# SAFETY DATA SHEET (SDS)

## Section 1 – Identification

**Product Identifier:** Structalath, Twin Trac 2.5, Mega Lath, V-Truss Walls & Ceilings, V-Truss Corner, Structa Corner  
**Product Use:** For stucco reinforcing / lathing applications  
**Manufacturer:** Structa Wire Corp.  
1395 North Grandview Hwy.  
Vancouver, BC V5N 1N2  
**Telephone:** (604) 254-9868  
**Fax:** (604) 254-8530  
**www.structawire.com**

## Section 2 – Hazard(s) Identification

<table>
<thead>
<tr>
<th>Hazard Symbol</th>
<th>Signal Word</th>
<th>Hazard Statement(s)</th>
</tr>
</thead>
</table>
| ![Hazard Symbol] | Danger | Suspected of causing cancer.  
Suspected of damaging fertility or the unborn child.  
Causes damage to lungs through prolonged or repeated inhalation exposure.  
Harmful if swallowed.  
May cause an allergic skin reaction.  
May cause respiratory irritation.  
Causes eye irritation. |

**Other Hazards**

This product is present as an alloy. It does not present the same hazards when the individual components are in their powdered forms, or when the material is processed, heated, or welded. The materials present in this product in their powdered forms presents various physical and health hazards. Exposure to dust generated from processing (based upon the individual materials) may be sensitizing, cause organ damage, cause cancer, and irritating. In powdered form the individual ingredients within this material are harmful to the aquatic environment. When processed or where dust is generated a combustible dust hazard may be present. Avoid generating dust. Under normal conditions of use and handling in the wire form harmful quantities are not expected to be released, nor is the wire considered flammable. Much of the information provided in this SDS is for situations of use in which hazardous exposures may occur, such as in welding applications or for metals in powdered form.

**Unknown Acute Toxicity (GHS-US):** Not available

## Section 3 – Composition/Information on Ingredients

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS #</th>
<th>% Composition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Iron</td>
<td>7439-89-6</td>
<td>Balance</td>
</tr>
<tr>
<td>Zinc</td>
<td>7440-66-6</td>
<td>0 - 8.0</td>
</tr>
<tr>
<td>Manganese</td>
<td>7439-96-5</td>
<td>0 - 1.00</td>
</tr>
<tr>
<td>Nickel</td>
<td>7440-02-0</td>
<td>0 - 0.10</td>
</tr>
</tbody>
</table>
### Section 4 – First-aid Measures

**Eye Exposure** - Flush eyes with plenty of water or saline for at least 15 minutes. SEEK MEDICAL ATTENTION.

**Skin Exposure** - Wash skin with soap and water for at least 15 minutes. If irritation develops, SEEK MEDICAL ATTENTION.

**Inhalation** - Move to fresh air. If not breathing, administer artificial respiration. If breathing is difficult, give oxygen. SEEK MEDICAL ATTENTION.

**Ingestion** - Never give fluids or induce vomiting if the victim is unconscious or having convulsions. SEEK MEDICAL ATTENTION.

### Section 5 – Fire-fighting Measures

**Fire Hazard Data:**

- **Flammable Properties**
  - This product does not present fire or explosion hazards as shipped.

- **Fire/Explosion**
  - May be potential hazard under the following conditions:
    - Dust or fines dispersed in the air can be explosive. Even a minor dust cloud can explode violently.
    - Chips, dust or fines in contact with water can generate flammable/explosive hydrogen gas.
    - Hydrogen gas could present an explosion hazard in confined or poorly ventilated spaces.
    - Fines and dust in contact with certain metal oxides (e.g., rust), molten metal in contact with water/moisture or other metal oxides (e.g., rust) and moisture entrapped by molten metal can be explosive.

**Extinguishing Media:**

- Use Class D extinguishing agents on dusts, fines, or molten metal. Use coarse water spray on chips and turnings.

**Special Fire Fighting Procedures:**

- Fire fighters should wear NIOSH approved, positive pressure, self-contained breathing apparatus, and full protective clothing when appropriate. Avoid breathing metal oxide fumes, which may cause metal fume fever.

**Unusual Fire and Explosion Hazards:**

- When heated beyond melting point, metal vapor burns in the air with a bright greenish-yellow flame to produce zinc oxide fumes.

### Section 6 – Accidental Release Measures

**Cleanup and Disposal of Spill:**

- Avoid inhalation, eye, or skin contact of dusts by using appropriate precautions outlined in this MSDS (see section 8). Fine turnings and small chips should be swept or vacuumed and placed into appropriate disposable containers. Keep fine dust or powder away from sources of ignition. Scrap should be reclaimed for recycling. Prevent materials from entering drains, sewers, or waterways. Discard any product, residue, disposable container, or liner in full compliance with federal, state, and local regulations.

### Section 7 – Handling and Storage

- Product should be kept dry. Avoid generating dust. Avoid contact with sharp edges or heated metal.

PACKAGES OF THIS MATERIAL MAY CONTAIN EXTREME INTERNAL STRESSES AND STORED MECHANICAL ENERGY. USE STANDARD INDUSTRY PRACTICES AND/OR CONSULT YOUR COMPANY’S SAFETY DEPARTMENT FOR PROPER PROCEDURES FOR HANDLING, OPENING, AND CUTTING.
Requirements for Processes, Which Generate Dusts or Fumes
If processing of these products includes operations where dust or extremely fine particulate is generated, obtain and follow the safety procedures and equipment guides contained in National Fire Protection Association (NFPA) brochure listed in Section 16. Cover and reseal partially empty containers. Use non-sparking handling equipment. Provide grounding and bonding where necessary to prevent accumulation of static charges during dust handling and transfer operations (See Section 16). Local ventilation and vacuum systems must be designed to handle explosive dusts. Dry vacuums and electrostatic precipitators must not be used. Avoid all ignition sources. Good housekeeping practices must be maintained.

Section 8 – Exposure Controls/Personal Protection

Exposure Controls
Appropriate Engineering Controls: Emergency eye wash fountains and safety showers should be available in the immediate vicinity of any potential exposure to metal dust or fumes from processing. Ensure adequate ventilation, especially in confined areas. Avoid dust production. Avoid creating or spreading dust. Ensure that dust-handling systems (such as exhaust ducts, dust collectors, vessels, and processing equipment) are designed in a manner to prevent the escape of dust into the work area (i.e., there is no leakage from the equipment).
Materials for Protective Clothing: Wear suitable protective clothing.
Hand Protection: Protective Gloves. If material is hot, wear thermally resistant protective gloves.
Eye Protection: Safety glasses.
Skin and Body Protection: Wear suitable protective clothing.
Respiratory Protection: If exposure limits are exceeded or irritation is experienced, approved respiratory protection should be worn.
Environmental Exposure Controls: Do not allow dust, chips or ribbons to be released into the environment.
Consumer Exposure Controls: Do not eat, drink or smoke during use.

Section 9 – Physical and Chemical Properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appearance (physical state, color, etc.)</td>
<td>Metallic Gray, Odorless</td>
</tr>
<tr>
<td>Odor</td>
<td>NA</td>
</tr>
<tr>
<td>Odor Threshold</td>
<td>NA</td>
</tr>
<tr>
<td>pH</td>
<td>NA</td>
</tr>
<tr>
<td>Melting Point</td>
<td>2800°F / 621.37 ºF lead</td>
</tr>
<tr>
<td>Partition Coefficient n-octanol/water:</td>
<td>ND</td>
</tr>
<tr>
<td>Auto-ignition Temperature:</td>
<td>NA</td>
</tr>
<tr>
<td>Decomposition Temperature:</td>
<td>ND</td>
</tr>
<tr>
<td>Viscosity</td>
<td>NA</td>
</tr>
<tr>
<td>Upper/lower Flammability or Explosive Limits:</td>
<td>NA</td>
</tr>
<tr>
<td>Vapor Pressure</td>
<td>NA</td>
</tr>
<tr>
<td>Vapor Density (Air = 1):</td>
<td>NA</td>
</tr>
<tr>
<td>Relative Density</td>
<td>7.85 g/cc Coating: 7.14 g/cc</td>
</tr>
<tr>
<td>Solubility(ies):</td>
<td>Insoluble</td>
</tr>
<tr>
<td>Flash Point</td>
<td>NA</td>
</tr>
<tr>
<td>Evaporation Rate</td>
<td>NA</td>
</tr>
<tr>
<td>Flammability (solid, gas):</td>
<td>Non-flammable, non-combustible</td>
</tr>
<tr>
<td>NA - Not Applicable</td>
<td></td>
</tr>
<tr>
<td>ND - Not Determined for product as a whole</td>
<td></td>
</tr>
</tbody>
</table>

Section 10 – Stability and Reactivity

Stability: Stable under normal conditions of use, storage, and transportation as shipped.
Conditions to Avoid: Steel at temperatures above the melting point may liberate fumes containing oxides of iron and alloying elements. Avoid generation of airborne fume.
Hazardous Polymerization: Will not occur.
## Incompatibility/Materials to Avoid
Reacts with strong acids to form hydrogen gas. Hydrogen peroxide will react violently in contact with lead. (Water reacts violently with molten metals).

**Hazardous Decomposition Products:** Fumes and certain noxious gases, such as CO, may be produced from welding or burning operations. Lead oxide fumes can result if temperatures exceed the melting point for lead, 621.37 ºF.

### Section 11 – Toxicological Information

#### Health Effects of Ingredients

**A: General Product Information**

The primary component of this product is iron. Long-term exposure to iron dusts or fumes can result in a condition called siderosis, which is considered a benign pneumoconiosis. Symptoms may include chronic bronchitis, emphysema, and shortness of breath upon exertion. Penetration of iron particles in the skin or eye may cause an exogenous or ocular siderosis, which may be characterized by a red-brown pigmentation of the affected area. Ingestion overexposure to iron may affect the gastrointestinal, nervous, and hematopoietic system and the liver. Iron and steel founding, but not iron oxide, has been listed as potentially carcinogenic by IARC.

When this product is welded, fumes are generated. Welding fumes may be different in composition from the original welding product, with the chief component being ordinary oxides of the metal being welded. Chronic health effects (including cancer) have been associated with the fumes and dusts of individual component metals (see above), and welding fumes as a general category have been listed by IARC as a carcinogen (Group B). There is also limited evidence that welding fumes may cause adverse reproductive and fetal effects. Evidence is stronger where welding materials contain known reproductive toxins, e.g., lead which may be present in the coating material of this product.

Breathing fumes or dusts of this product may result in metal fume fever, which is an illness produced by inhaling metal oxides. These oxides are produced by heating various metals including manganese, zinc, and iron. Prolonged exposure to manganese dusts or fumes is associated with “manganism,” a Parkinson-like syndrome characterized by a variety of neurological symptoms including muscle spasms, gait disturbances, tremors, and psychoses.

**B: Component Analysis – LD50/LC50**

- **Manganese (7439-96-5)**
  - Oral LD50 Rat: 9gm/kg

#### Carcinogenicity

**A: General Product Information**

No information available for product.

### Section 12 – Ecological Information

#### Ecotoxicity (aquatic & terrestrial)

No Data Available for Galvanized Wire as sold/shipped. However, individual components of the product when processed have been found to be toxic to the environment. Metal dusts may migrate into soil and groundwater and be ingested by wildlife as follows:

- **Iron Oxide**: LC50: >1000 mg/L; Fish 48 h-EC50 > 100 mg/L (Currenta, 2008k); 96 h- LC0 ≥ 50,000 mg/L
  - Test substance: Bayferrox 130 red (95 – 97% Fe2O3; < 4% SiO2 and Al2O3) (Bayer, 1989a)

- **Nickel Oxide**: IUCLID found LC50 in fish, invertebrates and algae > 100 mg/l.

#### Persistence & Degradability

No Data Available for Coated Steel Sheet as sold/shipped or individual components.

#### Bioaccumulative Potential

No Data Available for Coated Steel Sheet as sold/shipped or individual components.

#### Mobility (in soil)

No data available for Coated Steel Sheet as sold/shipped. However, individual components of the product have been found to be absorbed by plants from soil.
Other adverse effects: None Known

**Additional Information:**

<table>
<thead>
<tr>
<th>Hazard Category: Not Reported</th>
<th>Signal Word: No Signal Word</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hazard Symbol: No Symbol</td>
<td>Hazard Statement: No Statement</td>
</tr>
</tbody>
</table>

### Section 13 – Disposal Considerations

**Disposal Instructions**

Reuse or recycle material whenever possible. Material may be disposed of at an industrial landfill.

**US EPA Waste Number & Descriptions**

**A. General Product Information**

RCRA Status: Must be determined at time material is disposed. If material is disposed as waste, it must be characterized under RCRA according to 40 CFR, Part 261, or state equivalent in the U.S.

**B. Component Waste Numbers**

RCRA waste codes other than described under Section A may apply depending on use of product. Refer to 40 CFR 261 or state equivalent in the U.S.

### Section 14 – Transport Information

US Department of Transportation Shipping Name: Not regulated.

### Section 15 – Regulatory Information

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the SDS contains all of the information by CPR.

### Section 16 – Other Information

**Issue Date:** August 10, 2015

**Revision Date:** September 25, 2019

**Disclaimer:** The information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.