OP220 IMPERIAL SUPPLIES LLC PAGE: Requester: DUNLAP FAMILY Rev Dt: 08/12/16 SDS FOR 0712251

Safety Data Sheet

|Revision Date: Apr 01, 2016 |Revision Number: Date of Issue:

Imperial Supplies Part Number: 0712251

SECTION 1: IDENTIFICATION

1.1. Product Identifier

Product Form:

Product Name: HEAT SHRINKABLE - BUTT SPLICE CONNECTORS

CAS No:

Synonyms: Not Available

1.2. Intended Use of the Product

Use of the substance/mixture: Electrical terminals

1.3. Name, Address, and Telephone of the Responsible Party

Company

K.S.TERMINALS INC.

No.8, Zhangbin E.3rd Road

Xianxi Township.Ch.

Phone: 00886-4-7580001 Ext:529 Email: Huichen@ksterminals.com.tw

1.4. Emergency Telephone Number

Emergency number

008864-7580001

SECTION 2: HAZARDS IDENTIFICATION

2.1. Classification of the Substance or Mixture

Classification (GHS-US)

NOT APPLICABLE

2.2. Label Elements

GHS-US Labeling

Hazard Pictograms (GHS-US)

Signal Word (GHS-US)

Hazard Statements (GHS-US)

Precautionary Statements

(GHS-US)

NOT APPLICABLE Not Applicable Not Applicable

2.3. Other Hazards

Other Hazards Not Contributing to the Classification:

2.4. Unknown Acute Toxicity (GHS-US)

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

Substance 3.1.

Name Product identifier Classification (GHS-US)

Full text of H-phrases: See Section 16

3.2. Mixture

Product identifier | 응 Classification (GHS-US) Poly( hexamethyleneadipamide) 32131-17-2

Copper Tin

7440-50-8 7440-31-5

33.4 33.297 33.297 OP220 IMPERIAL SUPPLIES LLC PAGE: Requester: DUNLAP FAMILY Rev Dt: 08/12/16 SDS FOR 0712251

7723-14-0 0.003 Phosphorus 7439-92-1 0.003 Lead

SECTION 4: FIRST AID MEASURES

## 4.1. Description of First Aid Measures

First-aid Measures General:

First-aid Measures After Inhalation: If fumes or combustion products are inhaled remove from contaminated area.

Lay patient down. Keep warm and rested.

Prostheses such as false teeth, which may block airway, should be removed, where possible, prior to initiating first aid procedures.

Apply artificial respiration if not breathing, preferably with a demand valve resuscitator, bag-valve mask device, or pocket mask as trained. Perform CRP if

Transport hospital, or doctor.

First-aid Measures After Skin Contact: If skin or hair contact occurs:

Flush skin and hair with running water (and soap if available).

Seek medical attention in event of irritation.

In case of burns:

Immediately apply cold water to burn either by immersion or wrapping with saturated clean cloth.

DO NOT remove or cut away clothing over burnt areas. DO NOT pull away clothing which has adhered to the skin as this can cause further injury.

DO NOT break blister or remove solidified material.

Quickly cover wound with dressing or clean cloth to help prevent infection and t ease pain.

For large burns, sheets, towels or pillow slips are ideal; leave holes for eyes, nose and mouth.

DO NOT apply ointments, oils, butter, etc. to a burn under any circumstances.

Water may be given in small quantities if the person is conscious.

Alcohol is not to be given under any circumstances.

Reassure.

Treat for shock by keeping the person warm and in a lying position.

Seek medical aid and advise medical personnel in advance of the cause and extent of the injury and the estimate time of arrival of the patient.

For thermal burns:

Decontaminate area around burn.

Consider the use of cold packs and topical antibiotics.

For first-degree burns (affecting top layer of skin)

Hold burned skin under cool (not cold) running water or immerse in cool water until pain subsides.

Use compresses if running water is not available.

Cover with sterile non-adhesive bandage or clean cloth.

Do NOT apply butter or ointments; this may cause infection. Give over-the counter pain relievers if pain increases or swelling, redness, fev

For second-degree burns (affecting top two layers of skin)

Cool the burn by immerse in cold running water for 10-15 minutes.

Use compresses if running water is not available.

Do NOT apply ice as this may lower body temperature and cause further damage.

Do NOT break blisters or apply butter or ointments; this may cause infection. Protect burn by cover loosely with sterile, nonstick bandage and secure in place

with gauze or tape. To prevent shock: (unless the person has a head, neck, or leg injury, or it woul

cause discomfort):

Lay the person flat.

Elevate feet about 12 inches.

Elevate burn area above heart level, if possible.

Cover the person with coat or blanket.

Seek medical assistance.

For third-degree burns

Seek immediate medical or emergency assistance.

In the mean time:

Protect burn area cover loosely with sterile, nonstick bandage or, for large areas, a sheet or other material that will not leave lint in wound.

Separate burned toes and fingers with dry, sterile dressings.

Do not soak burn in water or apply ointments or butter this may cause infection. To prevent shock see above.

For an airway burn, do not place pillow under the person's head when the person lying down. This can close the airway.

Have a person with a facial burn sit up.

Check pulse and breathing to monitor for shock until emergency help arrives.

First-aid Measures After Eye Contact: If this product comes in contact with the

Wash out immediately with fresh running water.

Ensure complete irrigation of the eye by keeping eyelids apart and away from eye

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and moving the eyelids by occasionally lifting the upper and lower lids. Seek medical attention without delay; if pain persists or recurs seek medical attention.

Removal of contact lenses after an eye injury should only be undertaken by skill personnel.

DO NOT attempt to remove particles attached to or embedded in eye.

Lay victim down, on stretcher if available and pad BOTH eyes, make sure dressing does not press on the injured eye by placing thick pads under dressing, above an below the eye.

Seek urgent medical assistance, or transport to hospital.

First-aid Measures After Ingestion: Immediately give a glass of water.

First aid is not generally required. If in doubt contact a Poisons Information Centre or a doctor.

4.2. Most important symptoms and effects, both acute and delayed

Symptoms/Injuries:

Symptoms/Injuries After Inhalation:

Symptoms/Injuries After Skin Contact:

Symptoms/Injuries After Eye Contact:

Symptoms/Injuries After Ingestion:

Chronic Symptoms:

## 4.3. Indication of Any Immediate Medical Attention and Special Treatment Needed

Treat symptomatically.

Copper, magnesium, aluminium, antimony, iron, manganese, nickel, zinc (and their compounds) in welding, brazing, galvanising or smelting operations all give rise to thermally produced particulates of smaller dimension than may be produced if the metals are divided mechanically. Where insufficient ventilation or respirato protection is available these particulates may produce 'metal fume fever' in workers from an acute or long term exposure.

Onset occurs in 4-6 hours generally on the evening following exposure. Tolerance develops in workers but may be lost over the weekend. (Monday Morning Fever) Pulmonary function tests may indicate reduced lung volumes, small airway obstruction and decreased carbon monoxide diffusing capacity but these abnormalities resolve after several months.

Although mildly elevated urinary levels of heavy metal may occur they do not correlate with clinical effects.

The general approach to treatment is recognition of the disease, supportive care and prevention of exposure.

Seriously symptomatic patients should receive chest x-rays, have arterial blood gases determined and be observed for the development of tracheobronchitis and pulmonary edema.

[Elenhom and Barceloux: Medical Toxicology]

## SECTION 5: FIRE-FIGHTING MEASURES

## 5.1. Extinguishing Media

Suitable Extinguishing Media: Do NOT direct a solid stream of water or foam into burning molten material; this may cause spattering and spread the fire DO NOT use halogenated fire extinguishing agents.

Metal dust fires need to be smothered with sand, inert dry powders.

DO NOT USE WATER, CO2 or FOAM.

Use DRY sand, graphite powder, dry sodium chloride based extinguishers, G-1 or M L-X to smother fire.

Confining or smothering material ts preferable to applying water as chemical reaction may produce flammable and explosive hydrogen gas. Unsuitable Extinguishing Media:

## 5.2. Special Hazards Arising From the Substance or Mixture

Fire Hazard: Reacts with acids producing flammable / explosive hydrogen (H2) gas Avoid contamination with oxidising agents i.e. nitrates, oxidising acids, chlori bleaches, pool chlorine etc. as ignition may result. Explosion Hazard: DO NOT disturb burning dust Explosion may result if dust is

stirred into a cloud, by providing oxygen to a large surface of hot metal. DO NOT use water or foam as generation of explosive hydrogen may result. With the exception of the metals (hat burn contact with air or water for example sodium), masses of combustible metals do not represent unusual fire risks becaus they have the ability to conduct heat away from hot spots so efficiently that th heat of combustion cannot be maintained - this means that it will require a lot heat to ignite a mass of combustible metal. Combustion products include; carbon monoxide (CO) carbon dioxide (CO2) nitrogen oxides (NOx) other pyrolysis product typical of burning organic material. May emit poisonous fumes. May emit corrosiv fumes. Nylon fines in air possess electrostatic properties which assist sparking small fires flame retardant grades of nylon should cease flaming once source of ignition is removed ln large fires burning will be sustained if sufficient oxyge

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is available. Decomposes on heating and produces toxic fumes of ammonia, nitroge oxides (NOx), minor amounts of hydrogen cyanide and in case of flame retardant grades, halogenated gases. CARE: Contamination of heated / molten liquid with water may cause violent steam explosion, with scattering of hot contents. Reactivity:

5.3. Advice for Firefighters

Precautionary Measures Fire:

Firefighting Instructions: Alert Fire Brigade and tell them location and nature hazard.

Wear breathing apparatus plus protective gloves.

Prevent, by any means available, spillage from entering drains or water courses. Use water delivered as a fine spray to control fire and cool adjacent area. Protection During Firefighting:

SECTION 6: ACCIDENTAL RELEASE MEASURES

- 6.1. Personal Precautions, Protective Equipment and Emergency Procedures General Measures:
- 6.1.1. For Non-emergency Personnel Protective Equipment: Emergency Procedures:
- 6.1.2. For Emergency Responders Protective Equipment: Emergency Procedures:
- 6.2. Environmental Precautions
- 6.3. Methods and Material for Containment and Cleaning Up For Containment:

Methods for Cleaning Up: Minor Spills: Remove all ignition sources.

Clean up all spills immediately.

Avoid contact with skin and eyes.

Control personal contact with the substance, by using protective equipment. Major Spills: If molten: Contain the flow using dry sand or salt flux as a dam. All tooling (e.g., shovels or hand tools) and containers which come in contact with molten metal must be preheated or specially coated, rust free and approved for such use.

Allow the spill to cool before remelting scrap.

Moderate hazard.

CAUTION: Advise personnel in area.

Alert Emergency Services and tell them location and nature of hazard.

Control personal contact by wearing protective clothing.

6.4. Reference to Other Sections

See heading 8, Exposure Controls and Personal Protection.

SECTION 7: HANDLING AND STORAGE

7.1. Precautions for Safe Handling

Additional Hazards When Processed: For molten metals:

Molten metal and water can be an explosive combination. The risks greatest when there is sufficient molten metal to entrap or seal off Water. Water and other forms of contamination on or contained in scrap or remelt ingotare known to have caused explosions in melting operations. While the products may have minimal surface roughness and internal voids, there remains the possibility of moisture contamination or entrapment.

The greatest potential for injury caused by molten materials occurs during purgi of machinery (moulders, extruders etc.)

It is essential that workers in the immediate area of the machinery wear eye and skin protection (such as full face, safety glasses, heat resistant gloves overal and safety boots) as protection from thermal bums.

Fumes or vapours emitted from hot melted materials, during converting operations may condense on overhead metal surfaces or exhaust ducts. The condensate may contain substances which are irritating or toxic. Avoid contact of that material with the skin.

Avoid all personal contact, including inhalation.

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Wear protective clothing when risk of exposure occurs.

Use in a well-ventilated area.

Prevent concentration in hollows and sumps.

Organic powders when finely divided over a range of concentrations regardless of particulate size or shape and suspended in air or some other oxidizing medium ma form explosive dust-air mixtures and result in a fire or dust explosion (includi secondary explosions)

Minimise airborne dust and eliminate all ignition sources. Keep away from heat h surfaces, sparks and fame.

Establish good housekeeping practices.

Remove dust accumulations on a regular basis by vacuuming or gentle sweeping to avoid creating dust clouds.

Hygiene Measures:

7.2. Conditions for Safe Storage, Including Any Incompatibilities Technical Measures: Inner: Polyethylene plastic bag/outer package carton Bulk bags: Reinforced bags required for dence materials

CARE: Packing of density product in light weight metal or plastic packages may result in container collapse with product release

Heavy guage metal packages / heavy guage metal drums

Storage Conditions: Many metals may incandesce, react violently, ignite or react explosively upon addition of concentrated nitric acid.

Nylon, nitrosated with dinitrogen trioxide and stored cold, exploded on warming ambient temperature. The N-nitroso-nylon is similar structurally to

N-nitroso-N-alkylamides, some of which are thermally unstable. Nylon components should be excluded from contact with nitrosabng agents.

BRETHERICK L: Handbook of Reactive Chemical Hazards

Metals exhibit varying degrees of activity. Reaction ts reduced in the massive form (sheet rod, or drop), compared with finely divided forms. The less active metals will not bum in air but:

can react exothermically with oxidising acids to form noxious gases.

catalyse polymerisation and other reactions, particularly when finery divided react with halogenated hydrocarbons (for example, copper dissolves when heated i carbon tetrachloride), sometimes forming explosive compounds.

Finery divided metal powders develop pyrophoricity when a critical specific surface area is exceeded; this is ascribed to high heat of oxide formation on exposure to air.

Safe handling is possible in relatively low concentrations of oxygen in an inert

Several pyrophoric metals, stored in glass bottles have ignited when the contain is broken on impact. Storage of these materials moist and in metal containers is recommended.

Many metals in elemental form react exothermically with compounds having active hydrogen atoms (such as acids and water) to form flammable hydrogen gas and caustic products.

Elemental metals may react with azo/diazo compounds to form explosive products. Some elemental metals form explosive products with halogenated hydrocarbons.

#### 7.3. Specific End Use(s)

Other information: Store in original containers.

Keep containers securely seated.

Store in a cool, dry area protected from environmental extremes. Store away from incompatible materials and foodstuff containers.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

## 8.1. Control Parameters

OCCUPATIONAL EXPOSURE LIMITS (DEL)

INGREDIENT DATA

Source

Ingredient

Material name

TWA

STEL Peak

Notes

US OSHA Permissible Exposure Levels (PELs) -Table Z1

copper

Selenium compounds

2 mg/m3

Not Available

Not Available

(as Se)

US OSHA Permissible Exposure Levels (PELs) -Table Z1

OP220 IMPERIAL SUPPLIES LLC PAGE: Requester: DUNLAP FAMILY Rev Dt: 08/12/16 SDS FOR 0712251 Copper - Fume / Copper 0.1 mg/m3 / 1 mg/m3Not Available Not Available (as Cu) / (as Cu); Dusts and mists US OSHA Permissible Exposure Levels (PELs) -Table Z3 copper Inert or Nuisance Dust 5 mg/m3 / 15 mg/m3/ 15 mppcf/ 50 mppcf Not Available Not Available Respirable fraction; all inert or nuisance dusts, whether mineral, inorganic, or organic, not listed specifically by substance name are covered by this limit, which is the same is the Particulates Not Otherwise Regulated (PNOR) limit in Table Z-1. / Total dust; AII inert or nuisance dusts, whether mineral, inorganic, or organic, not listed specifically by substance name are covered by this limit, which is the same as the Particulates Not Otherwise Regulated (PNOR) limit in Table Z-1. US ACGIH Threshold Limit Values (TLV) copper Copper - Fume, as Cu / Copper -Dusts and mists, as Cu 0.2 mg/m3 / 1 mg/m3Not Available Not Available TLV® Basis: Irr Gl; metal fume fever; BEI US NIOSH Recommended Exposure Limits (RELs) copper Copper metal dusts, Copper metal fumes 1 mg/m3Not Available Not Available [\*Note: The REL also applies to other copper compounds (as Cu) except Copper US OSHA Permissible Exposure Levels (PELs) -Table Z1 tin Tin, organic compounds 0.1 mg/m3Not Available Not Available (as Sn) US OSHA Permissible Exposure Levels (PELs) -Table Z1 tin Tin, organic compounds 2 mg/m3 Not Available Not Available (as Sn) except tin oxides. US ACGIH Threshold Limit Values (TLV)

tin
Silver, and compounds -Metal, dust and fume
0.1 mg/m3
Not Available
Not Available
TLV® Basis: Argyria

US NIOSH Recommended Exposure Limits (RELs)
tin
Metallic tin, Tin flake, Tin metal, Tin powder
2 mg/m3

Not Available Not Available

[\*Note: The REL also applies to other copper compounds (as  $\operatorname{Cu}$ ) except Copper fume.]

OP220 IMPERIAL SUPPLIES LLC PAGE: Requester: DUNLAP FAMILY Rev Dt: 08/12/16 SDS FOR 0712251 phosphorus

Inert or Nuisance Dust 5 mg/m3 / 15 mg/m3 / 15 mppcf / 50 mppcfNot Available Not Available

Respirable fraction; all inert or nuisance dusts, whether mineral, inorganic, or organic, not listed specifically by substance name are covered by this limit, which is the same is the Particulates Not Otherwise Regulated (PNOR) limit in Table Z-1. / Total dust; AII inert or nuisance dusts, whether mineral, inorganic, or organic, not listed specifically by substance name are covered by this limit, which is the same as the Particulates Not Otherwise Regulated (PNOR) limit in Table Z-1.

US NIOSH Recommended Exposure Limits (RELs) phosphorus Elemental phosphorus, White phosphorus 0.1 mg/m3Not Available Not Available Not Available

US OSHA Permissible Exposure Levels (PELs) -Table Z1 lead

Lead, inorganic 0.05 mg/m3Not Available Not Available

(as Pb); see 1910.1025; If an employee is exposed to lead for more than 8 hours any work day, the permissible exposure limit, as a time weighted average (TWA) f that day, shall be reduced according to the following formula: Maximum permissib limit (in  $\mu g/m3$ )=400÷hours worked in the day.

US OSHA Permissible Exposure Levels (PELs) -Table Z2 lead Cadmium fume/ Cadmium dust 0.1 mg/m3 / 1 mg/m3Not Available 0.3 mg/m3/0.6 mg/m3

(Z37.5-1970); This standard applies to any operations or sectors for which the Cadmium standard, 1910.1027, is stayed or otherwise not in effect

US ACGIH Threshold Limit Values (TLV) lead Lead and inorganic compounds, as Pb 0.05 mg/m3Not Available Not Available TLV® Basis: CNS & PNS impair; hematologic eff; BEI

US ACGIH Threshold Limit Values (TLV) Cadmium and compounds, as Cd 0.002 mg/m3Not Available Not Available TLV® Basis: Kidney dam; BEI

US NIOSH Recommended Exposure Limits (RELs) lead Lead metal, Plumbum 0.050 mg/m3Not Available Not Available

See Appendix C [\*Note: The REL also applies to other lead compounds (as Pb) - se Appendix C]

EMERGENCY LIMITS Ingredient Material name TEEL-1 TEEL-2 TEEL-3 copper

Copper 1 mg/m3 OP220 IMPERIAL SUPPLIES LLC PAGE: 8
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1 mg/m3 45 mg/m3

tin Tin 6 mg/m3 67 mg/m3 400 mg/m3

phosphorus Phosphorus (red) 0.27 mg/m3 3 mg/m3 3 mg/m3

lead
Lead
0.15 mg/m3
120 mg/m3
700 mg/m3

Ingredient Original IDLH Revised IDLH

copper
N.E. mg/m3 / N.E. ppm
100 mg/m3

tin Unknown mg/m3 / 400 mg/m3 / Unknown ppm 25 mg/m3 / 100 mg/m3

lead 700 mg/m3 100 mg/m3

8.2. Exposure Controls Appropriate Engineering Controls

For molten materials:

Provide mechanical ventilation; in general such ventilation should be provided at compounding/converting areas and at fabricating/ filling work stations where the material is heated Local exhaus ventilation should be used over and in the vicinit of machinery involved in handing the molten material.

Keep dry!!

Processing temperatures may be well above boiling point of water, so wet or damp material may cause serious steam explosion if used in unvented equipment.

Metal dusts must be collected at the source of generation as they are potentially explosive. Avoid ignition sources.

Good housekeeping practices must be maintained Dust accumulation on the floor, ledges and beams c present a risk of ignition, flame propagation and secondary explosions.

Personal Protective Equipment Materials for Protective Clothing Hand Protection

The selection of suitable gloves does not only depend on the material, but also on further marks quality which vary from manufacturer to manufacturer. Where the chemical is a preparation several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application. The exact break through time for substances has to be obtained from the manufacturer of the protective gloves and has to be observed when making a final choice

Suitability and durability of glove type is dependent on usage.

Protective gloves eg. Leather gloves or gloves wit Leather facing.

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When handling hot materials wear heat resistant,

elbow length gloves.

Rubber gloves are not recommended when handling ho

objects, materials

Experience indicates that the following polymers a suitable as glove materials for protection against undissolved, dry solids, where abrasive particles

are not resent. polychloroprene. nitrile rubber. butyl rubber.

Eye Protection Safety glasses with side shields.

Chemical goggles.

Contact lenses may pose a special hazard; soft contact lenses may absorb and concentrate irritant

A written policy

document, describing the wearing of lenses or restrictions on use, should be created for each

workplace or task.

Skin and Body Protection | See Hand protection below

Other Protection: When handling hot or molten liquids, wear trousers or overalls outside of boot to avoid spills entering boots.

Herally handled as molten liquid which requires

Usually handled as molten liquid which requires worker thermal protection and increases hazard of

vapour exposure.

CAUTION: Vapours may be irritating.

Overalls.
PV.C. apron.
Barrier cream.

Respiratory Protection Type A-P Filter of sufficient capacity. (AS/NZS

1716& 1715, EN 1432000 & 149:2001, ANSI Z88 or

national equivalent)

Thermal Hazard Protection

Not Available.

## SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1. Information on Basic Physical and Chemical Properties

Physical State
Appearance
Odor
Odor Threshold
PH
Relative Evaporation Rate (butyl
acetate=1)
Solid
Silver/ solid
Not Available
Not Available
Not Available

Melting Point Not Available Freezing Point Not Available Boiling Point Not Available Flash Point Not Available Auto-ignition Temperature Not Available Decomposition Temperature Not Available Not flammable Flammability (solid, gas) Vapor Pressure Not Available Relative Vapor Density at 20 °C Not Available Relative Density Not Available Not Available Specific Gravity Solubility Not Available Partition coefficient: Not Available

n-octanol/water
Viscosity
Lower Flammable Limit
Upper Flammable Limit
Not Available
Not Available

9.2. Other InformationVOC: Not available

SECTION 10: STABILITY AND REACTIVITY

# 10.1 Reactivity See section 7

10.2 Chemical Stability
Unstable in the presence of incompatible materials.
Product is considered stable.
Hazardous polymerisation will not occur.

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10.3 Possibility of Hazardous Reactions See section 7

10.4 Conditions to Avoid See section 7

10.5 Incompatible Materials See section 7

10.6 Hazardous Decomposition Products See section 5

SECTION 11: TOXICOLOGICAL INFORMATION

11.1. Information on Toxicological Effects
Acute Toxicity:
Skin Corrosion/Irritation:
Serious Eye Damage/Irritation:
Respiratory or Skin Sensitization:
Germ Cell Mutagenicity:
Carcinogenicity:
Reproductive Toxicity:
Specific Target Organ Toxicity (Single Exposure):
Specific Target Organ Toxicity (Repeated Exposure):
Aspiration Hazard:

Symptoms/Injuries After Inhalation: Inhalation of dusts, generated by the material during the course of normal handling, may be damaging to the health of the individual.

There is some evidence to suggest that the material can cause respiratory irritation in some persons. The body's response to such irritation can cause further lung damage.

The inhalation of small particles of metal oxide results in sudden thirst, a sweet, metallic foul taste, throat irritation, cough, dry mucous membranes, tiredness and general unwellness. Headache, nausea and vomiting, fever or chills restlessness, sweating, diarrhoea, excessive urination and prostration may also

Usually handled as molten liquid which requires worker thermal protection and increases hazard of vapour exposure.

CAUTION: Vapours may be irritating.

Symptoms/Injuries After Skin Contact: The material is not thought to produce adverse health effects or skin irritation following contact (as classified by EC Directives using animal models). Nevertheless, good hygiene practice requires th exposure be kept to a minimum and that suitable gloves be used in an occupationa setting.

Open cuts, abraded or irritated skin should not be exposed to this material. Entry into the Wood-stream, through, for example, cuts, abrasions or lesions, ma produce systemic injury with harmful effects. Examine the skin prior to the use the material and ensure that any external damage is suitably protected. Symptoms/Injuries After Eye Contact: Although the material is not thought to be an irritant (as classified by EC Directives), direct contact with the eye may cause transient discomfort characterised by tearing or conjunctival redness (as with windbum). Slight abrasive damage may also result.

Symptoms/Injuries After Ingestion: The material has NOT been classified by EC Directives or other classification systems as "harmful by ingestion'. This is because of the lack of corroborating animal or human evidence.

Tin salts are not very toxic. However, at high concentration, nausea, vomiting a diarrhoea can occur.

Chronic Symptoms: Substance accumulation, in the human body, may occur and may cause some concern following repeated or long-term occupational exposure. Workers exposed to nylon dusts for 20 years have, on occasion, shown respiratory tract lesions, including sarcoid-like lung granulomas. Occupational exposure to nylon dusts may result in pathologic lung changes.

Metallic dusts generated by the industrial process give rise to a number of potential health problems. The larger particles, above 5 micron, are nose and throat irritants.

SECTION 12: ECOLOGICAL INFORMATION

12.1. Toxicity

OP220 IMPERIAL SUPPLIES LLC PAGE: 11 Requester: DUNLAP FAMILY Rev Dt: 08/12/16 SDS FOR 0712251 12.2. Persistence and Degradability

12.3. Bioaccumulative Potential

12.4. Mobility in Soil

## 12.5. Other Adverse Effects

SECTION 13: DISPOSAL CONSIDERATIONS 13.1. Waste treatment methods Waste Disposal Recommendations: DO NOT allow wash water from cleaning or process

equipment to enter drains. It may be necessary to collect all wash water for treatment before disposal.

In all cases disposal to sewer may be subject to local laws and regulations and these should be considered first.

Where in doubt contact the responsible authority.

Additional Information:

#### SECTION 14: TRANSPORT INFORMATION

14.1 In Accordance with DOT Proper Shipping Name | NOT REGULATED FOR TRANSPORT OF DANGEROUS GOODS <PICTOGRAM PHRASE> Hazard Class Identification Number Label Codes ERG Number

14.2 In Accordance with IMDG

NOT REGULATED FOR TRANSPORT OF DANGEROUS GOODS Proper Shipping Name

Hazard Class

Identification Number

Label Codes

ntification Of The Substance/m

EmS-No. (Fire) EmS-No. (Spillage) <PICTOGRAM PHRASE>

<PICTOGRAM PHRASE>

14.3 In Accordance with IATA

Proper Shipping Name | NOT REGULATED FOR TRANSPORT OF DANGEROUS GOODS

Identification Number Hazard Class Label Codes

ntification Of The Substance/m

ERG Code (IATA)

SECTION 15: REGULATORY INFORMATION

US Federal Regulations

US. EPA CERCLA HAZARDOUS SUBSTANCES AND REPORTABLE QUANTITIES (40 CFR 302.4)

Reportable Quantity in Pounds (lb)

Reportable Quantity in kg

Copper 5000

2270

Lead 10

4.54

SARA Section 311/312 Hazard Classes

Immediate (acute) hearth hazard

Delayed (chronic) health hazard

NO

Fire hazard

NO

Pressure hazard

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|NO |Reactivity hazard |NO

Toxic Substances Control Act (TSCA)

15.2 US State Regulations State Regulations

US. CALIFORNIA PROPOSITION 65

WARNING: This product contains a chemical known to the State of California to cause cancer and birth defects or other reproductive harm

US - CALIFORNIA PREPOSITION 65 - CARCINOGENS & REPRODUCTIVE TOXICITY (CRT): LIST SUBSTANCE

Lead and lead compounds: Lead Listed

SECTION 16: OTHER INFORMATION, INCLUDING DATE OF PREPARATION OR LAST REVISION

Revision date Other Information Apr 01, 2016
The SDS is a Hazard Communication tool and should be used to assist in the Risk Assessment Many factors determine whether th reported Hazards are Risks in the workplace or other settings. Risks may be determined by reference to Exposures Scenarios. Scale of use, frequency of use and current or available engineering controls must be considered.

GHS Full Text Phrases:

Grainger disclaimer.