



Vapourproofing Concrete. Strengthening Foundations.

## **MOXIE SHIELD 2000 CONCRETE PATCH SAFETY DATA SHEET**

### **1. IDENTIFICATION**

**Product Name:** Moxie Shield 2000 Concrete Patch – Part A

**Product Description:** Two component, polymer modified, repair mortar - Cementitious Material - Part A

**Manufacturer:** Moxie International, Inc.

3201 Swetzer Road

Loomis, CA 95650 USA

**Website:** [www.moxieshield.com](http://www.moxieshield.com)

**Telephone:** 888-550-7998

### **2. HAZARDS IDENTIFICATION**



Product contains materials known to the state of California to cause cancer, birth defects, or other reproductive toxicity.

Route(s) of Entry during normal usage: Inhalation? – YES    Skin? – YES    Ingestion? – NO

#### **Health Hazards:**

- **Hazard Rating (NFPA 704 criteria):** Health: 3, Fire: 0, Reactivity: 0
- **HMIS Rating:** Health: 3, Fire: 0, Reactivity: 0
- **Eye Contact:** Contact can cause irritation to the eyes.
- **Skin Contact:** Contact can cause irritation to the skin to persons sensitive to dust and high pH.
- **Inhalation:** Inhalation can cause irritation to the nose and throat to persons sensitive to dust and high pH.
- **Ingestion:** May cause irritation to the mouth, esophagus, and stomach.
- **Chronic Hazards:** Repeated, long term inhalation of dust may result in silicosis.

#### **Carcinogenicity:**

NTP – YES    IARC Monographs? – NO    OSHA Regulated? – NO    Crystalline Silica - NTP Rating 1

**Signs and Symptoms of Exposure:** Dry skin, dermatitis, dry cough, irritated from dust in dry state or other potential adverse conditions related to exposure to a wet portland cement-based material.

**Medical Conditions Generally Aggravated by Exposure:** Allergies, respiratory, skin, increased product sensitivity.

### **3. PRODUCT COMPOSITION**

<u>Chemical and Common Name</u>	<u>CAS Registry</u>	<u>Number Wt. %</u>	<u>OSHA PEL</u>	<u>ACGIH TLV</u>
Silicic Sand, Crystalline Quartz	14808-60-7	60-65%	10mg/m3	0.1mg/m3
Hydraulic Cement	65997-15-1	35-40%	15mg/m3	10mg/m3

**4. FIRST AID MEASURES**

- **Eye:** In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. If irritation occurs seek medical attention.
- **Skin:** In case of contact, immediately flush skin with plenty of water.
- **Inhalation:** Remove to fresh air. If breathing is difficult after inhalation, give oxygen. If respiratory issues continue, seek medical attention.
- **Ingestion:** If swallowed, DO NOT induce vomiting. If victim is fully conscious, give a cupful of water. Seek medical attention immediately.

**5. FIRE FIGHTING MEASURES**

- **Flammable Limits:** This material is noncombustible.
- **Extinguishing Media:** This material is compatible with all extinguishing media.
- **Hazards to Firefighters:** See Section 2 for information on hazards when this material is present in the area of a fire.
- **Firefighting Equipment:** The following protective equipment for firefighters is recommended when this material is present in the area of a fire: chemical goggles, body-covering protective clothing, chemical resistant gloves, and rubber boots.

**6. ACCIDENTAL MEASURES**

- **Personal Protection:** Wear chemical goggles, body-covering protective clothing, chemical resistant gloves, and rubber boots. See Section 8.
- **Environmental Hazards:** Sinks and mixes with water. Prevent runoff from entering storm sewers and ditches which lead to natural waterways. Only water will evaporate from a spill of this material.
- **Spill Cleanup:** Keep unnecessary people away; isolate hazard area and deny entry. Contain by diking with an approved, inert, absorbent material. Dispose in an approved waste container. Wet material may be allowed to cure and be properly disposed of according to local regulations.
- **CERCLA RQ:** There is no CERCLA Reportable Quantity for this material. If a spill goes off-site, notification of state and local authorities is recommended.

**7. HANDLING AND STORAGE**

- **Handling:** Avoid contact with eyes, skin and clothing. Avoid breathing in product. Keep container closed. Promptly clean residue from closures with cloth dampened with water.
- **Storage:** Keep containers closed. Store in a manner to prevent dust and airborne particulates. Storage temperature 0-95°C.

**8. EXPOSURE CONTROL/PERSONAL PROTECTION**

- **Engineering Controls:** Use with adequate ventilation. Keep containers closed. Safety shower and eyewash fountain should be within direct access. Maintain a clean environment with any spills removed.
- **Respiratory Protection:** Use a NIOSH-approved dust respirator in the absence of proper environmental control. Observe OSHA regulations for respirator use (29 CFR 1910.134).
- **Skin Protection:** Wear body-covering protective clothing and protective gloves.
- **Eye Protection:** Safety glasses, goggles or face shield.

**9. PHYSICAL AND CHEMICAL PROPERTIES**

- **Appearance and Odor:** Grey powder, general cement odor.
- **Melting Point:** N/A.
- **Evaporation Rate:** N/A.
- **pH:** Approximately 11.0 – 13.0.
- **Specific Gravity:** 2.00 – 2.30 g/cm<sup>3</sup> (20°C).
- **Solubility in Water:** Soluble.
- **V.O.C's (g/L):** 0.
- **Boiling Point:** N/D.
- **Vapor Pressure (mmHg):** N/D.
- **Vapor Density:** N/D.

**10. STABILITY AND REACTIVITY**

- **Stability:** This material is stable under all conditions of use and storage.
- **Conditions to Avoid:** None.
- **Materials to Avoid:** Product is alkaline; avoid contact with acids and ammonia gas. Flammable hydrogen gas may be produced on contact with aluminum, tin, lead, and zinc.
- **Hazardous Decomposition Products:** Carbon monoxide and dioxide, oxides of nitrogen, and other unidentified organic compounds.

**11. TOXICOLOGICAL INFORMATION**

- No applicable information available.

**12. ECOLOGICAL INFORMATION**

- No applicable information available.

**13. DISPOSAL CONSIDERATIONS**

- **Waste Disposal Method:** Dispose in accordance with all federal, state and local environmental regulations and procedures. Follow safe handling recommendations described in Section 7. Do not dump into any sewers, on the ground or into any body of water. Waste characterizations and compliance with applicable laws are the responsibility solely of the waste generator.

**14. TRANSPORT INFORMATION**

- Ground - USA and Puerto Rico (DOT): Not Regulated.
- Ground - Canada (TDG): Not Regulated.
- HS Tariff Class: 2839.19.
- Schedule B No.: 283919.
- Sea (IMDG): Not Regulated.
- Air (IATA): Not Regulated.

**15. REGULATORY INFORMATION**

- **Additional:** Follow all applicable regulatory requirements.

**16. OTHER INFORMATION**

- **Other:** No other information available.

### **1. IDENTIFICATION**

**Product Name:** Moxie Shield 2000 Concrete Patch – Part B

**Product Description:** Two component, polymer modified, repair mortar - Cementitious Material - Part B

**Manufacturer:** Moxie International, Inc.

3201 Swetzer Road

Loomis, CA 95650 USA

**Website:** [www.moxieshield.com](http://www.moxieshield.com)

**Telephone:** 888-550-7998

### **2. HAZARDS IDENTIFICATION**



This mixture is not hazardous under the Federal OSHA Hazard Communication Standard 29CFR 1910.1200.

Route(s) of Entry during normal usage: Inhalation? - YES      Skin? - YES      Ingestion? – NO

#### **Health Hazards:**

- **Hazard Rating (NFPA 704 criteria):** Health: 1, Fire: 0, Reactivity: 0
- **HMIS Rating:** Health: 1, Fire: 0, Reactivity: 0
- **Eye Contact:** Contact can cause irritation to the eyes.
- **Skin Contact:** Contact can cause irritation to the skin.
- **Inhalation:** Inhalation can cause irritation to the nose and throat.
- **Ingestion:** May cause irritation to the mouth, esophagus, and stomach.
- **Chronic Hazards:** None known.

#### **Carcinogenicity:**

NTP – NO    IARC Monographs? – NO    OSHA Regulated? – NO    Crystalline Silica - NTP Rating 1

**Signs and Symptoms of Exposure:** Nausea, vomiting, nose and throat irritation, eye irritation, skin irritation.

**Medical Conditions Generally Aggravated by Exposure:** Allergies, respiratory, skin, increased product sensitivity.

### **3. PRODUCT COMPOSITION**

<u>Chemical and Common Name</u>	<u>CAS Registry</u>	<u>Number Wt. %</u>	<u>OSHA PEL</u>	<u>ACGIH TLV</u>
Water	7732-18-5	N/A	N/A	N/A
Styrene-butadiene based polymer proprietary formulation	009003-55-8	N/A	N/A	N/A

### **4. FIRST AID MEASURES**

- **Eye:** In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. If irritation occurs seek medical attention.
- **Skin:** In case of contact, immediately flush skin with plenty of water.
- **Inhalation:** Remove to fresh air. If breathing is difficult after inhalation, give oxygen. If respiratory issues continue, seek medical attention.
- **Ingestion:** If swallowed, DO NOT induce vomiting. If victim is fully conscious, give a cupful of water. Seek medical attention immediately.

### **5. FIRE FIGHTING MEASURES**

- **Flammable Limits:** This material is noncombustible. No flash point method used.
- **Extinguishing Media:** None required, non-combustible. In areas where product is stored, can use water, dry-chemical, CO<sub>2</sub>, foam.
- **Hazards to Firefighters:** See Section 2 for information on hazards when this material is present in the area of a fire.
- **Firefighting Equipment:** The following protective equipment for firefighters is recommended when this material is present in the area of a fire: chemical goggles, body-covering protective clothing, chemical resistant gloves, and rubber boots.

**6. ACCIDENTAL MEASURES**

- **Personal Protection:** Wear chemical goggles, body-covering protective clothing, chemical resistant gloves, and rubber boots. See Section 8.
- **Environmental Hazards:** Sinks and mixes with water. Prevent runoff from entering storm sewers and ditches which lead to natural waterways. Only water will evaporate from a spill of this material.
- **Spill Cleanup:** Contain by diking with an approved, inert, absorbent material. Dispose in an approved waste container. Wet material may be allowed to cure and properly disposed of according to local regulations.
- **CERCLA RQ:** There is no CERCLA Reportable Quantity for this material. If a spill goes off-site, notification of state and local authorities is recommended.

**7. HANDLING AND STORAGE**

- **Handling:** Avoid prolonged contact with eyes, skin and clothing. Use adequate ventilation. Avoid breathing in product. Keep container closed.
- **Storage:** Keep containers closed when not in use. Storage temperature between 65°-95°F out of the sun.

**8. EXPOSURE CONTROL/PERSONAL PROTECTION**

- **Engineering Controls:** Use with adequate ventilation. Keep containers closed. Safety shower and eyewash fountain should be within direct access. Maintain a clean environment with any spills removed.
- **Respiratory Protection:** If workplace limit of product is exceeded, use a NIOSH-approved dust respirator in the absence of proper environmental control. Observe OSHA regulations for respirator use (29 CFR 1910.134).
- **Skin Protection:** Wear body-covering protective clothing and protective gloves.
- **Eye Protection:** Safety glasses, goggles or face shield.

**9. PHYSICAL AND CHEMICAL PROPERTIES**

- **Appearance and Odor:** White liquid dispersion, slight latex odor.
- **Melting Point:** 0°C.
- **Evaporation Rate:** N/A.
- **pH:** Approximately 9.5 – 11.0.
- **Specific Gravity:** 0.95 – 1.10 g/cm<sup>3</sup> (20°C).
- **Solubility in Water:** Soluble.
- **V.O.C's (g/L):** 0.
- **Boiling Point:** >212°F (>100°C).
- **Vapor Pressure (mmHg):** 17.5 mmHg @ 20°C.
- **Vapor Density:** 0.6.

**10. STABILITY AND REACTIVITY**

- **Stability:** This material is stable under all conditions of use and storage.
- **Conditions to Avoid:** Can coagulate if frozen. Dry resin is combustible.
- **Materials to Avoid:** Strong oxidizing agents, avoid contact with acids or concentrated bases; may cause coagulation.
- **Hazardous Decomposition Products:** Carbon monoxide and dioxide, oxides of nitrogen, and other unidentified organic compounds.

**11. TOXICOLOGICAL INFORMATION**

- **Ingestion:** Very low toxicity if swallowed. Harmful effects not anticipated from swallowing small amounts. LD50, rat > 5,000 mg/kg; Methanol Inhalation: LC50, 4 h, Vapor, rat 83.8 mg/l.

**12. ECOLOGICAL INFORMATION**

- **Toxicity:** For similar material(s): Material is practically non-toxic to aquatic organisms on an acute basis (LC50/EC50/EL50/LL50 > 100 mg/L in the most sensitive species tested).
- **Degradability:** The polymeric component is not expected to biodegrade.

**13. DISPOSAL CONSIDERATIONS**

- **Waste Disposal Method:** Dispose in accordance with all federal, state and local environmental regulations and procedures. Follow safe handling recommendations described in Section 7. Do not dump into any sewers, on the ground or into any body of water. Waste characterizations and compliance with applicable laws are the responsibility solely of the waste generator.

**14. TRANSPORT INFORMATION**

- Ground - USA and Puerto Rico (DOT): Not Regulated.
- Ground - Canada (TDG): Not Regulated.
- HS Tariff Class: 2839.19.
- Schedule B No.: 283919.
- Sea (IMDG): Not Regulated.
- Air (IATA): Not Regulated.

**15. REGULATORY INFORMATION**

- Additional: Follow all applicable regulatory requirements.

**16. OTHER INFORMATION**

- Other: No other information available.