SAFETY DATA SHEET

FOR ANY EMERGENCY, 24 HOURS / 7 DAYS, CALL:

FOR ALL TRANSPORTATION ACCIDENTS, CALL CHEMTREC®:

FOR ALL SDS QUESTIONS & REQUESTS, CALL:

1-800-654-6911 (OUTSIDE USA: 1-423-780-2970) 1-800-424-9300 (OUTSIDE USA: 1-703-527-3887) 1-800-511-MSDS (OUTSIDE USA: 1-423-780-2347)

PRODUCT NAME: ROBARB POOL SPECIALTIES CHLORINE STABILIZER

SECTION 1. PRODUCT AND COMPANY IDENTIFICATION

Advantis Technologies 1200 Bluegrass Lakes Parkway Alpharetta, GA 30004 United States of America REVISION DATE: SUPERCEDES:

05/26/2015 12/01/2010

MSDS Number: SYNONYMS: CHEMICAL FAMILY: DESCRIPTION / USE FORMULA:

000000024503

None None established None established

SECTION 2. HAZARDS IDENTIFICATION

GHS Classification Acute toxicity (Oral)	:	Category 4
Eye irritation	:	Category 2B
Specific target organ toxicity - single exposure (Oral)	:	Category 3 (Kidney)
GHS Label element		
Hazard pictograms	:	
Signal word	:	Warning
Hazard statements	:	H302 Harmful if swallowed. H320 Causes eye irritation. H335 May cause respiratory irritation.
Precautionary statements	:	Prevention:

P261 Avoid breathing vapours. P264 Wash hands thoroughly after handling. P271 Use only outdoors or in a well-ventilated area. P280 Wear protective gloves/ protective clothing/ eye protection/ face protection. **Response:** P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. P337 + P313 If eye irritation persists: Get medical advice/ attention. P304 + P340 IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. P301 + P312 IF SWALLOWED: Call a POISON CENTER or doctor/ physician if you feel unwell. P330 Rinse mouth. Storage: P403 + P233 Store in a well-ventilated place. Keep container tiahtly closed. P405 Store locked up. Disposal: P501 Dispose of contents/container in accordance with local regulation.

Other hazards

None known.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

CAS OR CHEMICAL NAME C 1,3,5-TRIAZINE-2,4,6(1H,3H,5H)-TRIONE

<u>CAS #</u> 108-80-5 <u>% RANGE</u> 95 - 100

SECTION 4. FIRST AID MEASURES

Inhalation:	IF INHALED: Remove individual to fresh air. Seek medical attention if breathing becomes difficult or if respiratory irritation develops.
Skin Contact:	IF ON SKIN: Flush skin with water for 15 minutes. Take off all contaminated
	clothing. Seek medical attention if irritation develops.
Eye Contact:	IF IN EYES: Flush eyes with plenty of water for at least 15 minutes. Seek medical attention if irritation develops.
Ingestion:	IF SWALLOWED: Immediately drink water to dilute. Seek medical attention if symptoms develop. Never give anything by mouth to an unconscious person.

SECTION 5. FIREFIGHTING MEASURES

Flammability Summary (OSHA):	Product is not known to be flammable, combustible, pyrophoric or explosive.
Flammable Properties	
Flash Point:	Not applicable
Autoignition Temperature:	Not applicable
Fire / Explosion Hazards:	Material will not ignite or burn. During a fire, irritating and highly toxic gases may be generated by thermal decomposition or combustion.
Extinguishing Media:	Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.
Fire Fighting Instructions:	Use water spray to cool unopened containers. In case of fire, use normal fire-fighting equipment and the personal protective equipment recommended in Section 8 to include a NIOSH approved self-contained breathing apparatus.
Hazardous Combustion Products:	Carbon monoxide, Carbon dioxide
Upper Flammable / Explosive Limit, % in air:	Not applicable
Lower Flammable / Explosive Limit, % in air:	Not applicable

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal Protection for Emergency Situations:	Use the personal protective equipment recommended in Section 8 and a NIOSH approved self-contained breathing apparatus.
<u>Spill Mitigation Procedures</u> Air Release:	Not applicable
Water Release:	If the product contaminates rivers and lakes or drains inform respective authorities.
Land Release:	Sweep up and shovel into suitable containers for disposal.Do not place spill materials back in their original containers.
Additional Spill Information :	Stop source of spill as soon as possible and notify appropriate personnel. Utilize emergency response personal protection equipment prior to the start of any response. Evacuate all non- essential personnel. Dispose of spill residues per guidelines under Section 13, Disposal Consideration.

SECTION 7. HANDLING AND STORAGE

Handling	J:
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Storage:

Do not take internally. Avoid contact with skin, eyes and clothing. Upon contact with skin or eyes, wash off with water. Store in a cool, dry and well ventilated place. Isolate from incompatible materials. Keep containers tightly closed when not in use. Incompatible Materials for Storage: Refer to Section 10, "Incompatible Materials."

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Ventilation:	Local exhaust ventilation or other engineering controls are normally required		
	when handling or using this product to keep airborne exposures below the		
	TLV, PEL or other recommended exposure limit.		
Protective Equipment for Routine Use of Product			

Respiratory Protection :	Wear a NIOSH approved respirator if levels above the exposure limits are
	possible., Wear a NIOSH approved N95 respirator.
Skin Protection :	Impervious gloves
Eye Protection:	Safety glasses with side-shields
Protective Clothing Type:	impervious clothing
General Protective	Emergency eyewash should be provided in the immediate work area.
Measures:	

Components with workplace control parameters

Components (CAS-No.)	Value	Control parameters	Basis (Update)
1,3,5-TRIAZINE-2,4,6(1H,3H,5H)-TRIONE (108-80-5)	TWA	10 mg/m3	WEEL (2012)
	TWA	5 mg/m3	WEEL (2012)

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Physical State: Form	solid powder
Color: Odor: Malagular Waight	white None None satablished
Molecular Weight: pH :	None established Approximately 5.0 ()
Boiling Point:	Not applicable
Melting point/freezing	Not applicable
point Density	0.79 - 0.85 g/cm3
point	
point Density	0.79 - 0.85 g/cm3 ()

Solubility in Water:	10 g/l 77 °F (25 °C)
Partition coefficient n- octanol/water:	Not applicable
Evaporation Rate:	Not applicable
Oxidizing:	None established
Volatiles, % by vol.:	Not applicable
VOC Content	This product does not contain any chemicals listed under the U.S. Clean Air Act Section 111 SOCMI Intermediate or Final VOC's (40 CFR 60.489). This product does not contain any VOC exemptions listed under the U.S. Clean Air Act Section 450.
HAP Content	No data

SECTION 10. STABILITY AND REACTIVITY

Stability and Reactivity Summary:	Stable under normal conditions., Product will not undergo hazardous polymerization.
Conditions to Avoid:	High temperatures, Contact with incompatible substances
Chemical Incompatibility:	Oxidizing agents
Hazardous Decomposition Products: Decomposition Temperature:	Carbon oxides, Nitrogen oxides (NOx), cyanic acid >300 °C

SECTION 11. TOXICOLOGICAL INFORMATION

Component Animal Toxic Oral LD50 value:	ology			
1,3,5-TRIAZINE- 2,4,6(1H,3H,5H)- TRIONE	LD50	>	10,000 mg/kg	Rat
Component Animal Toxicology				
Dermal LD50 value:				

 Dermai LD50 value:

 1,3,5-TRIAZINE LD50 > 7,940 mg/kg Rabbit

 2,4,6(1H,3H,5H) TRIONE

Component Animal Toxicology Inhalation LC50 value: 1,3,5-TRIAZINE- No data 2,4,6(1H,3H,5H)-TRIONE

Product Animal ToxicityOral LD50 value:LD50Believed to be > 5,000 mg/kgRatDermal LD50 value:LD50Believed to be > 2,000 mg/kgRabbitInhalation LC50LC50no data availableRabbitROBARB POOL SPECIALTIES CHLORINE STABILIZERREVISION DATE : 05/26/2015Page 5 of 9

<u>value</u> : Skin Irritation: Eye Irritation: Skin Sensitization:	Not expected to cause irritation. May cause mild eye irritation. This material is not known or reported to be a skin or respiratory sensitizer.
Acute Toxicity:	May cause mild eye irritation. Ingestion may cause mild gastrointestinal discomfort.
Subchronic / Chronic Toxicity:	Target organ damage to the kidneys from ingestion due to precipitation of crystals of cyanuric acid which results in formation of kidney stones.
Reproductive and Developmental Toxicity	This chemical has been tested in laboratory animals and no evidence of teratogenicity was seen.
Mutagenicity:	This chemical has been tested in a battery of mutagenicity/genotoxicity assays and the results were negative.
Carcinogenicity:	This material did not cause cancer in long-term animal studies.

SECTION 12. ECOLOGICAL INFORMATION

Overview:

Practically non- toxic to fish and other aquatic organisms., Practically non-toxic to wildlife and domestic animals.

Ecological Toxicity Values for: 1,3,5-TRIAZINE-2,4,6(1H,3H,5H)-TRIONE

Bluegill sunfish Pimephales promelas (fathead minnow)	 (static). 96 h LC50 > 2,100 mg/l (static). 96 h LC50 > 2,100 mg/l
Rainbow trout (Salmo gairdneri), Daphnia magna, Algae Bobwhite quail	 (static). 96 h LC50 > 2,100 mg/l (static). 48 h LC50> 1,000 mg/l 96 h EC50 = 655 mg/l 8 day dietary LC50 > 10,000 ppm
Mallard duck	- 8 day dietary LC50 > 10,000 ppm

SECTION 13. DISPOSAL CONSIDERATIONS

CARE MUST BE TAKEN TO PREVENT ENVIRONMENTAL CONTAMINATION FROM THE USE OF THE MATERIAL. THE USER OF THE MATERIAL HAS THE RESPONSIBILITY TO DISPOSE OF UNUSED MATERIAL, RESIDUES AND CONTAINERS IN COMPLIANCE WITH ALL RELEVANT LOCAL, STATE AND FEDERAL LAWS AND REGULATIONS REGARDING TREATMENT, STORAGE AND DISPOSAL FOR HAZARDOUS AND NONHAZARDOUS WASTES.

Waste Disposal Summary : If this product becomes a waste, it DOES NOT meet the criteria of a

hazardous waste as defined under 40 CFR 261, in that it does not exhibit the characteristics of hazardous waste of Subpart C, nor is it listed as a hazardous waste under Subpart D.As a nonhazardous solid waste it should be disposed of in accordance with local, state and federal regulations.

SECTION 14. TRANSPORT INFORMATION

DOT Not dangerous goods

TDG Not dangerous goods

IATA Not dangerous goods

IMDG-CODE Not dangerous goods

SECTION 15. REGULATORY INFORMATION

EPCRA - Emergency Planning and Community Right-to-Know Act

SARA 302

No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313

This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

Clean Air Act

This product does not contain any hazardous air pollutants (HAP), as defined by the U.S. Clean Air Act Section 12 (40 CFR 61).

This product does not contain any chemicals listed under the U.S. Clean Air Act Section 112(r) for Accidental Release Prevention (40 CFR 68.130, Subpart F).

This product does not contain any chemicals listed under the U.S. Clean Air Act Section 111 SOCMI Intermediate or Final VOC's (40 CFR 60.489).

Clean Water Act

This product does not contain any Hazardous Substances listed under the U.S. CleanWater Act, Section 311, Table 116.4A.

This product does not contain any Hazardous Chemicals listed under the U.S. CleanWater Act, Section 311, Table 117.3.

This product does not contain any toxic pollutants listed under the U.S. Clean Water Act Section 307

US State Regulations

Massachusetts Right To Know No com

No components are subject to the Massachusetts Right to Know Act.

Pennsylvania Right To Know					
Cyanuric acid	108-80-5				
Cyanuric acid	108-80-5				
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California Prop 65

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

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

TSCA	:	The components of this product are listed on the TSCA
		Inventory of Existing Chemical Substances.

Inventories

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

SECTION 16. OTHER INFORMATION

SECTIONS REVISED:	2
Major References :	Available upon request.

THIS MATERIAL SAFETY DATA SHEET (MSDS) HAS BEEN PREPARED IN COMPLIANCE WITH THE FEDERAL OSHA HAZARD COMMUNICATION STANDARD, 29 CFR 1910.1200. THE INFORMATION IN THIS MSDS SHOULD BE PROVIDED TO ALL WHO WILL USE, HANDLE, STORE, TRANSPORT, OR OTHERWISE BE EXPOSED TO THIS PRODUCT. THIS INFORMATION HAS BEEN PREPARED FOR THE GUIDANCE OF PLANT ENGINEERING, OPERATIONS AND MANAGEMENT AND FOR PERSONS WORKING WITH OR HANDLING THIS PRODUCT. ARCH CHEMICALS BELIEVES THIS INFORMATION TO BE RELIABLE AND UP TO DATE AS OF THE DATE OF PUBLICATION BUT, MAKES NO WARRANTY THAT IT IS. ADDITIONALLY, IF THIS MSDS IS MORE THAN THREE YEARS OLD, YOU SHOULD CONTACT ARCH CHEMICALS MSDS CONTROL AT THE PHONE NUMBER ON THE FRONT PAGE TO MAKE CERTAIN THAT THIS DOCUMENT IS CURRENT.