

SAFETY DATA SHEET



Revision date: 09-Aug-2024

Revision Number 1

Section 1: Identification

Product identifier

Product Name Elaston W90 Part A

Product Code(s) 000000067097

Other means of identification

Recommended use of the chemical and restrictions on use

Recommended use Component of a polyurea system.

Uses advised against No information available.

Details of manufacturer or importer

Supplier

Liquimix Pty Ltd
ABN: 32 062 887 585
Street Address: 24 Rosa Place
Richlands QLD 4077
Australia

Telephone Number: +61 7 3277 6655

*Emergency telephone number

Emergency telephone number **1800 638 556 (24 HOURS)**

Please ensure you refer to the limitations of this Safety Data Sheet as set out in the "Other Information" section at the end of this Data Sheet.

Section 2: Hazard identification

Classified as a hazardous substance in accordance with the criteria of Safe Work Australia - Globally Harmonized System (GHS).
Not classified as Dangerous Goods by the criteria of the Australian Dangerous Goods Code (ADG Code) for transport by Road and Rail; NON-DANGEROUS GOODS.

GHS Classification

Acute toxicity - Inhalation (Vapors)	Category 4
Skin corrosion/irritation	Category 2
Serious eye damage/eye irritation	Category 2A
Respiratory sensitization	Category 1
Skin sensitization	Category 1
Carcinogenicity	Category 2
Reproductive toxicity	Category 2
Specific target organ toxicity (single exposure)	Category 3
Specific target organ toxicity (repeated exposure)	Category 2
Chronic aquatic toxicity	Category 3

Label elements

Health hazard
Exclamation mark

**Signal word**

DANGER

Hazard statements

H315 - Causes skin irritation

H317 - May cause an allergic skin reaction

H319 - Causes serious eye irritation

H332 - Harmful if inhaled

H334 - May cause allergy or asthma symptoms or breathing difficulties if inhaled

H335 - May cause respiratory irritation

H351 - Suspected of causing cancer

H361 - Suspected of damaging fertility or the unborn child

H372 - Causes damage to organs through prolonged or repeated exposure

H412 - Harmful to aquatic life with long lasting effects

Precautionary Statements - Prevention

Obtain special instructions before use.

Do not handle until all safety precautions have been read and understood.

Do not eat, drink or smoke when using this product.

Use only outdoors or in a well-ventilated area.

Do not breathe dust/fume/gas/mist/vapors/spray.

In case of inadequate ventilation wear respiratory protection.

Wear protective gloves/eye protection/face protection.

Wash face, hands and any exposed skin thoroughly after handling.

Contaminated work clothing should not be allowed out of the workplace.

Avoid release to the environment.

Precautionary Statements - Response

IF exposed or concerned: Get medical advice/attention if you feel unwell.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If

eye irritation persists: Get medical advice/attention.

IF ON SKIN: Wash with plenty of soap and water. If skin irritation or rash occurs: Get medical advice/attention. Take off contaminated clothing and wash it before reuse.

IF INHALED: Remove person to fresh air and keep comfortable for breathing. If experiencing respiratory symptoms: Call a POISON CENTER or doctor.

Precautionary Statements - Storage

Store in a well-ventilated place. Keep container tightly closed.

Store locked up.

Precautionary Statements - Disposal

Dispose of contents/container in accordance with local, regional, national, and international regulations as applicable.

Other hazards which do not result in classification**Section 3: Composition and information on ingredients**

Chemical name	CAS No.	Weight-%
Isocyanic acid, polymethylenepolyphenylene ester, polymer with methyloxirane polymer with oxirane ether with 1,2,3-propanetriol (3:1)	112898-48-3	25% - 50%
Diphenylmethane-4,4-diisocyanate	101-68-8	10% - 30%
Diphenylmethanediisocyanate, mixture of 2,4 and 4,4 isomers	5873-54-1	10% - 30%

Tris(2-chloro-1-methylethyl)phosphate	13674-84-5	10% - 30%
Diphenylmethane diisocyanate homopolymer	25686-28-6	< 5%
2,2'-Methylenediphenyl diisocyanate	2536-05-2	< 1%

Section 4: First aid measures

Description of first aid measures

General advice	For advice, contact a Poisons Information Centre (e.g. phone Australia 13 11 26; New Zealand 0800 764 766) or a doctor.
Inhalation	Remove to fresh air and keep at rest in a position comfortable for breathing. If breathing is difficult, (trained personnel should) give oxygen. If breathing has stopped, give artificial respiration. Get medical attention immediately. Do not use mouth-to-mouth method if victim ingested or inhaled the substance; give artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device. May cause allergic respiratory reaction.
Eye contact	Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Call a physician if irritation persists.
Skin contact	Wash off immediately with soap and plenty of water. If skin irritation persists, call a physician. Allergic symptoms may be delayed. Take off contaminated clothing and wash before reuse.
Ingestion	Rinse mouth thoroughly with water. Do not induce vomiting without medical advice. Immediate medical attention is required.

Most important symptoms and effects, both acute and delayed

Symptoms Asthma-like and/ or skin allergy-like symptoms.

Effects of Exposure No information available.

Indication of any immediate medical attention and special treatment needed

Note to physicians Treat symptomatically.

Section 5: Firefighting measures

Suitable Extinguishing Media

Suitable extinguishing media Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. Water spray or fog is preferred; if water not available use dry chemical, CO₂ or regular foam.

Unsuitable extinguishing media Do not scatter spilled material with high pressure water streams.

Specific hazards arising from the chemical

Specific hazards arising from the chemical Thermal decomposition can lead to release of irritating and toxic gases and vapors.

Hazardous combustion products Carbon oxides. Nitrogen oxides. Hydrocarbons. Hydrogen cyanide.

Special protective actions for fire-fighters

Special protective equipment and precautions for fire-fighters Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear. Use personal protection equipment.

Section 6: Accidental release measures**Personal precautions, protective equipment and emergency procedures**

Personal precautions Do not breathe vapor or mist. Avoid contact with skin, eyes or clothing. Work up wind or increase ventilation. Wear appropriate respirator when ventilation is inadequate. Do not eat, drink or smoke when using this product. Use personal protective equipment as required. Avoid contact during pregnancy and while nursing.

Other information Protect from moisture.

For emergency responders Use personal protection recommended in Section 8.

Environmental precautions

Environmental precautions Keep out of waterways. See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

Methods for containment Prevent further leakage or spillage if safe to do so. Contain and collect spillage with non-combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and place in container for disposal according to local / national regulations (see Section 13).

Methods for cleaning up Use a non-combustible material like vermiculite, sand or earth to soak up the product and place into a container for later disposal. Dike to collect large liquid spills. Pick up and transfer to properly labeled containers. Decontaminate floor with decontamination solution letting stand for at least 15 minutes. Decontaminant (to neutralize residues): Solution of sodium carbonate 5-10%, liquid detergent 0.2-2%, water to 100%.

Section 7: Handling and storage**Precautions for safe handling**

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice. Do not breathe vapor or mist. In case of insufficient ventilation, wear suitable respiratory equipment. Avoid contact with skin, eyes or clothing. Avoid contact during pregnancy and while nursing. Reacts with water.

General hygiene considerations Wash hands before breaks and immediately after handling the product. When using do not eat, drink or smoke. Wear suitable gloves and eye/face protection.

Conditions for safe storage, including any incompatibilities

Storage Conditions Store locked up. Keep containers tightly closed in a dry, cool and well-ventilated place.

Incompatible materials Water. Alcohols. Amines. Acids. Bases.

Section 8: Exposure controls and personal protection**Control parameters**

Exposure Limits No value assigned for this specific material by Safe Work Australia. However, Workplace Exposure Standard(s) for constituent(s):

Chemical name	Australia	New Zealand	ACGIH TLV
Diphenylmethane-4,4-diisocyanate 101-68-8	TWA: 0.02 mg/m ³ STEL: 0.07 mg/m ³	TWA: 0.02 mg/m ³ STEL: 0.07 mg/m ³	TWA: 0.005 ppm
Diphenylmethanediisocyanate, mixture of 2,4 and 4,4 isomers 5873-54-1	TWA: 0.02 mg/m ³ STEL: 0.07 mg/m ³	TWA: 0.02 mg/m ³ STEL: 0.07 mg/m ³	-

Chemical name	European Union	United Kingdom	Germany DFG
Diphenylmethane-4,4-diisocyanate 101-68-8	-	TWA: 0.02 mg/m ³ STEL: 0.07 mg/m ³ Sen+	TWA: 0.05 mg/m ³ Peak: 0.05 mg/m ³ Sk* respiratory and skin sensitizer inhalable fraction
Diphenylmethanediisocyanate, mixture of 2,4 and 4,4 isomers 5873-54-1	-	TWA: 0.02 mg/m ³ STEL: 0.07 mg/m ³ Sen+	-

As published by Safe Work Australia Workplace Exposure Standards for Airborne Contaminants.

TWA - The time-weighted average airborne concentration of a particular substance when calculated over an eight-hour working day, for a five-day working week.

STEL (Short Term Exposure Limit) - the airborne concentration of a particular substance calculated as a time-weighted average over 15 minutes, which should not be exceeded at any time during a normal eight hour work day. According to current knowledge this concentration should neither impair the health of, nor cause undue discomfort to, nearly all workers.

Peak Limitation - a maximum or peak airborne concentration of a particular substance determined over the shortest analytically practicable period of time which does not exceed 15 minutes.

'Sk' (skin) Notice - absorption through the skin may be a significant source of exposure. The exposure standard is invalidated if such contact should occur.

'Sen' Notice - sensitiser. The substance can cause a specific immune response in some people. An affected individual may subsequently react to exposure to minute levels of that substance and should not be further exposed to the substance.

These Workplace Exposure Standards are guides to be used in the control of occupational health hazards. All atmospheric contamination should be kept to as low a level as is workable. These workplace exposure standards should not be used as fine dividing lines between safe and dangerous concentrations of chemicals. They are not a measure of relative toxicity.

Appropriate engineering controls

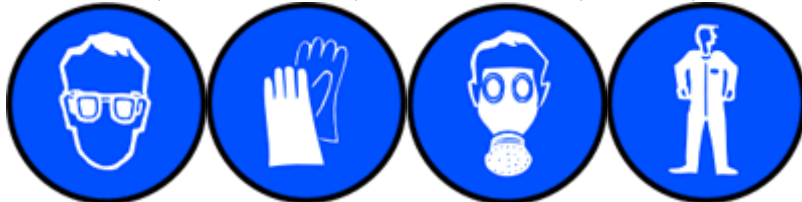
Engineering controls

Showers
Eyewash stations
Ventilation systems.

Individual protection measures, such as personal protective equipment

The selection of PPE is dependent on a detailed risk assessment. The risk assessment should consider the work situation, the physical form of the chemical, the handling methods, and environmental factors.

OVERALLS, SAFETY SHOES, SAFETY GLASSES, GLOVES, RESPIRATOR.



Eye/face protection

Wear safety glasses with side shields (or goggles).

Skin and body protection	Lightweight protective clothing. Long sleeved clothing.
Hand protection	Wear suitable gloves. Impervious gloves.
Respiratory protection	Use appropriate respiratory protection. If determined by a risk assessment an inhalation risk exists, wear a suitable mist respirator meeting the requirements of AS/NZS 1715 and AS/NZS 1716.
Environmental exposure controls	Do not allow into any sewer, on the ground or into any body of water. Local authorities should be advised if significant spillages cannot be contained.
Thermal hazards	No information available.

Section 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state	Liquid
Appearance	Clear
Color	Yellow
Odor	No information available
Odor threshold	No information available

<u>Property</u>	<u>Values</u>	<u>Remarks • Method</u>
pH	No data available	None known
pH (as aqueous solution)	No data available	None known
Melting point / freezing point	No data available	None known
Boiling point / boiling range	No data available	None known
Flash point	> 149°C	Pensky-Martens Closed Cup (PMCC)
Evaporation rate	No data available	None known
Flammability (solid, gas)	No data available	None known
Flammability Limit in Air		None known
Upper flammability or explosive limits	No data available	
Lower flammability or explosive limits	No data available	
Vapor pressure	No data available	None known
Vapor density	No data available	None known
Relative density	1.12 - 1.16	None known
Water solubility	No data available	None known
Solubility(ies)	Insoluble in water	None known
Partition coefficient	No data available	None known
Autoignition temperature	No data available	None known
Decomposition temperature	No data available	None known
Kinematic viscosity	No data available	None known
Dynamic viscosity	400 - 700 mPa s	None known

Other information

Section 10: Stability and reactivity

Reactivity

Reactivity No information available.

Chemical stability

Stability Decomposes in contact with water. Isocyanates can react with substances containing active hydrogen, including water and alcohols.

Explosion data

Sensitivity to mechanical impact None.
Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions None under normal processing.

Hazardous polymerization Polymerisation may occur at elevated temperatures in the presence of bases, amines, and metal compounds.

Conditions to avoid

Conditions to avoid Excessive heat.

Incompatible materials

Incompatible materials Water. Alcohols. Amines. Acids. Bases.

Hazardous decomposition products

Hazardous decomposition products Carbon oxides. Nitrogen oxides. Hydrocarbons. Hydrogen cyanide.

Section 11: Toxicological information**Information on likely routes of exposure**

Product Information No adverse health effects expected if the chemical is handled in accordance with this Safety Data Sheet and the chemical label. Symptoms or effects that may arise if the chemical is mishandled and overexposure occurs are:

Inhalation Inhalation of vapors in high concentration may cause irritation of respiratory system. May cause allergy or asthma symptoms or breathing difficulties if inhaled.

Eye contact Causes eye irritation.

Skin contact Causes skin irritation. May cause sensitization by skin contact.

Ingestion Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea.

Symptoms Asthma-like and/ or skin allergy-like symptoms.

Acute toxicity**Numerical measures of toxicity - Product Information**

No information available

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Diphenylmethane-4,4-diisocyanate	= 31600 mg/kg (Rat)	-	= 369 mg/m ³ (Rat) 4 h
Tris(2-chloro-1-methylethyl)phosphate	= 1500 mg/kg (Rat)	> 5000 mg/kg (Rabbit)	> 5.05 mg/L (Rat) 4 h

See section 16 for terms and abbreviations

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Skin corrosion/irritation Causes skin irritation. Classification based on individual ingredients of the mixture.

Serious eye damage/eye irritation Causes eye irritation. Classification based on individual ingredients of the mixture.

Respiratory or skin sensitization May cause sensitization by inhalation and skin contact. Classification based on individual ingredients of the mixture.

Germ cell mutagenicity No information available.

Carcinogenicity Contains a known or suspected carcinogen. The table below indicates whether each agency has listed any ingredient as a carcinogen.

Chemical name	Australia	European Union	IARC
Diphenylmethane-4,4-diisocyanate - 101-68-8	Carc. 2	Carc. 2	Group 3
Diphenylmethanediisocyanate, mixture of 2,4 and 4,4 isomers - 5873-54-1	Carc. 2	Carc. 2	-
Diphenylmethane diisocyanate homopolymer - 25686-28-6	Carc. 2	-	-

IARC (International Agency for Research on Cancer)

Group 2B - Possibly Carcinogenic to Humans

Group 3 - Not Classifiable as to Carcinogenicity in Humans

Reproductive toxicity May damage fertility or the unborn child.

STOT - single exposure May cause damage to organs.

STOT - repeated exposure May cause damage to organs through prolonged or repeated exposure.

Aspiration hazard No information available.

Section 12: Ecological information

Ecotoxicity

Aquatic ecotoxicity Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

Chemical name	Algae/aquatic plants	Fish	Toxicity to microorganisms	Crustacea
Tris(2-chloro-1-methylethyl)phosphate	EC50: =45mg/L (72h, <i>Desmodesmus subspicatus</i>) EC50: =4mg/L (96h, <i>Pseudokirchneriella subcapitata</i>)	LC50: =56.2mg/L (96h, <i>Brachydanio rerio</i>) LC50: =98mg/L (96h, <i>Pimephales promelas</i>) LC50: =30mg/L (96h, <i>Poecilia reticulata</i>)	-	EC50: =63mg/L (48h, <i>Daphnia magna</i>)

Terrestrial ecotoxicity There is no data for this product.

Persistence and degradability**Persistence and degradability** No information available.**Bioaccumulative potential****Bioaccumulation** There is no data for this product.

Chemical name	Partition coefficient
Diphenylmethane-4,4-diisocyanate	4.51
Tris(2-chloro-1-methylethyl)phosphate	2.68

Mobility**Mobility** No information available.**Other adverse effects****Other adverse effects** No information available.**Section 13: Disposal considerations****Waste treatment methods****Waste from residues/unused products** Dispose of waste in accordance with environmental legislation.**Contaminated packaging** Dispose of in accordance with federal, state and local regulations. Contaminated packaging must be treated in accordance with the local environmental regulations concerning Hazardous Waste Management.

See section 8 for more information

Section 14: Transport information**ADG** Not classified as Dangerous Goods by the criteria of the Australian Dangerous Goods Code (ADG Code) for transport by Road and Rail; NON-DANGEROUS GOODS.**IATA** Not classified as Dangerous Goods by the criteria of the International Air Transport Association (IATA) Dangerous Goods Regulations for transport by air; NON-DANGEROUS GOODS.**IMDG** Not classified as Dangerous Goods by the criteria of the International Maritime Dangerous Goods Code (IMDG Code) for transport by sea; NON-DANGEROUS GOODS.**Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code**

No information available

Section 15: Regulatory information**Safety, health and environmental regulations/legislation specific for the substance or mixture****National regulations****Australia**

Classified as a hazardous substance in accordance with the criteria of Safe Work Australia - Globally Harmonized System (GHS).

Not classified as Dangerous Goods by the criteria of the Australian Dangerous Goods Code (ADG Code) for transport by Road and Rail; NON-DANGEROUS GOODS.

See section 8 for national exposure control parameters

Standard for Uniform Scheduling of Medicines and Poisons (SUSMP)

No poisons schedule number allocated

Poison Schedule Number 6

Australian Industrial Chemicals Introduction Scheme (AICIS)

Chemical name	Australian Industrial Chemicals Introduction Scheme (AICIS)	Additional information
Diphenylmethane-4,4-diisocyanate - 101-68-8	Present	-
Diphenylmethanediisocyanate, mixture of 2,4 and 4,4 isomers - 5873-54-1	Present	-
Tris(2-chloro-1-methylethyl)phosphate - 13674-84-5	Present	Specific information requirement: Obligations to provide information apply. You must tell us within 28 days if the circumstances of your importation or manufacture (introduction) are different to those in our assessment.
Diphenylmethane diisocyanate homopolymer - 25686-28-6	Present	-

Illicit Drug Precursors/Reagents

This product does not contain any substance(s) on the Illicit Drug Precursors/Reagents list.

Chemical name	National pollutant inventory
Diphenylmethane-4,4-diisocyanate - 101-68-8	10 tonne/yr Threshold category 1

International Inventories

AiIC	All the constituents of this material are listed on the Australian Inventory of Industrial Chemicals.
NZIoC	Contact supplier for inventory compliance status.
TSCA	Contact supplier for inventory compliance status.
DSL/NDSL	Contact supplier for inventory compliance status.
EINECS/ELINCS	Contact supplier for inventory compliance status.
ENCS	Contact supplier for inventory compliance status.
IECSC	Contact supplier for inventory compliance status.
KECL	Contact supplier for inventory compliance status.
PICCS	Contact supplier for inventory compliance status.

Legend:

AiIC- Australian Inventory of Industrial Chemicals

NZIoC - New Zealand Inventory of Chemicals

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory

DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances

ENCS - Japan Existing and New Chemical Substances

IECSC - China Inventory of Existing Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances

PICCS - Philippines Inventory of Chemicals and Chemical Substances

International Regulations**The Montreal Protocol on Substances that Deplete the Ozone Layer** Not applicable**The Stockholm Convention on Persistent Organic Pollutants** Not applicable**The Rotterdam Convention** Not applicable**Section 16: Other information**

Supplier Safety Data Sheet 04/ 2020

Reason(s) For Issue: First Issue Primary SDS**Revision date:** 09-Aug-2024**Revision Note:**

The symbol (*) in the margin of this SDS indicates that this line has been revised.

Section 1 - Emergency Telephone Number updated

Key or legend to abbreviations and acronyms used in the safety data sheet**Legend**

SVHC: Substances of Very High Concern for Authorization:

PBT: Persistent, Bioaccumulative, and Toxic (PBT) Substances

vPvB: Very Persistent and very Bioaccumulative (vPvB) Substances

STOT: Specific Target Organ Toxicity

ATE: Acute Toxicity Estimate

LC50: 50% Lethal Concentration

LD50: 50% Lethal Dose

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA	TWA (time-weighted average)	STEL	STEL (Short Term Exposure Limit)
Ceiling	Maximum limit value	*	Skin designation
C	Carcinogen		

Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

Environmental Protection Agency

Acute Exposure Guideline Level(s) (AEGl(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

National Institute of Technology and Evaluation (NITE)

Australia National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

Australian Industrial Chemicals Introduction Scheme (AICIS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

U.S. National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organization for Economic Co-operation and Development Environment, Health, and Safety Publications

Organization for Economic Co-operation and Development High Production Volume Chemicals Program

Organization for Economic Co-operation and Development Screening Information Data Set

World Health Organization

Disclaimer

This SDS summarises to our best knowledge at the date of issue, the chemical health and safety hazards of the material and general guidance on how to safely handle the material in the workplace. Since Liquimix Pty Ltd cannot anticipate or control the conditions under which the product may be used, each user must, prior to usage, assess and control the risks arising from its use of the material.

If clarification or further information is needed, the user should contact their Liquimix representative or Liquimix Pty Ltd at the contact details on page 1.

Liquimix Pty Ltd's responsibility for the material as sold is subject to the terms and conditions of sale, a copy of which is available upon request.

End of Safety Data Sheet