# **MATERIAL SAFETY DATA SHEET**

#### 1. CHEMICAL PRODUCT AND CONTACT INFORMATION

Product Name: AlphaSolve II

AR2174, AR2176

Alpha Resources, Inc. P.O. Box 199

Stevensville, MI 49127 Phone: 269-465-5559

# 2. COMPOSITION/INFORMATION ON INGREDIENTS

			OSHA	ACGIH
CAS NO.	%W	CHEMICAL NAMES	PEL (mg/m3)	TLV (mg/m3)
1310-73-2.	>50	Sodium Hydroxide	2	N/A
1318-00-9	<50	Coated on Silicate	N/A	N/A

# 3. HAZARD IDENTIFICATION

POTENTIAL HEALTH EFFECTS

EYES: Causes severe eye burns.

SKIN: Causes skin burns. May cause deep penetrating ulcers of the skin.

INHALATION: Irritation may lead to chemical pneumonitis and pulmonary edema. Causes severe irritation of upper respiratory tract with coughing, burns, breathing difficulty and possible coma. INGESTION: Harmful if swallowed. Causes gastrointestinal tract burns. Causes severe pain, nausea, vomiting, diarrhea and shock.

CHRONIC OVEREXPOSURE: Prolonged or repeated skin contact me cause dermatitis. .

ACUTE OVEREXPOSURE: May lead to dermatitis externally or diarrhea internally.

CARCINOGENICITY: Not listed by ACGIH, IARC, NIOSH, NTP or OSHA.

#### 4. FIRST AID MEASURES

EYES: Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower lids. . Seek medical attention immediately.

INHALATION: Removed to fresh air immediately. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Seek medical attention immediately.

SKIN: Immediately flush skin with plenty of soap and water for at least 15 minutes while removing contaminated clothing and shoes. Discard contaminated clothing in a manner while limits further exposure. Seek medical attention immediately.

INGESTION: Do NOT induce vomiting. If victim is conscious and alert, give 2-4 cupfuls of mile or water. Never give anything by mouth to an unconscious person. Get medical aid immediately.

#### 5. FIRE FIGHTING MEASURES

FLAMMABLE PROPERTIES

Non-flammable

Flash Point: Not available

Flammable Limits: (% by Volume in Air): Lower: None Upper: None

**AUTO-IGNITION TERMERATURE: N/A** 

HAZARDOUS COMBUSTION PRODUCTS: Smoke/fumes.

EXTINGUISHING MEDIA: For small fires, use dry chemical, carbon dioxide or alcohol resistant

foam.

FIREFIGHTING INSTRUCTIONS: Wear appropriate protective clothing to prevent contact with skin and eyes. Wear a self-contained breathing apparatus. May cause fire or combustion with decomposition products. Use water with caution and in flooding amounts. Contact with moisture or water may generate sufficient heat to ignite nearby combustible materials.

# **6. ACCIDENTAL RELEASE MEARURES**

SMALL/LARGE SPILL: Vacuum or sweet up material and place into a suitable dry disposal container, or use a caustic spill kit.

# 7. HANDLING AND STORAGE

HANDLING: Wash thoroughly after handling. Use with adequate ventilation. Do not allow water to get into the container because of the potential for a violent reaction. Do not get in eyes, on skin or on clothing. Do not ingest or inhale.

STORAGE: Keep container closed. Store in a cool, dry well-ventilated area way from strong acids, water, metals, flammable liquids, and organic halogens.

#### 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

ENGINEERING CONTROLS: use adequate general or local ventilation. .

RESPIRATORY PROTECTION: A NIOSH/MSHA approved air purifying dust or mist respirator. SKIN AND HAND PROTECTION: Impervious gloves; coveralls and chemically resistant shoes.

EYE AND FACE PROTECTION: Safety glasses, chemical goggles or face shield. OTHER PROTECTIVE EQUIPMENT: Showers ands eyewash should be accessible.

# 9. PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE: Lt. green solid BOILING POINT: 2530 F (1388 C)

FREEZE-MELT POINT: 1832 F (10000 C)

VAPOR PRESSURE: N/A VAPOR DENSITY: N/A

SOLUBILITY IN WATER: Completely soluble

SPECIFIC GRAVITY: 2.13

ODOR: None

PERCENT VOLATILES: N/A EVAORATION RATE: N/A

# 10. STABILITY AND REACTIVITY

CHEMICAL STABILITY: Stable.

INCOMPATIBILITY: Generates large amounts of heat when in contact with water and may steam and splatter. Reacts with mineral acids to form corresponding salts; reacts with weak acid gases like hydrogen sulfide, sulfur dioxide and carbon dioxide; ignites when in contact with cinnamaldehyde or zinc; and reacts explosively with a mixture of chloroform and methane. Corrosive to metals such as aluminum, tin and zinc as well as alloys suck as steel and may cause formation of flammable hydrogen gas.

HAZARDOUS DECOMPOSITION PRODUCTS: Toxic fumes of sodium oxide, sodium peroxide fumes.

HAZARDOUS POLYMERIZATION: Not known to polymerize.

#### 11. TOXICOLOGICAL INFORMATION

None reported.

#### 12. ECOLOGICAL INFORMATION

TLm, mosquito fish, 125 ppm/96hr, (fresh water; TLm, bluegill, 99/mg/48hr (tap water). This chemical is not mobile in solid form, although it absorbs moisture very easily. Once liquid, sodium hydroxide leaches rapidly into the soil, possibly contamination water sources.

# 13. DISPOSAL CONSIDERATION

Dispose of in accordance with federal, state and local regulations.

#### 14. TRANSPORTATION INFORMATION

USA DOT: Sodium Hydroxide, Solid, (Corrosive), UN1823, PGII, IMDG page No. 87

Marine Pollutant: NO

# 15. REGULATORY INFORMATION

US FEDERAL REGULATIONS

TSCA STATUS: On toxic Substance Control Inventory

CERCLA Reportable Quantity: 1000 pounds

RCRA Status: Not regulated

SARA TITLE III:

Section 302 Extremely Hazardous Substances: None Section 311/312 Hazardous Categories: Acute, Reactive

Section 313 Toxic Chemicals: None

Sodium Hydroxide is listed as a Hazardous Substance under the Clean Water Act.

**CANADAIN REGULATIONS** 

WHMIS: E

# **16. OTHER INFORMATION**

Hazard Index : (0 - 4, 4 = Extreme) (NFPA)

Health: 3 Fire: 0 Reactivity: 1

#### SUPPLEMENTAL INFORMATION

The data and information as stated was furnished by the manufacturer/vendor &/or supplier of this product. Alpha Resources, Inc. cannot warrant the accuracy of this information and shall not be responsible or liable for any damage that may result, should any of the information be erroneous.

Date Prepared: February 1, 2006

Prepared by: Scot Burns