 mg/m ³
Skin corrosion/irritation:	Causes severe irritation and or burns. (OECD 404)
Serious Eye damage/ irritation:	Risk of serious damage to eyes.
Respiratory/skin Sensitization:	Sensitizing to skin. (OECD 406)
Mutagenicity:	Possible mutagen.
Carcinogenicity:	May cause cancer.
IARC:	1
Reproductive Effects:	Not toxic for reproduction.
STOT single exposure:	No known effects.
STOT- repeated exposure:	No known effects.
Aspiration hazard:	No known effects.

12. ECOLOGICAL INFORMATION

12.1 Toxicity

Information on the product as supplied:

Acute toxicity to fish:	LC50/Fish/96 hrs. = 168mg/L
Acute toxicity to invertebrates:	EC50/Daphnia /24 hours = 52 mg/L (Estimated)
Acute toxicity to Algae:	IC50/Algae /72 hours > 100 mg/L (Estimated)
Chronic toxicity to fish:	No data available
Chronic toxicity to invertebrates:	No data available
Toxicity to microorganisms:	No data available.
Effects on terrestrial organisms:	No data available.
Sediment toxicity:	No data available.

Relevant information on the hazardous components.

Hydrochloric acid

Acute toxicity to fish:	LC50/Lepomis macrochirus/96 hours: pH = 3.25 ó 3.5
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Acute toxicity to invertebrates: EC50/Daphnia magna /48 hours: pH = 4.92 (OECD 202)
Acute toxicity to Algae: IC50/Chlorella vulgaris /72 hours: pH = 4.7 ó 4.82 (OECD 201)
Chronic toxicity to fish: No data available
Chronic toxicity to invertebrates: No data available
Toxicity to microorganisms: EC50/ activated sludge/3 hours: pH = 5-5.5 (OECD 209)
Effects on terrestrial organisms: No data available.
Sediment toxicity: No data available.

Formaldehyde

Acute toxicity to fish: LC50/Fish/96 hrs. = 1 ó 10 mg/L
Acute toxicity to invertebrates: EC50/Daphnia pulex /48 hours = 10 ó 100 mg/L (OECD 202)
Acute toxicity to Algae: IC50/Desmodesmus subspicatus /72 hours = 1 - 10 mg/L (OECD 201)
Chronic toxicity to fish: No data available
Chronic toxicity to invertebrates: No data available
Toxicity to microorganisms: EC50/activated sludge/120 hours = 34.1 mg/L
Effects on terrestrial organisms: No data available.
Sediment toxicity: No data available.

12.2 Persistence and degradability

Information on the product as supplied:

Degradation: Not readily biodegradable.
Hydrolysis: Does not hydrolyse.
Photolysis: No data available

Relevant information on the hazardous components:

Hydrochloric acid

Degradation: Not relevant (inorganic).
Hydrolysis: Does not hydrolyse.
Photolysis: No data available

Formaldehyde

Degradation: Readily biodegradable. > 90%/ 14 days (OECD 301C); > 90%/ 28 days (OECD 301D)
Hydrolysis: Does not hydrolyse.
Photolysis: Half-life (direct photolysis): 1.71 days

12.3 Bioaccumulative potential

Information on the product as supplied:

The product is not expected to bioaccumulate.
Partition co-efficient LogPow: No data available.
Bio concentration factor (BCF): No data available.

Relevant information on the hazardous components:

Hydrochloric acid

Partition co-efficient LogPow: Not applicable.
Bio concentration factor (BCF): No data available.

Formaldehyde

Partition co-efficient LogPow: 0.35 @ 25°C, pH = 3.5
Bio concentration factor (BCF): < 1

12.4 Mobility in soil

Information on the product as supplied:

No data available.

Relevant information on the hazardous components:

Hydrochloric acid

Koc: No data available.

Formaldehyde

Koc: 15.9

12.5 Other adverse effects: none

13. DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods

Waste from residues /unused products:

Dispose of in accordance with local, state, national and international regulations.

Contaminated packaging: Rinse empty containers with water and use the rinse-water to prepare the working solution. Dispose in accordance with local, state, national and international regulations. If recycling is not practicable, dispose of in compliance with local regulations.

Recycling: In accordance with the local, state, national and international regulations.

14. TRANSPORT INFORMATION

UN number 3264

Land transport

USDOT

UN number 3264

Description of the goods/

Proper shipping name: Corrosive liquid, acidic, inorganic, n.o.s. (Contains: Hydrochloric acid)

Transport Hazard Class: 8

Packing Group: III

Environmental hazards: None.

Special precautions for user: May be corrosive to metals.

Sea transport

IMDG:

UN number 3264

Description of the goods/

Proper shipping name: Corrosive liquid, acidic, inorganic, n.o.s. (Contains: Hydrochloric acid)

Transport Hazard Class: 8

Packing Group: III

Environmental hazards: None.

Marine pollutant: No

Special precautions for user: May be corrosive to metals.

EmS: F-A, S-B

Air transport

ICAO/IATA

UN number 3264

Description of the goods/

Proper shipping name: Corrosive liquid, acidic, inorganic, n.o.s. (Contains: Hydrochloric acid)

Transport Hazard Class: 8

Packing Group: III

Environmental hazards: None.

Special precautions for user: May be corrosive to metals.

None known.

15. REGULATORY INFORMATION

**15.1 Safety, health and environmental regulations/legislation specific for substances or mixture
Information on the product as supplied:**

USA (TSCA) Chemical Substances Inventory:

All components of this product are either listed on the inventory or are exempt from listings.

US SARA Reporting requirements:

SARA (SECTION 311/312) hazard class: Acute

SARA Title III Sections:

Section 302 (TPQ)-Reportable Quantity: Contains one or more of the listed substances.

Section 304-Reportable Quantity: Contains one or more of the listed substances.

Section 313 (De minimis concentration): Contains one or more of the listed substances.

Clean Water Act

Section 311 Hazardous Substances (40 CFR 117.3)- Reportable Quantity:

Contains one or more of the listed substances.

Clean Air Act:

Section 112(r) Accidental release prevention requirements (40 CFR 68)- Reportable Quantity:

Contains one or more of the listed substances.

CERCLA

Hazardous Substances List (40 CFR 302.4)- Reportable Quantity:

Contains one or more of the listed substances.

RCRA Status:

Hazardous waste, if discarded.

California Proposition 65 Information:

**WARNING! This product contains a chemical known in the State of California to cause cancer,
Formaldehyde (gas).**

Relevant information on the hazardous components:

Hydrochloric acid

SARA Title III Sections:

Section 304- Reportable Quantity: 5000 lbs

Section 313 (De minimis concentration): 1.0%

Clean Water Act

Section 311 Hazardous Substances (40 CFR 117.3)- Reportable Quantity:

5000 lbs.

Clean Air Act:

Section 112(r) Accidental release prevention requirements (40 CFR 68)- Reportable Quantity:

15000 lbs (C >= 37%)

CERCLA

Hazardous Substances List (40 CFR 302.4)- Reportable Quantity:

5000 lbs.

DOT RQ (lbs):

5000 lbs

Formaldehyde

SARA Title III Sections:

Section 302 (TPQ)- Reportable Quantity: 100 lbs

Section 304- Reportable Quantity: 100 lbs

Section 313 (De minimis concentration): 0.1%

Clean Water Act

Section 311 Hazardous Substances (40 CFR 117.3)- Reportable Quantity: 100 lbs

Clean Air Act:

Section 112(r) Accidental release prevention requirements (40 CFR 68)- Reportable Quantity:
15000 lbs

CERCLA

Hazardous Substances List (40 CFR 302.4)- Reportable Quantity: 100 lbs

RCRA status: Listed

DOT RQ (lbs): 100 lbs

California Proposition 65 information: Listed

16. OTHER INFORMATION

NFPA Rating

Health: 3

Flammability: 0

Instability: 0

HMIS

Health: 3

Flammability: 0

Physical Hazard: 1

PPE Code: D

Abbreviations

Acute Tox. 3 = Acute toxicity Category Code 3

Carc. 1B = Carcinogenicity Category Code 1B

Eye Dam. 1 = Serious eye damage/eye irritation Category Code 1

Met. Corr. 1 = Substance or mixture corrosive to metals Category Code 1

Muta. 2 = Germ cell mutagenicity Category Code 2

Skin Corr. 1B = Skin corrosion/irritation Category Code 1B

Skin Sens. 1A = Skin sensitization Category Code 1A

STOT SE 3 = Specific target organ toxicity ó single exposure Category Code 3

Hazard Statements

H290-May be corrosive to metals

H301-Toxic if swallowed

H311-Toxic in contact with skin

H314-Causes severe skin burns and eye damage

H317-May cause an allergic skin reaction

H318-Causes serious eye damage

H331-Toxic if inhaled

H335-May cause respiratory irritation

H341-Suspected of causing genetic defects

H350-May cause cancer

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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*