SAFETY DATA SHEET
pH & Alkalinity Down - 0140

Product Name: pH & Alkalinity Down
Date: 10/29/2015

SECTION 1 *IDENTIFICATION*

Supplier: Phoenix Products Company
55 Container Drive
Terryville, CT 06786
(860) 589-7502

Distributor: Essentials.
5070 Wallace Drive
Cumming, GA 30041
(626) 305-1182

U.S. Emergency Telephone: 1-800-222-1222
Product Name: **pH & Alkalinity Down**
Synonyms: Sodium Acid Sulfate; Sodium Hydrogen Sulfate; Nitre Cake; GBS
Chemical Name: Sodium Bisulfate
Chemical Formula: $NaHSO_4$
CAS Number: 7681-38-1
Product Use: Reduces pH in swimming pools and spas.

SECTION 2 *HAZARDS IDENTIFICATION*

Emergency Overview
Danger

GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)
Serious eye damage (Category 1), H318

Hazard Statement(s)
H318: Causes serious eye damage
H335: May cause respiratory irritation
H303: May be harmful if swallowed

Precautionary Statement(s)
P233: Keep container tightly closed.
P280: Wear protective gloves/eye protection/face protection.
P262: Do not get in eyes, on skin, or on clothing.
P271: Use only outdoors or in a well-ventilated area.
P305+351+338: 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.

Potential Acute Health Effects

Inhalation: Inhalation of dust may irritate nose, throat and/or lungs.

Ingestion: Small amounts (tablespoonful) swallowed are not likely to cause injury; however swallowing large amounts may irritate or burn digestive tract.

Skin Contact: Prolonged exposure may cause skin irritation.

Eye Contact: Causes serious eye irritation.

SECTION 2 *HAZARDS IDENTIFICATION*

Potential Chronic Health Effects

Chronic Effects: Contains material that may cause target organ damage, based on animal data.
Carcinogenicity: No known significant effects or critical hazards.
Mutagenicity: No known significant effects or critical hazards.
Teratogenicity: No known significant effects or critical hazards.
Developmental Effects: No known significant effects or critical hazards.
Fertility Effects: No known significant effects or critical hazards.

Target Organs: Contains material which may cause damage to the following organs: mucous membranes, skin, eyes.

SECTION 3 *COMPOSITION, INFORMATION ON INGREDIENTS*

Component	CAS Number	Percent
Sodium Bisulfate	7681-38-1	95%

SECTION 4 *FIRST-AID MEASURES*

Eye Contact: Immediately flush eyes with plenty of water for at least 20 minutes, occasionally lifting the upper and lower eyelids. If redness or irritation persists, get prompt medical attention.

Skin Contact: In case of contact, immediately flush skin with plenty of water for at least 20 minutes. If skin irritation occurs, seek medical attention.

Inhalation: Move exposed person to fresh air. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. If irritation or discomfort persists, seek medical attention.

Ingestion: Wash out mouth with water. Do not induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. Call medical doctor or poison control center immediately.

Protection of First-Aiders: If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

Notes to Physician: Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.

SECTION 5 *FIRE FIGHTING MEASURES*

Flammability of the Product: Non-flammable.

Extinguishing Media

Suitable: Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
Not Suitable: None known.

Special hazards arising from the substance or mixture: Sulfur oxides, Sodium oxides

Special Protective Equipment for Fire-Fighters: Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

SECTION 6 *ACCIDENTAL RELEASE MEASURES*

Personal Precautions: Use personal protective equipment. Avoid dust formation. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Evacuate personnel to safe areas. Avoid breathing dust.

Environmental Precautions: Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

Methods For Cleaning Up

Small Spill: Stop leak if without risk. Vacuum or sweep up material and place in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor.

Large Spill: Stop leak if without risk. Prevent entry into sewers, water courses, basements or confined areas. Vacuum or sweep up material and place in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor.

SECTION 7 *HANDLING AND STORAGE*

Handling: Put on appropriate personal protective equipment (see Section 8). Avoid breathing dusts. Wash thoroughly after handling.

Storage: Material is hygroscopic and will readily absorb moisture. DO NOT store dry product where exposed to moist conditions. Keep container tightly closed.

SECTION 8 *EXPOSURE CONTROLS/PERSONAL PROTECTION*

Components With Workplace Control Parameters: Contains no substances with occupational exposure limit values.

Recommended Monitoring Procedures: Personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment.

Engineering Measures: Use only with adequate ventilation. Use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits.

Hygiene Measures: Ensure that eyewash stations and safety showers are close to the workstation location. Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period.

Personal Protective Equipment

Eye/Face Protection: Face shield and safety glasses Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin Protection: Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

SECTION 8 ***EXPOSURE CONTROLS/PERSONAL PROTECTION - Continued***

Body Protection: Complete suit protecting against chemicals, The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Respiratory Protection: Where risk assessment shows air-purifying respirators are appropriate use a full-face particle respirator type N100 (US) or type P3 (EN 143) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Environmental Exposure Controls: Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. Do not let product enter drains.

SECTION 9 ***PHYSICAL AND CHEMICAL PROPERTIES***

Appearance:	Crystalline White Granular
Odor:	Odorless
Odor Threshold:	Not Available
Solubility:	Easily soluble in hot water. Soluble in cold water.
pH:	<1 [Conc. (% w/w): 5%]
Melting/Freezing Point:	177˚C (350.6˚F)
Boiling Point:	Not Applicable
Flash Point:	Not Available
Specific Gravity:	1.28 g/cm^3
Vapor Density (Air=1):	Not Available
Vapor Pressure (mm Hg):	Not Available
Evaporation Rate (BuAc=1):	Not Available
Partition Coefficient (n-octanol/water):	Not Available
Auto-ignition Temperature:	Not Available
Molecular Weight:	120.6 g/mole

SECTION 10 ***STABILITY AND REACTIVITY***

Chemical Stability: The product is stable.

Conditions to Avoid: DO NOT store dry product where exposed to moist conditions.

Incompatible Materials: Reactive or incompatible with the following materials: oxidizing materials, acids and alkalis. DO NOT MIX dry or concentrated solutions of this product with concentrated solutions of chlorine bleach, ammonia cleansers or similar products.

Hazardous Decomposition Products: Under normal conditions of storage and use, hazardous decomposition products should not be produced.

Possibility of Hazardous Reactions: Under normal conditions of storage and use, hazardous reactions will not occur.

SECTION 11 *TOXICOLOGICAL INFORMATION*

Acute Toxicity

Product/Ingredient Name	Result	Species	Dose	Exposure
Sodium Bisulfate	LD50 Oral	Rat	2800 mg/kg	

Skin Corrosion/Irritation

Skin – rabbit Result: No skin irritation – 4h (OECD Test Guideline 404)

Serious Eye Damage/Eye Irritation

Eyes – rabbit Result: Risk of serious damage to eyes. (OECD Test Guideline 405)

Mutagenicity: Not Available
Carcinogenicity: This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.
Reproductive Toxicity: Not Available
Specific target organ toxicity - single exposure: Not Available
Specific target organ toxicity - repeated exposure: Not Available
Aspiration Hazard: Not Available

Additional Information: RTECS: VZ1860000

To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.

SECTION 12 *ECOLOGICAL INFORMATION*

Environmental Effects: This product readily dissolves in water to form a weak acid solution. A 0.05 percent or greater (by weight) solution of this product will likely be acutely harmful to aquatic life.

Products of Biodegradation: Possibly hazardous short term degradation products are not likely. However, long term degradation products may arise.

Toxicity of the Products of Biodegradation: The product itself and its products of degradation are not toxic.

Other Adverse Effects: No known significant effects or critical hazards.

SECTION 13 *DISPOSAL CONSIDERATIONS*

Waste Disposal: The generation of waste should be avoided or minimized wherever possible. This material and its container must be disposed of in a safe way. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Empty containers or liners may retain some product residues. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste must be disposed of in accordance with federal, state and local environmental control regulations.

Contaminated Packaging: Dispose of as unused product.

SECTION 14 ***TRANSPORTATION DATA***

DOT:	**UN Number:**	ORM-D
	UN Proper Shipping Name:	ORM-D
	Transport Hazard Class:	ORM-D
	Packing Group:	ORM-D

Consumer commodity (ORM-D) means a material that is packaged and distributed in a form intended or suitable for sale through retail sales agencies or instrumentalities for consumption by individuals for purposes of personal care or household use. Valid until December 31, 2020.

TDG:	**UN Number:**	3260
	UN Proper Shipping Name:	Corrosive solid, acidic, inorganic, n.o.s.
	Transport Hazard Class:	8
	Packing Group:	III
MEX:	**UN Number:**	3260
	UN Proper Shipping Name:	Corrosive solid, acidic, inorganic, n.o.s.
	Transport Hazard Class:	8
	Packing Group:	III
IMDG:	**UN Number:**	3260
	UN Proper Shipping Name:	Corrosive solid, acidic, inorganic, n.o.s.
	Transport Hazard Class:	8
	Packing Group:	III
	EMS-No:	F-A, S-B
IATA:	**UN Number:**	3260
	UN Proper Shipping Name:	Corrosive solid, acidic, inorganic, n.o.s.
	Transport Hazard Class:	8
	Packing Group:	III

SECTION 15 ***REGULATORY INFORMATION***

United States

HCS Classification : Irritating material
U.S. Federal regulations : United States inventory (TSCA 8b): All components are listed or exempted.
SARA 302/304/311/312 extremely hazardous substances: No products were found.
SARA 302/304 emergency planning and notification: No products were found.
SARA 302/304/311/312 hazardous chemicals: Sodium bisulfate
SARA 311/312 MSDS distribution - chemical inventory - hazard identification: Sodium bisulfate: Immediate (acute) health hazard, Delayed (chronic) health hazard

Clean Air Act Section 112(b) Hazardous Air Pollutants (HAPs): Not listed
Clean Air Act Section 602 Class I Substances: Not listed
Clean Air Act Section 602 Class II Substances: Not listed
DEA List I Chemicals (Precursor Chemicals): Not listed
DEA List II Chemicals (Essential Chemicals): Not listed

SECTION 15 ***REGULATORY INFORMATION - Continued***

State Regulations

Massachusetts : None of the components are listed.
New York : None of the components are listed.
New Jersey : None of the components are listed.
Pennsylvania : None of the components are listed.
California Prop. 65: No products were found.

Canada

WHMIS (Canada): Class D-2B: Material causing other toxic effects (Toxic).

Canadian Lists

Canadian NPRI: None of the components are listed.
CEPA Toxic substances: None of the components are listed.
Canada inventory: All components are listed or exempted.

International Lists

Australia inventory (AICS): All components are listed or exempted.
China inventory (IECSC): All components are listed or exempted.
Japan inventory: All components are listed or exempted.
Korea inventory: All components are listed or exempted.
New Zealand Inventory of Chemicals (NZIoC): All components are listed or exempted.
Philippines inventory (PICCS): All components are listed or exempted.

SECTION 16 ***ADDITIONAL INFORMATION***

NFPA Ratings:	Health: 2	Flammability:	0	Reactivity:	1		
HMIS Ratings:	Health: 2	Chronic Health:	-	Flammability:	0	Physical:	0

No representations or warranties, either expressed or implied, of merchant ability, fitness for a particular purpose or any other nature are made hereunder with respect to information or the product to which information refers.

Date: 10/29/2015
Phoenix Products Company