MATERIAL SAFETY DATA SHEET

PRODUCT NAME : OceanMaster Evershield Epoxy Sheathing Hardener

SECTION I – MANUFACTURER IDENTIFICATION

MANUFACTURER'S NAME : Oceanic Link Pte Ltd

ADDRESS : 196 Pandan Loop, Pantech Industrial Complex

#01-17, Singapore 639027

INFORMATION PHONE : 67776001 DATE PREPARED : 28th July 2008

REVISION : 00

SECTION II - HAZARDOUS INGREDIENTS / IDENTITY INFORMATION

Hazardous components	CAS NO.	% by weight	OSHA (ppm)			

Epoxy Solution	60788-97-4	> 40%	N.E			
Diethylenetriamine	111-40-0	> 15%	1			
Toluene	108-88-3	> 15%	200			
Ethylene Glycol Monoethyl Ether	110-80-5	> 5%	5			

N.E - Not Established

SECTION III – PHYSICAL AND CHEMICAL PROPERTIES

Specific gravity @ 28°C : 0.97 +/- 0.02 Appearance : Clear solution Solubility in water : Insoluble

SECTION IV - FIRE & EXPLOSION HAZARD DATA

EXTINGUISHING MEDIA: CO₂, foam, dry powder; in cases of larger fires, water spray should be used.

FIRE AND EXPLOSION HAZARDS:

Flashback along vapour trial may occur. This material may be ignited by heat, sparks, flame or static electricity. Close containers may explode when exposed to extreme heat.

FIRE FIGHTING PROCEDURES:

The use of a self-contained breathing apparatus is recommended for fire fighters. Water spray may be useful in minimizing vapors and cooling containers exposed to heat and flame. Avoid spreading burning liquid with water used for cooling purposes.

SECTION V – REACTIVITY DATA

Hazardous decomposition products: No hazardous decomposition products when stored and handled correctly.

Hazardous reactions: Exothermic reaction with amines and alcohols; reacts slowly with water forming CO₂, in closed containers risk of bursting owing to increase of pressure.

SECTION VI – HEALTH HAZARD DATA

INHALATION HEALTH RISKS AND SYMPTOMS OF EXPOSURE:

Inhalation of excessive concentrations of vapors or mists may cause fatigue, convulsions, unconsciousness, headache, dizziness, nausea, drowsiness and irritation to the nose and mucous membranes.

FIRST AID: Remove to fresh air. Restore breathing. Get medical attention. Call a physician.

SKIN CONTACT HEALTH RISKS AND SYMPTOMS OF EXPOSURE:

May cause irritation. Prolonged or repeated contact may cause sensitization, scaling and dermatitis.

FIRST AID: Remove contaminated clothing. Wash affected areas thoroughly with soap and water. Consult a physician if irritation persists. Wash contaminated clothing and decontaminate footwear before reuse.

EYE CONTACT HEALTH RISKS AND SYMPTOMS OF EXPOSURE:

This product is a severe eye irritant. Direct contact with the liquid or exposure to its vapors or mists may cause burning, tearing, redness, inflammation and swelling.

FIRST AID: Flush immediately with large amounts of water for at least 15 minutes. Get medical treatment.

INGESTION HEALTH RISKS AND SYMPTOMS OF EXPOSURE:

May causes nausea, headaches, gastrointestinal disturbances and dizziness. May cause droplets to enter the lungs with the risk of getting pneumonia.

FIRST AID: Rinse mouth with water. Drink 1 to 2 glasses of water to dilute. Do not induce vomiting. Never give anything by mouth to an unconscious or convulsing person. Consult physician or poison control center immediately. Treat symptomatically.

SECTION VII – TOXICOLOGICAL INFORMATION

Epoxy Solution

Ingestion: Acute oral toxicity: LD50 10000-14000 mg/kg body weight.

Skin contact: Irritating to skin Eye contact: Irritating to eyes.

Toluene

PEL(Long term): 50 ppm

Ethylene Glycol Monoethyl Ether

PEL (Long term): 5 ppm PEL (Short term): 18ppm

SECTION VIII – TRANSPORT INFORMATION

UN Number / Class: UN1263 / Class 3

Packing Group: PG III HS Code: 320890

SECTION IX – SPILL OR LEAK PROCEDURES

IN CASE OF SPILL OR LEAK:

Remove all sources of ignition (flames, hot surfaces and electrical static, or frictional sparks). Avoid breathing in vapour, ventilate area. Remove with inert absorbent and non-sparking tools.

DISPOSAL METHOD:

Whatever cannot be saved for recovery may be burned in an approved incinerator or disposed in an approved waste facility. Ensure compliance with local, state and federal regulations.

SECTION X – SAFE HANDLING AND USE INFORMATION

Wear suitable protective clothing, protective gloves (made of PVC or rubber) and protective goggles/mask. Respiratory protection required in insufficiently ventilated working areas and during spraying. An air-fed mask, or for short periods of work, a combination of charcoal filter and particulate filter is recommended.

In case of hypersensitivity of the respiratory tract (e.g. asthmatics and those who suffer from chronic bronchitis), it is inadvisable to work with the product.

Keep away from foodstuffs, drinks and tobacco. Wash hands before breaks and at end of work. Keep working clothes separate. Take off immediately all contaminated clothing.

SECTION XI – SPECIAL PRECAUTIONS

HANDLING AND STORAGE

Keep container dry and tightly closed in a cool and well-ventilated place. Avoid exposure to temperature above 50°C. Ensure adequate ventilation or exhaust ventilation in the working area. Exhaust ventilation necessary if product is sprayed.

Avoid contact with skin and eyes.

Provide adequate ventilation and if necessary, air extraction in working areas. Explosion protection required.

The data given here is based on current knowledge and experience. The purpose of this Safety Data Sheet is to describe the products in terms of their safety requirements. The data does not signify any warranty with regard to the products' properties.

MATERIAL SAFETY DATA SHEET

PRODUCT NAME : : OceanMaster Evershield Epoxy Sheathing Resin

SECTION I – MANUFACTURER IDENTIFICATION

MANUFACTURER'S NAME : Oceanic Link Pte Ltd

ADDRESS : 196 Pandan Loop, Pantech Business Hub

#01-17, Singapore 639027

INFORMATION PHONE : 67776001 DATE PREPARED : 28th July 2009

REVISION : 00

SECTION II - HAZARDOUS INGREDIENTS / IDENTITY INFORMATION

Hazardous components	CAS NO.	% by weight	OSHA (ppm)		

Epoxy Solution	60788-97-4	> 60%	N.E		
Toluene	108-88-3	> 5%	200		
Ethylene Glycol Monoethyl Ether	110-80-5	> 5%	5		

N.E - Not Established

SECTION III - PHYSICAL AND CHEMICAL PROPERTIES

Specific gravity @ 28°C : 1.11 +/- 0.02 Appearance : Clear solution Solubility in water : Insoluble

SECTION IV - FIRE & EXPLOSION HAZARD DATA

EXTINGUISHING MEDIA: CO₂, foam, dry powder; in cases of larger fires, water spray should be used.

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UN Number / Class: UN1263 / Class 3

Packing Group: PG III HS Code: 320890

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