

SAFETY DATA SHEET

SECTION 1: IDENTIFICATION

COMPANY NAME:	AMERICAN INDUSTRIES, INC.	PRODUCT NAME:	STERN-X
ADDRESS LINE 1:	4300 Kahn Drive, Box 1405	PRODUCT CODE:	1202
ADDRESS LINE 2:	Lumberton, NC 28359-1405 USA	PRODUCT USE:	Non-selective Residual Herbicide
TELEPHONE NUMBERS:	800-753-5153 (or) 910-738-7224	SDS FILE ID:	1202.10
EMERGENCY PHONE:	CHEMTREC 1-800-424-9300	SDS DATE:	2021-05-28
		REPLACES VERSION DATED:	2015-06-01 <i>and all prior versions</i>

SECTION 2: HAZARDS IDENTIFICATION

Classification:	Flammable Liquid	Category 4 H227
	Acute Toxicity (Dermal)	Category 4 H312
	Acute Toxicity (inhalation: dust,mist)	Category 4 H332
	Skin Irritant	Category 2 H315
	Eye Irritant	Category 2 H319
	Carcinogen	Category 1B H350
	Specific Target Organ Toxicity SE	Category 3 H336
	Specific Target Organ Toxicity RE	Category 2 H373
	Aspiration Hazard	Category 1 H304

Label elements



Signal word	Danger
Hazard statement:	Combustible liquid. May be fatal if swallowed and enters airways. Harmful in contact with skin or if inhaled. Causes skin irritation. Causes serious eye irritation. May cause drowsiness or dizziness. May cause cancer. May cause damage to organs (liver, thymus, bone marrow) through prolonged or repeated exposure.
Precautionary statement	Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Keep away from heat, sparks, open flames, and hot surfaces. No smoking. Do not breathe vapors, mist, fume. Avoid breathing mist, spray, vapors. Wash hands thoroughly after handling. Use only outdoors or in a well-ventilated area. Wear protective clothing, eye protection, protective gloves. If swallowed: Immediately call a POISON CENTER, a doctor. If on skin: Wash with plenty of water. If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If inhaled: remove person to fresh air and keep comfortable for breathing. If exposed or concerned: Get medical advice/attention. Call a doctor, a POISON CENTER, a doctor. Get medical advice/attention if you feel unwell. Specific treatment (see First aid measures on this label). Do NOT induce vomiting. If skin irritation occurs: Get medical advice/attention. If eye irritation persists: Get medical advice/attention. Take off contaminated clothing and wash before reuse. In case of fire: use water, dry extinguishing powder, carbon dioxide (CO ₂), alcohol resistant foam to extinguish. Store in a well-ventilated place. Keep cool. Store locked. Dispose of contents/container to comply with local/regional/national regulations.
Other hazards	No additional information available.
Unknown acute toxicity	Not applicable

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

Substance	Not applicable
Full text of H-phrases: see section 16	

Mixtures

<u>Chemical name</u>	<u>CAS number</u>	<u>%</u>	<u>GHS Classification</u>
Petroleum Solvent	68476-34-6	75-90	Flam. Liq. 3, H226 Acute Tox. 4 (Dermal). H312 Acute Tox. 4 (Inhalation). H332 Acute Tox. 4 (Inhalation : dust, mist). H332 Skin Irrit. 2, H315 Carc. 2, H351 STOT SE, 3, H336 STOT RE 2, H373 Asp. Tox 1, H304
Glycol Ether EB	111-76-2	10-20	Flam. Liq. 4, H227 Acute Tox. 4 (Oral). H302 Skin Irrit. 2, H315 Eye Irrit. 2A, H319 Asp. Tox 1, H304
2-ethylhexyl 2,4-dichlorophenoxyacetate	1928-43-4	0.5-1.5	Acute Tox. 4 (Oral), H302
Naphthalene	91-20-3	0-0.3	Flam. Liq. 4, H227 Acute Tox. 4 (Oral), H302 Car. 1B, H350 Aquatic Acute 1, H400

SECTION 4: FIRST AID MEASURES

General	If you feel unwell, seek medical advice (show the label where possible). If exposed or concerned: Get medical advice/attention.
Inhalation	If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing. Call a POISON CENTER or doctor/physician if you feel unwell.
Skin contact	Remove affected clothing and wash all exposed skin area with mild soap and water, followed by warm water rinse. Wash contaminated clothing before reuse. If skin irritation or rash occurs: Get medical advice/attention.
Eye contact	If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice or attention.
Ingestion	If swallowed: Do NOT induce vomiting. Immediately call a poison center or doctor/physician.
Symptoms/injuries	If you feel unwell, seek medical advice. May cause cancer. May be fatal if swallowed and enters airways. Harmful if inhaled. Harmful in contact with skin. Causes skin irritation. Causes serious eye irritation. May cause drowsiness or dizziness. May cause damage to organs (liver, thymus, bone marrow) through prolonged or repeated exposure.
Symptoms/injuries after inhalation	Harmful if inhaled. May cause drowsiness or dizziness.
Symptoms/injuries after skin contact	Causes skin irritation.
Symptoms/injuries after eye contact	Causes serious eye irritation.
Symptoms/injuries after ingestion	May be fatal if swallowed and enters airways.
Special treatment needed	No additional information available.

SECTION 5: FIRE-FIGHTING MEASURES

Suitable extinguishing media	Dry chemical powder, Carbon dioxide, alcohol resistant foam.
Unsuitable extinguishing media	Solid water jet ineffective as extinguishing medium.
Fire hazard	Combustible liquid

Explosion hazard	Explosion risk in case of fire. Heat may build pressure, rupturing closed containers, spreading fire and increasing risk of burns and injuries. May be ignited by sparks. May form flammable/explosive vapor air mixture.
Reactivity	On burning: release of toxic and corrosive gases/vapors (nitrous vapors, sulphur, oxides, carbon monoxide-carbon dioxide). If the product is involved in a fire, it can release toxic chlorine gases. Reacts violently with (strong) oxidizers.
Firefighting instructions	Exercise caution when fighting any chemical fire. In case of fire: Evacuate area. Fight fire remotely due to the risk of explosion. Use water spray or fog for cooling exposed containers. Take account of environmentally hazardous firefighting water.
Protection during firefighting	Do not enter fire area without proper protective equipment, including respiratory protection.

SECTION 6: ACCIDENTAL RELEASE MEASURES

General measures	Remove ignition sources. Use special care to avoid static electric charges.
Protective equipment for non-emergency personnel	Protective goggles. Gloves. Protective clothing.
Emergency procedures for non-emergency personnel	Evacuate unnecessary personnel. No naked flames or sparks.
Protective equipment for emergency responders	Equip cleanup crew with proper protection.
Emergency procedures for emergency responders	Stop leak if safe to do so. Stop release. Ventilate area.
Environmental precautions	Avoid release to the environment. Prevent entry to sewers and public waters.
Methods for containment	Contain released substance, pump into suitable containers.
Methods for cleaning up	This material and its container must be disposed of in a safe way, and as per local legislation. Take up liquid spill into inert absorbent material, e.g.: sand/earth. Clean contaminated surfaces with a soap solution.

SECTION 7: HANDLING AND STORAGE

Additional hazards when processed	Handle empty containers with care because residual vapors are flammable. In use, may form flammable vapor-air mixture. Keep away from open flame, sparks, excessive heat - No smoking.
Precautions for safe handling	Comply with the legal requirements. Do not handle until all safety precautions have been read and understood. Do not breathe vapors. Use personal protective equipment as required. Do not eat, drink or smoke when using this product. Do not get in eyes, on skin, or on clothing. Handle and open the container with care. Keep away from sources of ignition-No smoking. Take precautions against electrostatic charges. Obtain special instructions before use. Remove contaminated clothing immediately.
Hygiene measures	Wash thoroughly after handling. Wash contaminated clothing before reuse.
Technical measures	Comply with applicable regulations. Proper grounding procedures to avoid static electricity should be followed.
Storage conditions	Keep container tightly closed. Keep only in the original container in a cool, well ventilated place away from: sparks, open flames, excessive heat.
Incompatible products	Oxidizing agent.
Incompatible materials	Sources of ignition.
Heat –ignition	KEEP SUBSTANCE AWAY FROM: Ignition sources. Heat sources.
Prohibitions on mixed storage	KEEP SUBSTANCE AWAY FROM: oxidizing agents.
Storage area	Store away from heat. Store in a cool area. Store in a dry area. Store in a well-ventilated place. Keep locked up.

Special rules on packaging Keep only in original container. Meet the legal requirements.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

Naphthalene (91-20-3)

ACGIH	ACGIH TWA (ppm)	10 ppm
ACGIH	Remark (ACGIH)	Hematologic eff; URT & eye irr; Skin; A3 (Confirmed Animal Carcinogen with Unknown Relevance to Humans; The agent is carcinogenic in experimental animals at a relatively high dose, by route(s) of administration, at site(s), of histologic type(s), or by mechanism(s) that may not be relevant to worker exposure. Available epidemiologic studies do not confirm an increased risk of cancer in exposed humans. Available evidence does not suggest that the agent is likely to cause cancer in humans except under uncommon or unlikely routes of levels of exposure.
OSHA	OSHA PEL (TWA) (mg/m ³)	50 mg/m ³
OSHA	OSHA PEL (TWA) (ppm)	10 ppm

Glycol Ether EB (111-76-2)

ACGIH	ACGIH TWA (ppm)	20 ppm
ACGIH	Remark (ACGIH)	Eye & URT irr
OSHA	OSHA PEL (TWA) (mg/m ³)	240 mg/m ³
OSHA	OSHA PEL (TWA) (ppm)	50 ppm

2-ethylhexyl 2, 4-dichlorophenoxyacetate (1928-43-4)

Petroleum Solvent (68476-34-6) Not applicable

Personal protective equipment Use appropriate personal protective equipment when risk assessment indicates this is necessary. Gloves. Protective clothing. Protective goggles. Safety glasses.

Appropriate engineering controls Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Physical State	Liquid
Appearance	Clear, red colored liquid
Odor	Fuel oil odor
Odor threshold	No data available
pH	No data available
Melting point	No data available
Boiling point	No data available
Freezing Point	No data available
Flash point	145°F (63°C)
Relative evaporation rate (butyl acetate=1)	No data available
Flammability (solid, gas)	No data available
Explosion limits	No data available
Explosive properties	Heating may cause a fire or explosion.
Oxidizing properties	No data available
Vapor pressure	No data available
Relative density	No data available

Relative vapor density at 20°C (68°F)	No data available
Specific gravity/density	0.875 g/ml
Solubility in Water	Insoluble in water
Log Pow	No data available
Log Kow	No data available
Auto-ignition temperature	No data available
Decomposition temperature	No data available
Viscosity	No data available
Viscosity, kinematic	<20 cSt
Viscosity, dynamic	No data available
VOC content	>90 %

SECTION 10: STABILITY AND REACTIVITY

Reactivity	On burning: release of toxic and corrosive gases/vapors (nitrous vapors, sulphur oxides, carbon monoxide-carbon dioxide). If the product is involved in a fire, it can release toxic chlorine gases. Reacts violently with (strong) oxidizers.
Chemical stability	Combustible liquid. Stable under normal conditions. Risk of explosion if heated under confinement. Heating may cause a fire or explosion.
Conditions to avoid	Refer to section 10 on Incompatible materials. Open flame. Overheating. Sparks.
Incompatibility	Oxidizing agents.
Hazardous decomposition products	Thermal decomposition produces: CO, CO ₂ , Oxides of nitrogen and other potentially toxic fumes.
Possible hazardous reactions	Refer to section 10 on Reactivity.

SECTION 11: TOXICOLOGICAL INFORMATION

Acute toxicity	Dermal: Harmful in contact with skin. Inhalation: dust, mist: Harmful if inhaled.	
<u>Naphthalene (91-20-3)</u>	LD50 oral rat	>1100 mg/kg (Rat)
	LD50 dermal rat	>2500 mg/kg (Rat)
	LD50 dermal rabbit	>20000 mg/kg (Rabbit)
	ATE CLP (oral)	500.000 mg/kg body weight
<u>Glycol Ether EB (111-76-2)</u>	LD50 oral rat	1300 mg/kg
	LD50 dermal rat	>2000 mg/kg
	ATE CLP (oral)	1300.000 mg/kg body weight
	ATE CLP (dermal)	1100.000 mg/kg body weight
<u>2-ethylhexyl, 2,4-dichlorophenoxyacetate (1928-43-4)</u>	ATE CLP (dust, mist)	1.500 mg/l/4h
	LD50 oral rat	896 mg/kg (Rat)
	LD50 dermal rabbit	>2000 mg/kg (Rabbit)
	LC50 inhalation (rat (mg/l))	>5.4 mg/l/4h (Rat)
<u>Petroleum Solvent (68476-34-6)</u>	LD50 oral rat	>7600 mg/kg
	LD50 dermal rabbit	>4300 mg/kg (Rabbit)
	LC50 inhalation rat (mg/l)	4.1 mg/l
Skin corrosion/irritation	Causes skin irritation.	
Serious eye damage/irritation	Causes serious eye irritation.	
Respiratory or skin sensitization	Not classified.	
Germ cell mutagenicity	Not classified.	
Carcinogenicity	May cause cancer.	

<u>Naphthalene (91-20-3)</u>	IARC group	2B-Possibly Carcinogenic to Humans
	NTP Status	3-Reasonably anticipated to be Human Carcinogen
<u>Glycol Ether EB (111-76-2)</u>	IARC group	3-Not classifiable
Reproductive toxicity	Not classified	
Specific target organ toxicity (single exposure)	May cause drowsiness or dizziness	
Specific target organ toxicity (repeated exposure)	May cause damage to organs (liver, thymus, bone marrow) through prolonged or repeated exposure	
<u>Glycol Ether EB (111-76-2)</u>	NOAEL (oral,rat,90 days)	See comments
	NOAEL (dermal,rat/rabbit,90 days)	See comments
Aspiration hazard	May be fatal if swallowed and enters airways.	
Symptoms/injuries after inhalation	Harmful if inhaled. May cause drowsiness or dizziness.	
Symptoms/injuries after skin contact	Causes skin irritation.	
Symptoms/injuries after eye contact	Causes serious eye irritation.	
Symptoms/Injuries after ingestion	May be fatal if swallowed and enters airways.	
Likely routes of exposure	Skin and eyes contact; ingestion; inhalation.	

SECTION 12: ECOLOGICAL INFORMATION

Toxicity

Naphthalene (91-20-3)	LC50 fish 2	0.11 mg/l (96 h; Oncorhynchus mykiss)
	EC50 Daphnia 1	2.16 mg/l (48 h; Daphnia magna)
	Threshold limit algae 1	0.4 mg/l (EC50; 72h; Skeletonema costatum)
Glycol Ether EB (111-76-2)	LC50 fish 1	1474 mg/l Oncorhynchus mykiss
	EC50 Daphnia 1	100 mg/l Water flea
	ErC50 (algae)	1840 mg/l Pseudokirchneriella subcapitata
	NOEC chronic fish	>100 mg/l
	NOEC chronic crustacea	100 mg/l daphnid

Persistence and degradability

Naphthalene (91-20-3)	Persistence and degradability	Readily biodegradable in water. Foaming sediments in water. Biodegradable in the soil. Absorbs into the soil. Photolysis in the air.
	Biochemical oxygen demand (BOD)	0 g O ₂ /g substance
	Chemical oxygen demand (COD)	0.22 g O ₂ /g substance
	ThOD	2.99 g O ₂ /g substance

Bioaccumulative potential

Naphthalene (91-20-3)	BCF fish 1	23 – 168 (8 weeks; Cyprinus carpio)
	LOG POW	3.30 (Experimental value)
	Bioaccumulative potential	Low potential for bioaccumulation (BCF <500).
2-ethylhexyl 2,4-dichlorophenoxyacetate (1928-43-4)	Log Pow	5.78 (Experimental value)

SECTION 13: DISPOSAL CONSIDERATIONS

Product/Packaging disposal	Dispose of contents/container to comply with local/regional/national regulations.
Additional information	Clean up even minor leaks or spills, if possible without unnecessary risk. Handle empty containers with care because residual vapors are flammable.

SECTION 14: TRANSPORT INFORMATION

DOT-55 Gal Drum	NA1993 Combustible liquid, n.o.s. (Aliphatic Hydrocarbon), 3, III Liquid Weedkiller 155050 Pesticides, NOI, Including Herbicides or Insecticides Sub 6
DOT-5 Gal Pail	Herbicides
Other information	When transported by ground in non-bulk containers, this product utilizes the exception found under 49 CFR 173.150
ADR	No additional information available.
Transport by sea	No additional information available
Air transport	No additional information available.

SECTION 15: REGULATORY INFORMATION

TSCA Status: All chemicals are listed or exempt.

Chemical(s) subject to the reporting requirements of Section 313 or Title III of the Superfund Amendments and Reauthorization Act (SARA) of 1986 and 40 CFR Part 372.

Bromacil	CAS No 314-40-9	0.1 – 1%
Naphthalene	CAS No 91-20-3	0 – 0.3%
2-ethylhexyl 2,4-dichlorophenoxyacetate	CAS No 1928-43-4	0.5 – 1.5%
Glycol Ether EB	CAS No 111-76-2	10 – 30%
Benzene	CAS No 71-43-2	0 – 0.017%
1,2,4-trimethylbenzene	CAS No 95-63-6	0.083 – 0.831%
Naphthalene (91-20-3)	Listed on SARA Section 313 (Specific toxic chemical listings)	RQ (Reportable quantity, section 304 of EPA's List of Lists) 100 lb
2-ethylhexyl 2,4-dichlorophenoxyacetate (1928-43-4)	Listed on SARA Section 313 (Specific toxic chemical listings)	
Bromacil (314-40-9)	Listed on SARA Section 313 (Specific toxic chemical listings)	

This chemical is a pesticide product registered by the 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, and for workplace labels of non-pesticide chemicals. Following is the hazard information as required on the pesticide label:

Caution: Harmful if swallowed. Harmful if absorbed through the skin. Causes moderate eye irritation. Avoid contact with skin, eyes, or clothing.

EPA REG NO: 01088-00002-38090

CALIFORNIA PROPOSITION 65-This product contains, or may contain, trace quantities of a substance(s) known to the State of California to cause cancer and/or reproductive toxicity.

SECTION 16: OTHER INFORMATION

Training advice: Normal use of this product shall imply use in accordance with the instructions on the packaging.

Full text of H-phrases:

H226 Flammable liquid and vapor

H227 Combustible liquid

H302 Harmful if swallowed

H304 May be fatal if swallowed and enters airways

H312 Harmful in contact with skin

H315 Causes skin irritation

H319 Causes serious eye irritation

H332 Harmful if inhaled

H336 May cause drowsiness or dizziness

H350 May cause cancer

H351 suspected of causing cancer

H373 May cause damage to organs through prolonged or repeated exposure

H400 Very toxic to aquatic life

Important Note: *To be the best of our knowledge, the information contained herein is accurate. However, there is no assumption of liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist. Since the conditions of handling, storage and disposal of this product are beyond the control of the manufacturer/supplier, the manufacturer/supplier will not be responsible for loss, injury, or expense arising out of the products improper use. Various government agencies may have specific regulations regarding the transportation, handling, storage, use, or disposal of this product which may not be covered by this SDS. The user is responsible for full compliance.*

End of SDS