



Safety Data Sheet

Section 1: Identification

Product Identifier: KeyPlex Jumpstart

Product Name: KeyPlex Jumpstart

Product Code:

Relevant identified uses of the substance or mixture and uses advised

Recommended use: To prevent and correct macro and micronutrient deficiencies when used as directed. Refer to the label.

Details of the supplier of the safety data sheet

Manufacturer: KeyPlex Manufacturing

Address: 2239 Commerce Ct., Bowling Green, FL 33834

Telephone (General) (407)682-6500

Emergency telephone number: ChemTrac 1-800-424-9300

Section 2: Hazard Identification

United States (US)

According to OSHA 29 CFR 1910.1200 HCS

Classification of the substances or mixture

OSHA HCS 2012

Label elements



Hazard statements

KeyPlex Jumpstart is a Neutral pH water soluble liquid. KeyPlex Jumpstart can corrode metals after prolonged exposure, always use acid resistant, corrosion resistant equipment when using or handling KeyPlex Jumpstart.

Precautionary statements:

For use in Agricultural production, to alleviate macro and micronutrient deficiencies. Use as directed on the label. Follow all local, state and federal regulations regarding agrochemical use. Keep out of reach of children.

Prevention: keep out of reach of children.

Response:

Storage/Disposal: Store in well-ventilated and secure storage facility. Ventilation system should be corrosive resistant. The product should be stored at ambient temperature. The product should not be stored below 5 degrees centigrade or above 50 degrees centigrade. Keep out of direct sunlight.

Other hazards

OSHA HCS 2012

Canada

According to WHMIS

Classification of the substance or mixture

WHMIS

Label elements

WHMIS

Other hazards

WHMIS

Other Information

Section 3: Composition / Information on Ingredients

Substances

- Material does not meet the criteria of a substance.

Mixtures

Ingredient Information					
Chemical Name	CASS Number	% (weight)	LD50/LC50	Classifications According to Regulation/Directive	Comments
Potassium Phosphate	11-4-7758	16.0-20.0	N/A		
Urea	57-13-6	1.22-1.48	N/A		
Ammonium Phosphate	68333-79-9	36.0-43.7	N/A		
Phosphoric Acid	7664-38-2	2.12-2.58	N/A		
Manganese Sulfate Monohydrate	10034-96-5	0.59-0.71	N/A		
Magnesium Sulfate Heptahydrate	10034-99-8	0.45-0.55	N/A		
Iron Sulfate Heptahydrate	7782-63-0	0.225-0.275	N/A		
Zinc Sulfate Monohydrate	7446-19-7	0.07-0.09	N/A		
Sodium Molybdate Dihydrate	10102-40-6	0.0065-0.0085	N/A		
Disodium Octaborate Tetrahydrate	12280-03-4	0.09-0.11	N/A		
EDTA	2001-94-7	0-39	N/A		
Humic Acid	308066-67-3	1.10-1.38	N/A		
Yeast Extract (Containing Alpha-Keto Acids)	Mixture	0.057-0.069	N/A		

Section 4: First-Aid Measures

Description of first aid measures

Inhalation: Move victim to fresh air. If person is NOT Breathing Call 911, perform artificial respiration if necessary. Call Physician if symptoms persist.

Skin: Wash with soap and water for a minimum of 20 minutes, remove contaminated clothing. Seek medical attention if irritation develops and persists.

Eye: Flush eyes with running water for 15-20 minutes. Make certain the water rinses the eye periodically lifting the lower and upper eye lids for thorough rinsing. Get medical attention if irritation persists.

Ingestion: Call a physician. Have person sip a glass of water. Do Not Induce Vomiting unless instructed by a physician. Contact physician if person is unconscious; do not give anything by mouth.

Most important symptoms and effects. Both acute and delayed

Upset stomach, vomiting

Indication of any immediate medical attention and special treatment needed

Notes to Physician

Section 5: Fire-Fighting Measures

Extinguishing media

Suitable Extinguishing Media - Water

Unsuitable Extinguishing Media – N/A

Special hazards arising from the substance or mixture

Unusual fire and Exploitation – N/A

Hazards – N/A

Hazardous Combustion Products – If this product is heated to an anhydrous state it will omit Sulfur Dioxide and Ammonia vapors which is hazardous if inhaled.

Advice for firefighters:

KeyPlex Jumpstart is not a flammable liquid and is very water soluble. In case of fire, use sufficient water to dilute the product to avoid production of sulfur dioxide and ammonia vapors.

Section 6: Accidental Release Measures

Personal precautions, protective equipment and emergency procedures

Personal Precautions: Always wear acid resistant protective clothing when handling this product, always wear gloves and eye protection, and handle in well ventilated area. Wear respiratory equipment.

Emergency Procedures:

Environmental precautions:

Take all spill control measures necessary to avoid contamination of ground water and storm runoff drains.

Methods and material for containment and cleaning up

Wear acid resistant, protective clothing, respiratory equipment and eye protection. Isolate the spill area and restrict access to non-essential personnel. Stop the flow of the material at the source.

Spill on Non-Absorbent Surfaces; use Dry absorbent material such as Towels or Diatomaceous Earth. Use sufficient quantity to fully contain and absorb the spilt liquid. Collect the contaminated material and place in a secure ventilated vessel. Dispose of in compliance to local laws and regulations.

Spill on Soil; remove the contaminated soil to a depth where no residue is present, place contaminated soil in a secure ventilated vessel and dispose of in compliance to local laws and regulations.

Section 7: Handling and Storage

Precautions for safe handling

Handling: Always wear acid resistant protective clothing, gloves and eye protection before you handle the material.

Conditions for safe storage, including any incompatibilities

Use a jar compatibility test with unfamiliar mixtures and micro and/or secondary nutrient containing products.

Section 8: Exposure Controls / Personal Protection

Control parameters: Store in a well ventilated and secure storage facility. Ventilation system should be corrosive resistant. The product should be stored at ambient temperature. The product should not be stored at temperatures below 5 degrees centigrade or above 50 degrees centigrade. Keep out of direct sunlight.

Incompatible Materials or Ignition Sources

The product should not come into contact with Methomyl (S-methyl-N-[(methycarbamoyl)oxy] thioacetimidate. Will cause evolution of Hydrogen Sulfide. Avoid mixtures containing calcium products.

Exposure Limits / Guidelines						
	Result	ACGIH	Canada Ontario	Canada Quebec	China	NIOSH
Exposure Limits/Guidelines (Con't.)						
	Result	OSHA				

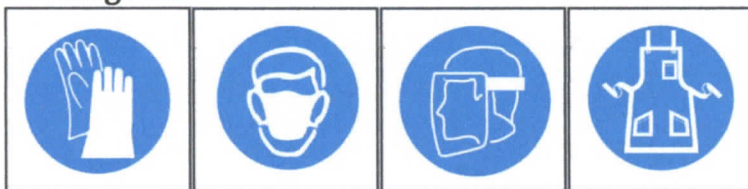
Exposure Controls

Engineering: Use Corrosion Resistant Ventilation System in Storage facility, and equipment used in handling this product.

Measures/Controls

Personal Protective Equipment

Pictograms



Respiratory

Handle this product wearing a facemask or in a well ventilated area.

Eye/Face

Handle this product wearing eye protection glasses, goggles or a face shield.

Hands

When handling this product wear appropriate work gloves.

Skin/Body

When handle this product wear long sleeve shirt and pants.

General Industrial Hygiene

When handling chemicals, follow all local and federal regulations.

Considerations

Environmental Exposure

Controls

Key to abbreviations

ACGIH= American Conference of Governmental Industrial Hygiene

NIOSH= National Institute of Occupational Safety and Health

OSHA= Occupational Safety and Health Administration

MSHA= Mine Safety and Health Administration

TWA= Time-Weighted Averages are based on 8d/day exposures

STEL= Short Term Exposure Limits are based on 15-minute exposures

STEV = Short Term Exposure Value

Section 9: Physical and Chemical Properties

Information on Physical and Chemical Properties

Material Description			
Physical Form	Liquid	Appearance/Description	Dark Opaque with sweet smell
Color	Dark Opaque		
Taste	N/A		
Particular Size			
Odor Threshold	Data lacking	Physical and Chemical Properties	Data lacking
General Properties			
Boiling Point	N/A	Melting Point	N/A
Decomposition Temperature	N/A	Heat of Decomposition	N/A
pH	6.6-7.0	Specific Gravity/Relative Density	1.25-1.29
Density	10.4-10.8 lbs/gal	Bulk Density	N/A
Water Solubility	Soluble	Solvent Solubility	N/A
Viscosity	N/A	Explosive Properties	Classification criteria not met
Oxidizing Properties:	N/A		
Volatility			
Vapor Pressure	N/A	Vapor Density	N/A

Evaporation Rate	N/A		
VOC (Vol.)	N/A	Volatiles (Wt.)	N/A
Volatiles (Vol.)	N/A		
Flammability			
Flash Point	N/A	UEL	N/A
LEL	N/A	Auto ignition	N/A
Self-Accelerating Decomposition Temperature (SADT)	N/A	Heat of Combustion	N/A
Burning Time	N/A	Flame Duration	N/A
Flame Height	N/A	Flame Extension	N/A
Ignition Distance	N/A	Flammability (solid, gas)	N/A
Environmental			
Half-Life	N/A	Octano/Water Partition Coefficient	N/A
Coefficient of water/oil distribution	N/A	Bioaccumulation Factor	N/A
Bioconcentration Factor	N/A	Biochemical Oxygen Demand BOD/BOD ₅	N/A
Chemical Oxygen Demand	N/A	Persistence	N/A
Degradation	N/A		

Section 10: Stability and Reactivity

Reactivity: Yes

Chemical Stability: Stable

Possibility of hazardous reactions

Conditions to avoid: Avoid mixing with Methomyl (S-methyl-N-[(methycarbamoyl)oxy]thioacetimidate. Avoid mixing with other products containing Calcium. Use a jar compatibility test with unfamiliar mixtures and micro and/or secondary nutrient containing products.

Incompatible materials: Avoid mixing with Methomyl (S-methyl-N-[(methycarbamoyl)oxy]thioacetimidate. Avoid mixing with other products containing Calcium. Use a jar compatibility test with unfamiliar mixtures and micro and/or secondary nutrient containing products.

Hazardous decomposition products: SO₂ Vapors and Ammonia at high temperatures.

Section 11: Toxicological Information

Information on toxicological effects

Component Name	CAS	Data
		Acute Toxicity: N/A Irritation: N/A Reproductive: N/A

GHS Properties	OSHA HCS 2012 • Classification criteria not met
Acute toxicity	
Aspiration Hazard	
Carcinogenicity	
Germ Cell Mutagenicity	
Respiratory sensitization	
Serious eye damage/Irritation	
Skin corrosion/Irritation	
Skin sensitization	
STOT-RE	
STOT-SE	
Toxicity for Reproduction	

Target Organs

Route(s) of entry/exposure

Acute (Immediate)

Chronic (Delayed)

Skin

Acute (immediate): Possible redness and localized irritation.

Chronic (Delayed)

Eye

Acute (Immediate): Burning sensation, Redness
Chronic (Delayed)

Ingestion

Acute (Immediate): Nausea, Vomiting
Chronic (Delayed)

Section 12: Ecological Information

Toxicity: Not toxic to bees.

Persistence and degradability

Bioaccumulative potential

Mobility in Soil: Mobile in soil

Other adverse effects

Other Information

Section 13: Disposal Considerations

Waste treatment methods

Product waste: Dispose of the following by Local and Federal laws.

Packaging waste: Rinse with water, Recycle if possible. Follow Local and Federal laws and regulations.

Section 14: Regulatory Information

Safety, health and environmental regulations/legislation specific for the substance or mixture

SARA Hazard Classifications • Acute, Fire

State Right To Know				
Component	CAS	MA	NJ	PA

Inventory				
Component	CAS	Canada DSL	Canada NDSL	TSCA

Section 15: Other Information

Last Revision Date

Preparation Date

Disclaimer/Statement of Liability:

Seller warrants that the product conforms to its chemical description and is reasonably fit for the purpose stated on the label when used in accordance with the directions under normal conditions of use, but neither this warranty nor any other warranty of merchantability of fitness of a particular product expressed or implied extends to the use of this product contrary to label instructions or under abnormal conditions not reasonably foreseeable by the seller, and buyer assumes the risk of any such use.