

Product Name: Potato Starter
Product ID # 481

Section I MANUFACTURER'S INFORMATION

Manufacturer's Name And Address

NAP Chemical	Emergency Telephone Number:	509-547-8234
821 S. Chestnut	Number for Information:	509-547-8234
Pasco, Wa. 99301	Date Prepared:	January 10, 1992

Section II HAZARDOUS INGREDIENTS

MATERIAL COMPONENT	% EXPOSURE LIMITS IN AIR		HAZARD DATA
	ACGIH TLV	OSHA PEL	
Zinc sulfate* (CAS No. 7733-02-0)	5.2	N/A	Health
Ferrous sulfate (CAS No. 7720-78-7)	0.5	1 mg/m3 1 (TWA)	Health
Maganese sulfate* (CAS No. 7785-87-7)	1.0	5 mg/m3 2 (c)	Health
Copper sulfate (CAS No. 7758-99-8)	2.0	1mg/m3 1mg/m3	Health

* Toxic chemical subject to the reporting requirements of Section 313 of Title III of the Superfund Amendments and re authorization Act of 1986 and 40 CFR Part 372.

	(1) As Fe	(2) As Mn	(3) Ceiling
Caustic Mixture	N.D.	N.D.	N/A

PRODUCT INFORMATION

Chemical Name: Plant Nutritional Activator
 Chemical Family: Carboxyl/Phenolic Acids & Amino Acids
 Formula: Property Organic Formulation
 NFPA/HMIS: Health-2 Fire-0 Reactivity-0

Section III PHYSICAL DATA

BOILING POINT , 760 MM HG	100 °	MELTING POINT	N/A
SPECIFIC GRAVITY (H2O=1)	1.210	VAPOR PRESSURE	Not known
VAPOR DENSITY (AIR=1)	Not known	SOLUBILITY IN H2O, %BY WT.	
		APPROX	98%
% VOLATILES BY AND ODOR	Not known	EVAPORATION RATE (BUTYL ACETATE=1)	Not known
APPEARANCE AND ODOR		Dark Brown Liquid	

Section IV FIRE AND EXPLOSION DATA

FLASH POINT (TEST METHOD) N/A	AUTO IGNITION TEMPERATURE	N/A
FLAMMABLE LIMITS IN AIR, % BY VOL.:	LOWER N/A	UPPER N/A
EXTINGUISHING MEDIA	N/A	
SPECIAL FIRE FIGHTING PROCEDURES	N/A	
UNUSUAL FIRE AND EXPLOSION HAZARD	N/A	

Section V HEALTH AND HAZARD INFORMATION

SYMPTOMS OF OVEREXPOSURE

INHALATION : May cause respiratory tract irritation, nausea, vomiting , weakness, fever, chills and loss of appetite. Chronic exposure may cause pneumonia, liver damage, and neurologic damage.

SKIN CONTACT: May cause skin irritation.

SKIN ABSORPTION: None Known .

EYE CONTACT: May cause eye irritation .

INGESTION: Ingestion may result in nausea, vomiting, diarrhea, blood in vomitus and stools, burning pain in mouth and throat, abdominal pain, lethargy, confusion, edema, leukocytosis, hyperglycemia, acidosis, shock, liver and kidney damage, and other gastrointestinal and

neurologic symptoms and damage. Ingestion by a child of more than 60 ml. (2 ounces) or by an adult of more than 150 ml. (5 ounces) may be fatal.

EMERGENCY AND FIRST AID PROCEDURES

EYES: Immediately flush with water for 15 minutes, lifting eyelids to flush thoroughly.

SKIN : Wash thoroughly with water.

INHALATION : Remove to fresh air. If breathing is difficult, contact a physician.

INGESTION: Drink large quantities of water or milk. Follow with milk of magnesia, beaten eggs or vegetable oil. Do not induce vomiting. Contact a physician.

SUSPECTED CANCER AGENT?

___ **NO:** This product's ingredients are not found in the list below.

___ **YES:** ___ Federal OSHA ___ NTP ___ IARC ___ Cal/ OSHA

MEDICAL CONDITIONS AGGRAVATED BY EXPOSURE: Hemochromatosis.

NOTES TO A PHYSICIAN: Contains citric acid (6.8 %) ; pH 1.7. Ingestion of more than 0.5 ml of product per kg body weight may result in iron toxicity.

Section VI REACTIVITY DATA

STABILITY ___ Stable ___ Unstable

INCOMPATIBILITY (Material to avoid) Avoid contact with strong alkaline materials such as caustic potash (sodium hydroxide) . Mildly corrosive to common metals.

HAZARDOUS DECOMPOSITION/COMBUSTION PRODUCTS Oxides of sulfur and zinc.

HAZARDOUS POLYMERIZATION N/A

Section VII SPILL, LEAK AND DISPOSAL PROCEDURES

STEPS TO BE TAKEN IF MATERIAL IS RELEASED OR SPILLED: Neutralize with dilute alkaline solution and wash down sewer if federal , state, and local regulations permit.

NEUTRALIZING CHEMICALS: Baking soda (sodium bicarbonate), soda, ash or lime.

WASTE DISPOSAL METHOD: Follow all applicable federal, state and local regulations.

Section VIII

VENTILATION REQUIREMENTS: Use general or local exhaust ventilation to meet TLV requirements.

SPECIFIC PERSONAL PROTECTIVE EQUIPMENT:

RESPIRATORY: None required where appropriate ventilation conditions exist.

If the TLV is exceeded, a self-contained breathing apparatus is advised.

EYE: Safety goggles.

GLOVES: Acid-resistant gloves such as rubber or neoprene.

OTHER CLOTHING AND EQUIPMENT: Coats, coveralls or aprons are recommended.

Section IX SPECIAL PRECAUTIONS

PRECAUTIONARY STATEMENTS: Avoid contact with skin, eyes or clothing. Do not ingest. Avoid inhalation of mists.

OTHER HANDLING AND STORAGE REQUIREMENTS: Keep lid tightly closed. Store in a dry area, above freezing and below 105° F, out of direct sunlight and away from strong alkalis. Keep out of reach of children.

PREPARED BY: DAVID W. BERGEVIN

ADDRESS: NAP CHEMICAL
821 S. CHESTNUT

PASCO, WA. 99301

DATE: March 10, 2004

All information, recommendations and suggestions appearing herein concerning our products are based upon tests and data believed to be reliable. However, it is the user's responsibility to determine the safety, toxicity and suitability for his/her own use of the product described herein. Since the actual use by others is beyond our control, we make no guarantee, expressed or implied, as to the effects of such use, the results to be obtained, or the safety and toxicity of the product; nor do we assume any liability arising out of use, by others, of the product referred to herein. The information herein is not to be construed as absolutely complete since additional information may be necessary or desirable when particular or exceptional conditions or circumstances exist or because of applicable laws or government regulations.