

1. Identification

Product identifier	IMPACTZ
Other means of identification	
SDS number	526
Product registration number	5481-612
Recommended use	Herbicide.
Recommended restrictions	No other uses are advised. Keep out of the Reach of Children!
EPA Registration number	EPA: 5481-612
Manufacturer/Importer/Supplier/Distributor information	
Company Name	AMVAC Chemical Corporation
Address	4695 MacArthur Court Suite 1200 Newport Beach, CA 92660 United States
Telephone	
AMVAC Chemical Corp	949-260-1200
AMVAC Chemical Corp	949-260-6270(FAX)
Product Use	888-462-6822
Website	www.amvac.com
E-mail	CustServ@amvac.com
Emergency phone number	
Medical	888-681-4261
CHEMTREC®	800-424-9300
(USA+Canada)	
CHEMTREC® (Outside USA)	+1-703-527-3887

2. Hazard(s) identification

Physical hazards	Not classified.	
Health hazards	Acute toxicity, oral	Category 4
	Sensitization, skin	Category 1
	Reproductive toxicity	Category 1B
	Specific target organ toxicity, repeated exposure	Category 2
Environmental hazards	Hazardous to the aquatic environment, acute hazard	Category 1
	Hazardous to the aquatic environment, long-term hazard	Category 1
OSHA defined hazards	Not classified.	
Label elements		



Signal word Danger

Hazard statement	Harmful if swallowed. May cause an allergic skin reaction. May damage fertility or the unborn child. May cause damage to organs through prolonged or repeated exposure. Very toxic to aquatic life. Very toxic to aquatic life with long lasting effects.
Precautionary statement	
Prevention	Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Wear protective gloves/protective clothing/eye protection/face protection. Do not breathe mist or vapor. Do not eat, drink or smoke when using this product. Avoid release to the environment. Wash thoroughly after handling. Contaminated work clothing must not be allowed out of the workplace.
Response	If swallowed: Call a poison center/doctor if you feel unwell. Rinse mouth. If on skin: Wash with plenty of water. Wash contaminated clothing before reuse. If exposed or concerned: Get medical advice/attention. Get medical advice/attention if you feel unwell. Collect spillage.
Storage	Store locked up.
Disposal	Dispose of contents/container in accordance with local/regional/national/international regulations.
Hazard(s) not otherwise classified (HNOC)	None known.
Supplemental information	<p>This is a pesticide product registered by the United States Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets (SDS), and for workplace labels of non-pesticide chemicals. The hazard information required on the pesticide label is reproduced in section 15. The pesticide label also includes other important information, including directions for use.</p> <p>Restricted Use is due to ground and surface water concerns. See label for applicable precautionary statements and instructions.</p>

3. Composition/information on ingredients

Mixtures

Chemical name	Common name and synonyms	CAS number	%
Atrazine	1-Chloro-3-(ethylamino)-5-(isopropylamino)-2,4,6-triazine	1912-24-9	42.6
Atrazine related compounds		N/A	1.11
Topramezone		210631-68-8	2.85

Additional components

Chemical name	Common name and synonyms	CAS number	%
Undisclosed Ingredients		N/A	53.44

4. First-aid measures

Inhalation	Move to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably mouth-to-mouth if possible. Call a poison center or doctor/physician for further treatment advice.
Skin contact	Remove contaminated clothing. Wash off immediately with plenty of water for at least 15 minutes. Call a physician or poison control center for treatment advice.
Eye contact	Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Call a physician or poison control center for treatment advice.
Ingestion	If swallowed, seek medical advice immediately and show this container or label. Rinse mouth. Have person sip a glass of water if able to swallow. Do not induce vomiting without advice from poison control center. If vomiting occurs, keep head low so that stomach content doesn't get into the lungs. Never give anything by mouth to a victim who is unconscious or is having convulsions.
Most important symptoms/effects, acute and delayed	May cause an allergic skin reaction. Prolonged exposure may cause chronic effects.

Indication of immediate medical attention and special treatment needed	Provide general supportive measures and treat symptomatically. Keep victim under observation. Symptoms may be delayed.
General information	If exposed or concerned: Get medical advice/attention. If you feel unwell, seek medical advice (show the label where possible). Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves. Show this safety data sheet to the doctor in attendance.

5. Fire-fighting measures

Suitable extinguishing media	Alcohol resistant foam. Powder. Carbon dioxide (CO2).
Unsuitable extinguishing media	Do not use water jet as an extinguisher, as this will spread the fire.
Specific hazards arising from the chemical	During fire, gases hazardous to health may be formed.
Special protective equipment and precautions for firefighters	Self-contained breathing apparatus and full protective clothing must be worn in case of fire.
Fire fighting equipment/instructions	Move containers from fire area if you can do so without risk.
Specific methods	Use standard firefighting procedures and consider the hazards of other involved materials.
General fire hazards	No unusual fire or explosion hazards noted.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures	Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Wear appropriate protective equipment and clothing during clean-up. Do not breathe mist or vapor. Ensure adequate ventilation. Local authorities should be advised if significant spillages cannot be contained.
Methods and materials for containment and cleaning up	<p>Large Spills: Stop the flow of material, if this is without risk. Dike the spilled material, where this is possible. Siphon the majority of the liquid into drums for use or disposal, depending on the circumstances.</p> <p>Small Spills: Wipe up with absorbent material (e.g. cloth, fleece).</p> <p>Clean surface thoroughly to remove residual contamination.</p> <p>Never return spills to original containers for reuse.</p>
Environmental precautions	Avoid discharge into drains, water courses or onto the ground.

7. Handling and storage

Precautions for safe handling	Do not handle until all safety precautions have been read and understood. Pregnant or breastfeeding women must not handle this product. Provide adequate ventilation. Wear appropriate personal protective equipment. Do not breathe mist or vapor. Avoid prolonged exposure.
Conditions for safe storage, including any incompatibilities	Store locked up. Store in original tightly closed container. Store away from incompatible materials (see Section 10 of the SDS).

8. Exposure controls/personal protection

Occupational exposure limits

US. ACGIH Threshold Limit Values (TLV)

Components	Type	Value	Form
Atrazine (CAS 1912-24-9)	TWA	2 mg/m3	Inhalable fraction.

US. NIOSH: Pocket Guide to Chemical Hazards Recommended Exposure Limits (REL)

Components	Type	Value
Atrazine (CAS 1912-24-9)	TWA	5 mg/m3

Biological limit values	No biological exposure limits noted for the ingredient(s).
Appropriate engineering controls	Ensure adequate ventilation, especially in confined areas.
Individual protection measures, such as personal protective equipment	
Eye/face protection	Wear safety glasses with side shields (or goggles).

Skin protection	
Hand protection	Wear appropriate chemical resistant gloves. Barrier laminate, Butyl rubber ≥14 mils, Nitrile Rubber ≥14 mils, Neoprene rubber ≥14 mils, Polyethylene, Polyvinyl chloride (PVC) ≥14 mils, or Viton ≥14 mils.
Other	Long-sleeved shirt and long pants or coveralls, socks and closed toe shoes are required. Use of an impervious apron is recommended.
Respiratory protection	In case of insufficient ventilation, wear suitable respiratory equipment.
Thermal hazards	Not applicable.
General hygiene considerations	Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants.

9. Physical and chemical properties

Appearance

Physical state	Liquid.
Form	Suspension concentrate. Slightly viscous liquid.
Color	White.
Odor	Pleasant. Faint odor.
Odor threshold	Not available.
pH	4.94 (neat)
Melting point/freezing point	<32 °F (<0 °C)
Initial boiling point and boiling range	>212 °F (>100 °C)
Flash point	>212 °F (>100 °C)
Evaporation rate	Not available.
Flammability (solid, gas)	Not applicable.

Upper/lower flammability or explosive limits

Explosive limit - lower (%)	Not available.
Explosive limit - upper (%)	Not available.
Vapor pressure	Not available.
Vapor density	Not available.
Relative density	1.12
Relative density temperature	68 °F (20 °C)
Solubility(ies)	
Solubility (water)	Not available.
Partition coefficient (n-octanol/water)	Not available.
Auto-ignition temperature	Not available.
Decomposition temperature	Not available.
Viscosity	Not available.

Other information The data presented in this section are typical values and should not be construed as a specification.

Explosive properties	Not explosive.
Flammability class	Combustible IIIB estimated
Oxidizing properties	Not oxidizing.
Particle size	<4 µm

10. Stability and reactivity

Reactivity	The product is stable and non-reactive under normal conditions of use, storage and transport.
Chemical stability	Material is stable under normal conditions.
Possibility of hazardous reactions	No dangerous reaction known under conditions of normal use.
Conditions to avoid	Contact with incompatible materials.
Incompatible materials	Strong oxidizing agents.

Hazardous decomposition products

Emits hazardous fumes and smoke of unknown composition when heated to decomposition or burned.

11. Toxicological information

Information on likely routes of exposure

Inhalation	May cause damage to organs through prolonged or repeated exposure by inhalation.
Skin contact	Not irritating.
Eye contact	Mild irritant.
Ingestion	Harmful if swallowed.

Symptoms related to the physical, chemical and toxicological characteristics

May cause an allergic skin reaction.

Information on toxicological effects

Acute toxicity

Harmful if swallowed.

Product	Species	Test Results
IMPACTZ		

Acute

Dermal

Liquid

LD50	Rat	> 2000 mg/kg
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Inhalation

Mist

LC50	Rat	> 4.1 mg/l, 4 hr
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Oral

Liquid

LD50	Rat	2000 mg/kg (female)
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Skin corrosion/irritation

Non irritating to skin.

Serious eye damage/eye irritation

Not an eye irritant.

Respiratory or skin sensitization

Respiratory sensitization

Not a respiratory sensitizer.

Skin sensitization

May cause sensitization by skin contact.

Germ cell mutagenicity

Not classified.

Carcinogenicity

This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.

IARC Monographs. Overall Evaluation of Carcinogenicity

Atrazine (CAS 1912-24-9)	3 Not classifiable as to carcinogenicity to humans.
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OSHA Specifically Regulated Substances (29 CFR 1910.1001-1053)

Not listed.

US. National Toxicology Program (NTP) Report on Carcinogens

Not listed.

Reproductive toxicity

May damage fertility or the unborn child.

Specific target organ toxicity - single exposure

No specific target organ toxicity is expected after single exposure.

Specific target organ toxicity - repeated exposure

May cause damage to organs through prolonged or repeated exposure.

Aspiration hazard

Not an aspiration hazard.

12. Ecological information

Ecotoxicity

Toxic to aquatic life. Toxic to aquatic life with long lasting effects.

Components	Species		Test Results
Atrazine (CAS 1912-24-9)			
Aquatic			
Acute			
Algae	IC50	Green algae (Selenastrum capricornutum)	0.13 mg/l, 96 hours
			0.026 mg/l, 96 hours
Crustacea	EC50	Water flea (Daphnia pulex)	28.8 - 46.3 mg/l, 48 hours
Fish	LC50	Sheepshead minnow (Cyprinodon variegatus)	1.43 - 3.21 mg/l, 96 hours
Topramezone (CAS 210631-68-8)			
Aquatic			
Algae	EC50	Pseudokirchnerella subcapitata	17.2 mg/l
Other	EC50	Lemna gibba (fronds)	0.009 mg/l
Acute			
Crustacea	EC50	Mysidopsis bahia	2.7 mg/l, 96 hours
Fish	LC50	Bluegill (Lepomis macrochirus)	> 250 mg/l, 96 hours nominal concentration
		Oncorhynchus mykiss	> 100 mg/l, 96 hours nominal concentration
Chronic			
Crustacea	NOEC	Daphnia magna	50 mg/l, 21 days
Fish	NOEC	Oncorhynchus mykiss	3.2 mg/l
Other	NOEC	Lemna gibba (fronds)	0.001 mg/l, 7 days
Persistence and degradability	No data is available on the degradability of this product.		
Bioaccumulative potential			
Partition coefficient n-octanol / water (log Kow)			
Atrazine			2.61
Topramezone			-1.52, (20 °C)
Mobility in soil	No data available.		
Other adverse effects	No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this component.		
13. Disposal considerations			
Disposal instructions	Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Dispose of contents/container in accordance with local/regional/national/international regulations.		
Local disposal regulations	Dispose in accordance with all applicable regulations.		
Hazardous waste code	The waste code should be assigned in discussion between the user, the producer and the waste disposal company.		
Waste from residues / unused products	Dispose of in accordance with all applicable regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see: Disposal methods/information).		
Contaminated packaging	Since emptied containers may retain product residue, follow label warnings even after container is emptied. Empty containers should be taken to an approved waste handling site for recycling or disposal in accordance with all applicable regulations.		
14. Transport information			
DOT			
Not regulated as dangerous goods.			
IATA			
UN number	UN3082		
UN proper shipping name	Environmentally hazardous substance, liquid, n.o.s. (Atrazine, Topramezone)		
Transport hazard class(es)			
Class	9		
Subsidiary risk	-		
Packing group	III		
Environmental hazards	Yes		
ERG Code	9L		

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

Other information

Passenger and cargo aircraft Allowed with restrictions.

Cargo aircraft only Allowed with restrictions.

Read safety instructions, SDS and emergency procedures before handling.

IMDG

UN number UN3082

UN proper shipping name ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Atrazine, Topramezone), MARINE POLLUTANT

Transport hazard class(es)

Class 9

Subsidiary risk -

Packing group III

Environmental hazards

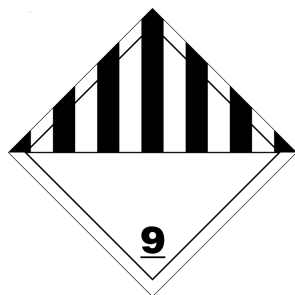
Marine pollutant Yes

EmS F-A, S-F

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code Not established.

IATA; IMDG



Marine pollutant



General information

IMDG Regulated Marine Pollutant.

15. Regulatory information

US federal regulations

This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.

This product is registered under EPA/FIFRA Regulations as a RESTRICTED USE PESTICIDE. It is a violation of Federal Law to use this product in any manner inconsistent with its labeling. Read and follow all label directions. This product is excluded from listing requirements under EPA/TSCA.

This is a pesticide product registered by the United States Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets (SDS), and for workplace labels of non-pesticide chemicals. A portion of the hazard information required on the pesticide label, including the EPA mandated signal word, is reproduced below. The pesticide label also includes other important information, including restrictions and directions for use.

HAZARD TO HUMANS AND DOMESTIC ANIMALS.

CAUTION! Harmful if absorbed through skin. Harmful if swallowed. Avoid contact with skin, eyes or clothing. Prolonged or frequently repeated skin contact may cause allergic reactions in some individuals. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum using tobacco, or using the toilet.

ENVIRONMENTAL HAZARDS

This pesticide is toxic to aquatic invertebrates. Do not apply directly to water, to areas where surface water is present or to intertidal areas below the mean high water mark. Do not apply when weather conditions favor drift from areas treated. Runoff and drift from treated areas may be hazardous to aquatic organisms in neighboring areas. Do not contaminate water when disposing of equipment washwaters.

Toxic Substances Control Act (TSCA)

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

Not regulated.

CERCLA Hazardous Substance List (40 CFR 302.4)

Not listed.

SARA 304 Emergency release notification

Not regulated.

OSHA Specifically Regulated Substances (29 CFR 1910.1001-1053)

Not listed.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

SARA 302 Extremely hazardous substance

Not listed.

SARA 311/312 Hazardous chemical

Yes

Classified hazard categories

Acute toxicity (any route of exposure)
Respiratory or skin sensitization
Reproductive toxicity
Specific target organ toxicity (single or repeated exposure)

SARA 313 (TRI reporting)

Chemical name	CAS number	% by wt.
Atrazine	1912-24-9	42.6

Other federal regulations

Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List

Not regulated.

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130)

Not regulated.

Safe Drinking Water Act (SDWA)

Not regulated.

US state regulations

California Proposition 65



WARNING: This product can expose you to chemicals including Propylene Oxide, which are known to the State of California to cause cancer, and Atrazine, which are known to the State of California to cause birth defects or other reproductive harm. For more information go to www.P65Warnings.ca.gov.

International Inventories

Country(s) or region	Inventory name	On inventory (yes/no)*
United States & Puerto Rico	Toxic Substances Control Act (TSCA) Inventory	No

*A "Yes" indicates that all components of this product comply with the inventory requirements administered by the governing country(s)

A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).

16. Other information, including date of preparation or last revision

Issue date Feb-01-2017

Revision date Jul-26-2023

Version # 4.0

HMIS® ratings Health: 2*
Flammability: 1
Physical hazard: 0

NFPA ratings Health: 2
Flammability: 1
Instability: 0

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AMVAC Chemical Corporation cannot anticipate all conditions under which this information and its product, or the products of other manufacturers in combination with its product, may be used. It is the user's responsibility to ensure safe conditions for handling, storage and disposal of the product, and to assume liability for loss, injury, damage or expense due to improper use.

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Revision information This document has undergone significant changes and should be reviewed in its entirety.