MATERIAL SAFETY DATA SHEET

SECTION 1 - CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Name: Eli-Flex FR909N60 Rubber Repair Resin

Product Use/Class: Polyurethane Resin 21.08.2001

Supersedes Previous Revision: New

SECTION 2 - COMPOSITION / INFORMATION ON INGREDIENTS

Resin

Chemical Name	CAS No.	Wt % Less than	Exposure Guidelines					
			AC	GIH	OSF	ΗA		
			TWA	STEL	TWA	Ceil	Units	Skin
Polyether /	Not	60-	N/A	N/A	N/A	N/A	N/A	N/A
polyester Polyols	classified	100%						

Any hazardous components, both singularly and cumulatively are below the concentrations at which they need to be declared or classified

Hardener

Chemical Name	CAS No.	Wt % Less than	Exposure Guidelines					
			AC	GIH	OSH	ΗA		
			TWA	STEL	TWA	Ceil	Units	Skin
Aromatic Di- Isocyanate	9016-87-9	60%				N.E.		

^{*}Proprietary

N.E. = Not Established S = Skin C = Ceiling

SECTION 3 – HAZARDOUS IDENTIFICATION

EMERGENCY OVERVIEW: Resin black paste with no odour. Non-flammable thixotropic paste. Supplied with a amber hardener which is non-flammable and with no vapour. May cause skin and eye irritation. Not regarded as a health or environmental hazard under current legislation.

EFFECTS OF OVER-EXPOSURE

Eye Contact: Can cause eye irritation.

Skin Contact: Generally harmless, but may cause skin sensitisation.

Inhalation: Possible irritation of the respiratory system can occur causing a variety of symptoms such as dryness of the throat, tightness of the chest, and shortness of breath.

Ingestion: Harmful if swallowed. Ingestion is not an expected route of entry in industrial or commercial uses.

Chronic Hazards: Repeated or prolonged skin contact may cause dermatitis.

PRIMARY ROUTE(S) OF ENTRY: Skin contact, inhalation, ingestion, eye contact.

SECTION 4 - FIRST AID MEASURES

FIRST AID

Eye contact: Flush eyes immediately with large amounts of water for at least 15 minutes holding eyelids open while flushing. Get prompt medical attention.

Skin Contact: Flush contaminated skin with large amounts of water while removing contaminated clothing. Wash affected skin areas with soap and water. Get medical attention if symptoms occur.

Inhalation: Move person to fresh air. Restore and support continued breathing. If breathing is difficult, give oxygen. Get immediate medical attention.

Ingestion: If swallowed, do not induce vomiting. Give one or two glasses of water or milk. Call a physician or poison control centre immediately for further instructions. Never give anything by mouth to an unconscious person.

SECTION 5 – FIRE FIGHTING MEASURES

Resin FR909

Flash Point (Setaflash closed cup)	>160°C		
OSHA Flammability Classification	Non-Flammable P.U Compound		
Extinguishing Media	CO ₂ Dry Chemical Foam Water Fog		

Hardener FR909

Flash Point (Setaflash closed cup)	> 150°C		
OSHA Flammability Classification	Non-Flammable		
Extinguishing Media	CO ₂ Dry Chemical Foam Water Fog		

UNUSUAL FIRE AND EXPLOSION HAZARDS: Resin non-flammable. Keep containers tightly closed. Isolate from heat, open flame and other sources of ignition. Closed containers may rupture when exposed to extreme heat. Use water spray to keep fire exposed containers cool.

SPECIAL FIREFIGHTING PROCEDURES: Wear full fire fighting protective clothing, including self-contained breathing apparatus (SCBA). Water spray may be ineffective. If water is used, fog nozzles are preferable. During a fire, irritating and/or toxic gases and particulate may be generated by thermal decomposition or combustion.

SECTION 6 - ACCIDENTAL RELEASE MEASURES

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED: No special provisions are required or personal protection equipment. Wear sensible industrial clothing and launder after use. Do not empty into drains.

SECTION 7 – HANDLING AND STORAGE

HANDLING: No specific handling precautions.

STORAGE: Store in well-ventilated areas. Do not puncture, drag or slide container.

SECTION 8 - EXPOSURE CONTROLS / PERSONAL PROTECTION

ENGINEERING CONTROLS: Sufficient ventilation in pattern and volume should be provided in order to maintain air contaminate levels below recommended exposure limits.

RESPIRATORY PROTECTION: No specific recommendations made.

SKIN PROTECTION: Use neoprene, nitrile, or rubber gloves to prevent skin contact. Use long sleeves.

EYE PROTECTION: Use safety eye-wear including safety glasses with side shields and chemical goggles where splashing may occur.

OTHER PROTECTIVE EQUIPMENT: Use disposable or impervious clothing if work clothing contamination is likely. Remove and wash contaminated clothing before re-use.

HYGIENIC PRACTICES: Wash hands thoroughly before eating, smoking or using the toilet facility. Do not smoke in any chemical handling or storage area. Food or beverages should not be consumed anywhere this product is handled or stored. Wash thoroughly after handling.

SECTION 9 – PHYSICAL AND CHEMICAL PROPERTIES

Resin FR909

Flash Point (DIN 51755)	160°C
Appearance	Black
Physical State	Thixotropic Paste
Odour	None
Solubility in H ₂ 0	Insoluble
Vapour Pressure	Low
Vapour Density	Is heavier than air
Specific Gravity	1,1 g/cm ³
PH	N.A.

Hardener FR909

Flash Point (DIN 51755)	> 150°C
Appearance	Amber liquid
Physical State	Free flowing liquid
Odour	None
Solubility in H ₂ 0	Insoluble
Specific Gravity	0,9 g/cm ³
PH	N.A.

(See Section 16 for abbreviation of legend).

SECTION 10 – STABILITY AND REACTIVITY

CONDITIONS TO AVOID: High temperatures. Sources of ignition.

HAZAROUS DECOMPOSITION PRODUCTS: No hazardous decomposition when stored and handled correctly. Carbon dioxide, carbon monoxide may be products of thermal decomposition.

HAZAROUS POLYMERIZATION: Will not occur under normal conditions.

STABILITY: This product is stable under normal storage conditions.

SECTION 11 – TOXICOLOGICAL PROPERTIES

Product can be sensitising on skin and eyes.

SECTION 12 – ECOLOGICAL INFORMATION

Not regarded as dangerous to the environment

SECTION 13 – DISPOSAL CONSIDERATIONS

DISPOSAL METHOD: No specific recommendations. Follow local authority guidelines

SECTION 14 – TRANSPORTATION INFORMATION

Resin FR909

DOT Proper Shipping Name	Polyurethane resin
DOT Hazard Class	Not classified
DOT UN/NA Number	Not classified
Emergency Response Guide Number	26
Packing Group	ll .

Hardener FR909 (if shipped separately)

DOT Proper Shipping Name	Polyurethane resin
DOT Hazard Class	Not classified
DOT UN/NA Number	Not classified
Emergency Response Guide Number	26
Packing Group	II

SECTION 15 – REGULATORY INFORMATION

Label for supply: Resin: None, Hardener: Harmful

SECTION 16 – OTHER INFORMATION

The product is intended for use by skilled or experienced personnel for the intended application as recommended by us.

The information contained herein is based on data available to us and is believed to be correct. Since this information may have been obtained in part from independent laboratories or other sources not under our direct supervision, no representation is made that the information is accurate, reliable, complete or representative and the Buyer may rely thereon only at the Buyer's risk. We make no guarantee that the health and safety precautions we have suggested will be adequate for all individuals and/or situations involving its handling and use.