Dura Paints - 2K Enamel - Catalyst

Safety Data Sheet

According to Regulations for Hazardous Chemical Agents, 2021 and United Nations GHS revision 10
Issue date: 7/11/2023 Revision date: 10/15/2026 Supersedes: 10/15/2026 Version: 1.9

SECTION 1: Identification of the substance/mixture and of the supplier/undertaking

1.1. GHS product identifier

Product form	:	Mixture
Trade name	:	Dura Paints - 2K Enamel - Catalyst
Type of product	:	Coatings
Product code	:	2KCATFAST
Product group	:	Trade product

1.2. Other means of identification

No additional information available

1.3. Recommended use of the chemical and restrictions on use

Recommended use	:	For use with 2K Enamel as per instruction

1.4. Supplier's details

Manufacturer
Dura Paints (Pty) Ltd.
5 Wakefield Road; Founders View South.
P.O. Box 303
1610 Edenvale; Johannesburg – South Africa
T 011 452 5221
orders@durapaints.co.za - www.durapaints.co.za

1.5. Emergency phone number

Emergency number	:	079 494 2731 / 011 452 5221

SECTION 2: Hazard identification

2.1. GHS classification of the substance/mixture and any national or regional information

Classification according to the United Nations GHS

Flammable liquids, Category 3	H226
Acute toxicity (inhalation:vapour) Category 4	H332
Skin corrosion/irritation, Category 2	H315
Respiratory sensitisation, Category 1	H334
Skin sensitisation, Category 1	H317
Germ cell mutagenicity, Category 1B	H340
Carcinogenicity, Category 1B	H350
Reproductive toxicity, Category 1	H360
Specific target organ toxicity – single exposure, Category 1	H370
Specific target organ toxicity – Single exposure, Category 3, Narcosis	H336
Specific target organ toxicity – Repeated exposure, Category 2	H373
Aspiration hazard, Category 1	H304
Hazardous to the aquatic environment – Chronic Hazard, Category 2	H411

Full text of H-statements: see section 16

Adverse physicochemical, human health and environmental effects	:	Flammable liquid and vapour,May cause cancer,May cause genetic defects,May damage fertility or the unborn child,May cause damage to organs through prolonged or repeated exposure,Causes damage to organs,Harmful in contact with skin,Harmful if inhaled,Causes skin irritation,May be fatal if swallowed and enters airways,Toxic to aquatic life with long lasting effects.

2.2. GHS label elements, including precautionary statements

Labelling according to the United Nations GHS

Hazard pictograms (GHS ZA) :



Signal word (GHS ZA) : Danger

Hazardous ingredients : Hexamethylene diisocyanate, oligomers; Xylene; Hexamethylene diisocyanate; Hexane; Toluene; Ethylclycol Acetate; Naphta (petroleum), hydrotreated light; Cyclohexane; Butanone

Hazard statements (GHS ZA) : H226 - Flammable liquid and vapour
H304 - May be fatal if swallowed and enters airways
H315 - Causes skin irritation
H317 - May cause an allergic skin reaction
H332 - Harmful if inhaled
H334 - May cause allergy or asthma symptoms or breathing difficulties if inhaled
H336 - May cause drowsiness or dizziness
H340 - May cause genetic defects (Dermal, Inhalation, Oral)
H350 - May cause cancer (Dermal, Inhalation, Oral)
H360 - May damage fertility. Suspected of damaging the unborn child. (Dermal, Inhalation, Oral)
H370 - Causes damage to organs (central nervous system, liver, kidneys, Skin, optic nerve) (Dermal, Inhalation, Oral)
H373 - May cause damage to organs (central nervous system, peripheral nervous system, liver, kidneys) through prolonged or repeated exposure (Inhalation, Dermal)
H411 - Toxic to aquatic life with long lasting effects

Precautionary statements (GHS ZA) : P101 - If medical advice is needed, have product container or label and product safety data sheet at hand.
P102 - Keep out of reach of children.
P103 - Read carefully and follow all instructions.
P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
P240 - Ground and bond container and receiving equipment.
P261 - Avoid breathing fume, mist, spray, vapours.
P263 - Avoid contact during pregnancy and while nursing.
P273 - Avoid release to the environment.
P280 - Wear eye protection, protective clothing, protective gloves.
P271 - Use only outdoors or in a well-ventilated area.
P501 - Dispose of container to according to local regulations, recycling.

P-statements for label (GHS-ZA) : P101 - If medical advice is needed, have product container or label and product safety data sheet at hand.; P102 - Keep out of reach of children.; P103 - Read carefully and follow all instructions.; P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.; P240 - Ground and bond container and receiving equipment.; P261 - Avoid breathing fume, mist, spray, vapours.; P263 - Avoid contact during pregnancy and while nursing.; P273 - Avoid release to the environment.; P280 - Wear eye protection, protective clothing, protective gloves.; P271 - Use only outdoors or in a well-ventilated area.; P501 - Dispose of container to according to local regulations, recycling.

2.3. Other hazards which do not result in classification or are not covered by the GHS

No additional information available

SECTION 3: Composition/information on ingredients

3.1. Substance

Not applicable

3.2. Mixture

Name	Product identifier	%	Classification according to the United Nations GHS
Hexamethylene diisocyanate, oligomers	CAS-No.: 28182-81-2	15 – 30	Skin Sens. 1, H317
Toluene	CAS-No.: 108-88-3	3 – 25	Flam. Liq. 2, H225 Skin Irrit. 2, H315 Repr. 2, H361 STOT SE 3, H336 STOT RE 2, H373 Asp. Tox. 1, H304
Xylene	CAS-No.: 1330-20-7	3.9 – 19.8	Flam. Liq. 3, H226 Acute Tox. Not classified (Oral) Acute Tox. 4 (Dermal), H312 Acute Tox. 4 (Inhalation), H332 Acute Tox. Not classified (Inhalation:vapour) Skin Irrit. 2, H315 STOT SE 1, H370 STOT RE Not classified Aquatic Chronic 2, H411
Naphta (petroleum), hydrotreated light	CAS-No.: 64742-49-0	0.9 – 15	Flam. Liq. 3, H226 Acute Tox. 4 (Dermal), H312 Acute Tox. 3 (Inhalation:vapour), H331 Muta. 1B, H340 Carc. 1B, H350 STOT RE Not classified Asp. Tox. 1, H304
Ethylclycol Acetate	CAS-No.: 111-15-9	1 – 10	Flam. Liq. 3, H226 Acute Tox. 4 (Oral), H302 Acute Tox. 4 (Dermal), H312 Acute Tox. 4 (Inhalation:dust,mist), H332 Repr. 1, H360 Aquatic Chronic Not classified
Cyclohexane	CAS-No.: 110-82-7	0.3 – 5	Flam. Liq. 2, H225 Acute Tox. Not classified (Oral) Acute Tox. Not classified (Inhalation:vapour) Skin Irrit. 2, H315 STOT SE 3, H336 Asp. Tox. 1, H304 Aquatic Acute 1, H400 Aquatic Chronic 1, H410
Butanone	CAS-No.: 78-93-3	0.995 – 4.975	Flam. Liq. 2, H225 Eye Irrit. 2, H319 STOT SE 3, H336 Aquatic Acute Not classified Aquatic Chronic Not classified

Name	Product identifier	%	Classification according to the United Nations GHS
Hexane	CAS-No.: 110-54-3	0.3 – 2.5	Flam. Liq. 2, H225 Acute Tox. 4 (Oral), H302 Acute Tox. 4 (Inhalation:vapour), H332 Skin Irrit. 2, H315 Repr. 2, H361 STOT SE 3, H336 STOT RE 2, H373 Asp. Tox. 1, H304 Aquatic Acute 2, H401 Aquatic Chronic 2, H411
Hexamethylene diisocyanate	CAS-No.: 822-06-0	0.02 – 0.12	Flam. Liq. Not classified Acute Tox. 4 (Oral), H302 Acute Tox. 3 (Dermal), H311 Acute Tox. 2 (Inhalation:dust,mist), H330 Skin Irrit. 2, H315 Eye Irrit. 2, H319 Resp. Sens. 1, H334 Skin Sens. 1, H317 STOT SE 3, H335 STOT RE Not classified Aquatic Chronic Not classified

SECTION 4: First aid measures

4.1. Description of necessary first aid measures

First-aid measures general : Get medical advice/attention if you feel unwell. If medical advice is needed, have product container or label and product safety data sheet at hand.

First-aid measures after inhalation : Remove person to fresh air and keep comfortable for breathing. If breathing stops, give artificial respiration . If respiratory irritation, dizziness, nausea or unconsciousness occurs, seek immediate medical assistance.

First-aid measures after skin contact : Take off immediately all contaminated clothing. Rinse skin with water/shower. If skin irritation occurs: Get medical advice/attention. If product is injected into or under the skin, or any part of the body, it should be treated as a surgical emergency. Even though initial symptoms from high pressure injection may be minimal or absent, early surgical treatment with in the first few hours may significantly reduce the ultimate extent of injury.

First-aid measures after eye contact : Immediately rinse with water for a prolonged period while holding the eyelids wide open. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.

First-aid measures after ingestion : Do NOT induce vomiting. Rinse mouth out with water. Keep the affected person calm and seated upright. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Get immediate medical advice/attention.

Self protection of the first-aider : First-aiders should pay attention to their own protection and use the recommended personal protective equipment (see section 8).

4.2. Most important symptoms/effect, acute and delayed

Symptoms/effects : Harmful if inhaled. May cause drowsiness or dizziness. Harmful in contact with skin. Causes serious eye irritation. May be fatal if swallowed and enters airways.

Symptoms/effects after inhalation : May cause irritation or asthma-like symptoms. Adverse symptoms may include nausea or vomiting, headache, respiratory irritation. May cause drowsiness or dizziness.

Symptoms/effects after skin contact : irritation (itching, redness, blistering). May cause an allergic skin reaction.

Symptoms/effects after eye contact : Adverse symptoms may include pain, irritation, watering and redness. Blurred vision.

Symptoms/effects after ingestion	:	Swallowing material may cause irritation of the gastrointestinal lining, nausea, vomiting, diarrhea, and abdominal pain. Swallowing the liquid may cause aspiration into the lungs with the risk of chemical pneumonitis. Central nervous system depression: Dizziness, headache, confusion, drowsiness, and in severe cases, loss of consciousness or coma. Cardiac arrhythmias.
Symptoms/effects upon intravenous administration	:	Pain, swelling, and erythema: Rapid onset at the injection site; Chemical necrotising cellulitis: Inflammatory destruction of soft tissue, often within 24 hours . Get medical attention immediately.
Chronic symptoms	:	Neurological: Headaches, memory loss, fatigue;Dermal: Can lead to dermatitis, with symptoms like cracking, scaling, and inflammation; Renal/Hepatic: Liver and kidney stress.
Potential adverse human health effects and symptoms	:	Causes skin irritation. May cause an allergic skin reaction. High concentration of vapours may induce: headache, dizziness, drowsiness, nausea and vomiting and in severe cases, loss of consciousness. May cause allergy or asthma symptoms or breathing difficulties if inhaled. Toxic if swallowed.

4.3. Indication of immediate medical attention and special treatment needed, if necessary

See section 4.1. Description of first-aid measures. Treat symptomatically. Monitor respiratory and neurological status.

SECTION 5: Fire-fighting measures

5.1. Suitable (and unsuitable) extinguishing media

Suitable extinguishing media	:	Dry powder. Foam. Carbon dioxide. Water spray or fog. Use water spray or fog for cooling exposed containers.
Unsuitable extinguishing media	:	Do not use a heavy water stream.

5.2. Specific hazards arising from the chemical

Fire hazard	:	Flammable liquid and vapour.
Explosion hazard	:	Vapours may form explosive mixture with air. When vapors accumulate in enclosed or poorly ventilated areas, any ignition source (e.g. static discharge, open flame, hot surfaces) can trigger an explosion. This is especially critical in spray booths, storage tanks, and confined mixing areas.
Reactivity in case of fire	:	Vapours are heavier than air and may travel considerable distance to an ignition source and flash back to source of vapours.
Hazardous decomposition products in case of fire	:	Toxic fumes may be released.

5.3. Special protective actions for fire-fighters

Precautionary measures fire	:	Evacuate area. Eliminate all ignition sources if safe to do so. Cool endangered containers with water spray or fog.
Firefighting instructions	:	Fight fire from safe distance and protected location. Stay upwind of fire.
Protection during firefighting	:	Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing.
Personal protection (Emergency response)	:	Fire-resistant protective clothing,Use breathing equipment (SCBA),Use only explosion-proof equipment and PPE
	:	
Other information	:	Dyke fire control water for later disposal. Do not allow run-off from fire-fighting to enter drains or water courses. Notify authorities if run-off does enter drains or water courses.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General measures	:	Evacuate non-essential personnel. Eliminate every possible source of ignition. Stop leak if safe to do so. Ventilate spillage area. Absorb spillage to prevent material damage.
Personal Precautions, Protective Equipment and Emergency Procedures	:	Avoid contact with skin and eyes, avoid breathing vapours. Use only non-sparking tools. Complete protective clothing.

Prevention Measures for Secondary Accidents	:	Stop leaks if it can be done without personal risk. Remove ignition sources. Avoid sparks. Take precautionary measures against static discharge.

6.1.1. For non-emergency personnel

Protective equipment	:	Wear recommended personal protective equipment.
Emergency procedures	:	Ventilate spillage area. No open flames, no sparks, and no smoking. Do not breathe mist, spray, vapours. Avoid contact with skin, eyes and clothing.

6.1.2. For emergency responders

Protective equipment	:	Do not attempt to take action without suitable protective equipment. For further information refer to section 8: "Exposure controls/personal protection".
Emergency procedures	:	Prevent from entering sewers, basements and workpits, or any place where its accumulation can be dangerous.

6.2. Environmental precautions

Avoid release to the environment. Notify authorities if product enters sewers or public waters.

6.3. Methods and materials for containment and cleaning up

For containment	:	Contain any spills with dikes or absorbents to prevent migration and entry into sewers or streams.
Methods for cleaning up	:	Absorb spillage with vermiculite or sand; Scoop into labeled hazardous waste container. Use non-sparking tools.
Other information	:	Dispose of contaminated materials according to Section 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Precautions for safe handling	:	Avoid all contact with skin, eyes, or clothing. Avoid breathing mist, spray, vapours. Provide local exhaust or general room ventilation. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Ground/bond container and receiving equipment. Take precautionary measures against static discharge. Use only non-sparking tools. Wear personal protective equipment.
Technical measures	:	Prevent electrostatic discharges (e.g. grounding, dissipative materials).
Local and general ventilation	:	Local exhaust ventilation.
Hygiene measures	:	Wash contaminated clothing before reuse. Do not eat, drink or smoke when using this product. Always wash hands after handling the product.
Handling temperature	:	> 10 – < 40 °C
Additional hazards when processed	:	Not expected to present a significant hazard under anticipated conditions of normal use.

7.2. Conditions for safe storage, including any incompatibilities

Technical measures	:	Ground/bond container and receiving equipment.
Storage conditions	:	Store in tightly sealed containers in a cool, dry, well-ventilated area. Store away from direct sunlight and sources of ignition.
Storage area	:	Ensure electrical equipment and fittings comply with local fire prevention regulations for this class of product. Refer to national or local refulations covering safety at petroleum handling and storage areas for this product.
Incompatible products	:	Oxidizing agent. Strong acids. Strong bases.
Packaging materials	:	Always store product in container of same material as original container.
Material used in packaging/containers	:	steel, hdpu or approved chemical drums.
Maximum storage period	:	≤ 12 months From date of manufacture, when correctly stored, uncatalysed and unopened.
Storage temperature	:	< 50 °C

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Xylene (1330-20-7)	
South Africa - Occupational Exposure Limits (Restricted Limits)	
Local name	Xylene, o-, m-, p- or mixed isomers
OEL eight hour TWA	300 ppm
RHCA - STEL/C	200 ppm
Remark	SKIN (danger of cutaneous absorption)
Regulatory reference	Government Notice No. R. 280, 2021
South Africa - Occupational Exposure Limits (Airborne Pollutants)	
Local name	Xylene, o-, m-, p- or mixed isomers
OEL TWA	218 mg/m³
	50 ppm
OEL STEL	435 mg/m³
	100 ppm
Remark	Sk (Danger of cutaneous absorption)
Regulatory reference	Government Notice No. R 904
South Africa - Biological limit values	
Local name	Xylenes
BEI	1.5 g/g creatinine Parameter: Methylhippuric acids - Medium: urine - Sampling time: End of shift
Regulatory reference	Government Notice No. R. 280, 2021

Hexamethylene diisocyanate (822-06-0)	
South Africa - Occupational Exposure Limits (Restricted Limits)	
Local name	Hexamethylene diisocyanate [HDI]
RHCA - STEL/C	0.01 ppm
Regulatory reference	Government Notice No. R. 280, 2021
South Africa - Biological limit values	
Local name	1,6-Hexamethylene diisocyanate
BEI	15 µg/g creatinine Parameter: 1,6-Hexamethylene diamine - Medium: urine - Sampling time: End of shift - Notations: Ns (non-specific)
Regulatory reference	Government Notice No. R. 280, 2021

Hexane (110-54-3)	
South Africa - Occupational Exposure Limits (Restricted Limits)	
Local name	n-Hexane
RHCA - STEL/C	100 ppm
Remark	SKIN (danger of cutaneous absorption)
Regulatory reference	Government Notice No. R. 280, 2021
South Africa - Occupational Exposure Limits (Airborne Pollutants)	
Local name	n-Hexane
OEL TWA	70 mg/m³
	20 ppm
Regulatory reference	Government Notice No. R 904

Hexane (110-54-3)	
South Africa - Biological limit values	
Local name	n-Hexane
BEI	0.4 mg/l Parameter: 2,5-Hexanedione - Medium: urine - Sampling time: End of shift at end of workweek
Regulatory reference	Government Notice No. R. 280, 2021

Toluene (108-88-3)	
South Africa - Occupational Exposure Limits (Restricted Limits)	
Local name	Toluene
OEL eight hour TWA	150 ppm
	560 mg/m³
RHCA - STEL/C	40 ppm 50 ppm
	188 mg/m³
Remark	SKIN (danger of cutaneous absorption) Sk
Regulatory reference	Government Notice No. R. 280, 2021 Government Notice. R: 1179
South Africa - Occupational Exposure Limits (Airborne Pollutants)	
Local name	Toluene
OEL TWA	188 mg/m³
	50 ppm
OEL STEL	560 mg/m³
	150 ppm
Remark	Sk (Danger of cutaneous absorption)
Regulatory reference	Government Notice No. R 904
South Africa - Biological limit values	
Local name	Toluene
BEI	0.02 mg/l Parameter: Toluene - Medium: blood - Sampling time: Prior to last shift of workweek 0.03 mg/l Parameter: Toluene - Medium: urine - Sampling time: End of shift 0.3 mg/g creatinine Parameter: o-Cresol - Medium: urine - Sampling time: End of shift - Notations: B (background)
Regulatory reference	Government Notice No. R. 280, 2021

Ethylclycol Acetate (111-15-9)	
South Africa - Occupational Exposure Limits (Maximum Limits)	
Local name	2-Ethoxyethyl acetate [EGEEA], [ethylene glycol monoethyl ether acetate]
RHCA - STEL/C	10 ppm
Remark	SKIN (danger of cutaneous absorption)
Regulatory reference	Government Notice No. R. 280, 2021
South Africa - Occupational Exposure Limits (Airborne Pollutants)	
Local name	2-Ethoxyethyl acetate (Ethylene glycol monoethyl ether acetate [EGEEA])
OEL TWA	27 mg/m³

Ethylclycol Acetate (111-15-9)	
	5 ppm
Remark	Sk (Danger of cutaneous absorption)
Regulatory reference	Government Notice No. R 904
South Africa - Biological limit values	
Local name	2-Ethoxyethyl acetate (EGEEA)
BEI	100 mg/g creatinine Parameter: 2-Ethoxyacetic acid - Medium: urine - Sampling time: End of shift at end of workweek
Regulatory reference	Government Notice No. R. 280, 2021

Cyclohexane (110-82-7)	
South Africa - Occupational Exposure Limits (Restricted Limits)	
Local name	Cychlohexane
RHCA - STEL/C	200 ppm
Regulatory reference	Government Notice No. R. 280, 2021
South Africa - Occupational Exposure Limits (Airborne Pollutants)	
Local name	Cychlohexane
OEL TWA	340 mg/m³
	100 ppm
OEL STEL	1030 mg/m³
	300 ppm
Regulatory reference	Government Notice No. R 904

Butanone (78-93-3)	
South Africa - Occupational Exposure Limits (Restricted Limits)	
Local name	Methyl ethyl ketone [MEK]
OEL eight hour TWA	600 ppm
RHCA - STEL/C	400 ppm
Remark	SKIN (danger of cutaneous absorption)
Regulatory reference	Government Notice No. R. 280, 2021
South Africa - Occupational Exposure Limits (Airborne Pollutants)	
Local name	Methyl ethyl ketone [MEK] (Butan-2-one)
OEL TWA	600 mg/m³
	200 ppm
OEL STEL	900 mg/m³
	300 ppm
Remark	Sk (Danger of cutaneous absorption)
Regulatory reference	Government Notice No. R 904
South Africa - Biological limit values	
Local name	Methyl Ethyl Ketone (MEK)
BEI	2 mg/l Parameter: Methyl ethyl ketone (MEK) - Medium: urine - Sampling time: End of shift - Notations: Ns (non-specific)
Regulatory reference	Government Notice No. R. 280, 2021

OEL Sources	:	LISAM.
BLV Sources	:	LISAM.

8.2. Appropriate engineering controls

Appropriate engineering controls	:	Ensure good ventilation of the work station. Monitor vapour concentrations in confined areas.
Environmental exposure controls	:	Avoid release to the environment.
Consumer exposure controls	:	Avoid contact during pregnancy/while nursing.

8.3. Individual protection measures, such as personal protective equipment

Materials for protective clothing	:	Chemical resistant overalls
Hand protection	:	Protective gloves
Eye protection	:	Wear security glasses which protect from splashes
Skin and body protection	:	Wear suitable protective clothing
Respiratory protection	:	[In case of inadequate ventilation] wear respiratory protection.

Personal protective equipment symbol(s)



8.4. Exposure limit values for the other components

No additional information available

SECTION 9: Physical and chemical properties

9.1. Basic physical and chemical properties

Physical state	:	Liquid
Appearance	:	Viscous liquid.
Colour	:	Colourless
Odour	:	Aromatic solvent like odour
Odour threshold	:	No data available
pH	:	Not applicable (solvent-borne product)
pH solution	:	No data available
Relative evaporation rate (butylacetate=1)	:	No data available
Relative evaporation rate (ether=1)	:	No data available
Melting point	:	Not applicable
Freezing point	:	≈ -20 °C Estimated
Boiling point	:	> 79 – < 180 °C Estimated
Flash point	:	> 23 – < 30 °C Estimated
Auto-ignition temperature	:	> 230 °C Estimated
Decomposition temperature	:	No data available
Flammability	:	Flammable liquid and vapour.
Vapour pressure	:	28.4 mm Hg Derived from value for Toluene; at 25°C Source: HSDB
Vapour pressure at 50°C	:	No data available
Relative vapour density at 20°C	:	> 3 – < 5 Esti,ated
Relative density	:	< 1 Typical; Source: Product TDS
Relative density of saturated gas/air mixture	:	No data available
Density	:	No data available
Relative gas density	:	No data available
Solubility	:	insoluble in water. soluble in most organic solvents.
Partition coefficient n-octanol/water (Log Pow)	:	No data available
Partition coefficient n-octanol/water (Log Kow)	:	No data available
Viscosity, kinematic	:	> 15 – < 20 mm²/s Estimated
Viscosity, dynamic	:	> 300 – < 600 cP Depencing on colour befory catalyst; Source: Product TDS
Explosive properties	:	Vapours may form explosive mixture with air.
Oxidising properties	:	Non oxidizing.
Explosive limits	:	No data available

Lower explosion limit	:	≈ 1 Vol-% Approx.
Upper explosion limit	:	≈ 11 Vol-% Approx.
Physical state	:	Liquid
Appearance	:	Viscous liquid.

9.2. Data relevant with regard to physical hazard classes (supplemental)

VOC content : > 500 – < 700 g/l Likely estimate

SECTION 10: Stability and Reactivity

10.1. Reactivity

Flammable liquid and vapour.

10.2. Chemical Stability

Stable under normal conditions.

10.3. Possibility of hazardous reactions

No dangerous reactions known under normal conditions of use.

10.4. Conditions to avoid

Avoid contact with hot surfaces. Heat. No flames, no sparks. Eliminate all sources of ignition.

10.5. Incompatible materials

Strong oxidizing agents. Strong acids. Strong bases.

10.6. Hazardous decomposition products

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

SECTION 11: Toxicological information

Likely routes of exposure : Dermal. Ingestion. Inhalation.

11.1. Information on toxicological effects

Acute toxicity (oral) : Not classified
Acute toxicity (dermal) : Not classified
Acute toxicity (inhalation) : Inhalation:vapour: Harmful if inhaled.

Dura Paints - 2K Enamel - Catalyst	
ATE ZA (vapours)	14.23 mg/l/4h

Hexamethylene diisocyanate, oligomers (28182-81-2)	
LD50 oral rat	> 2500 mg/kg bodyweight Animal: rat, Animal sex: female, Guideline: OECD Guideline 423 (Acute Oral toxicity - Acute Toxic Class Method)
LD50 dermal rat	> 2000 mg/kg bodyweight Animal: rat, Guideline: OECD Guideline 402 (Acute Dermal Toxicity)
LD50 dermal rabbit	> 2000 mg/kg bodyweight Animal: rabbit, Guideline: other:

Xylene (1330-20-7)	
LD50 oral rat	> 3523 – < 6631 mg/kg bodyweight XYLENE : ECHA
LD50 dermal rabbit	12126 mg/kg bodyweight Animal: rabbit, Animal sex: male, Remarks on results: other:
LC50 Inhalation - Rat	≥ 27.124 mg/l XYLENE : ECHA

Hexamethylene diisocyanate (822-06-0)	
LD50 oral rat	≈ 746 mg/kg bodyweight Source: ECHA

Hexamethylene diisocyanate (822-06-0)	
LD50 dermal rat	> 7000 mg/kg bodyweight Animal: rat, Guideline: OECD Guideline 402 (Acute Dermal Toxicity)
LD50 dermal rabbit	≈ 599 mg/kg Duration 24hr; Source: Supplier SDS
LC50 Inhalation - Rat	0.124 mg/l/4h Animal: rat, Guideline: OECD Guideline 403 (Acute Inhalation Toxicity), 95% CL: 111 - 140

Hexane (110-54-3)	
LD50 oral rat	≈ 1600 mg/kg bodyweight Source : ECHA
LD50 dermal rabbit	> 3350 mg/kg bodyweight Source : ECHA
LC50 Inhalation - Rat	≥ 17.6 mg/l Source: ECHA

Toluene (108-88-3)	
LD50 oral rat	5580 mg/kg Source: ECHA
LD50 dermal rabbit	> 5000 mg/kg Source: ECHA
LC50 Inhalation - Rat	> 25.7 – < 30 mg/l Source: ECHA
LC50 Inhalation - Rat (Vapours)	> 20 mg/l Source: ECHA

Ethylclycol Acetate (111-15-9)	
LD50 oral rat	3900 mg/kg
LD50 dermal rabbit	10500 mg/kg
LD50 dermal	> 4900 – < 5000 mg/kg Mouse; Source: Supplier SDS

Naphta (petroleum), hydrotreated light (64742-49-0)	
LD50 oral rat	≥ 5000 mg/kg bodyweight ECHA
LD50 dermal rat	2800 – 3100 mg/kg bodyweight Animal: rat
LD50 dermal rabbit	≥ 2000 mg/kg bodyweight ECHA
LC50 Inhalation - Rat	> 5.61 mg/l ECHA

Cyclohexane (110-82-7)	
LD50 oral rat	> 5000 mg/kg bodyweight Animal: rat, Guideline: OECD Guideline 401 (Acute Oral Toxicity)
LD50 dermal rabbit	> 2000 mg/kg bodyweight Animal: rabbit, Guideline: OECD Guideline 402 (Acute Dermal Toxicity)
LC50 Inhalation - Rat	> 32.88 mg/l/4h Animal: rat, Guideline: OECD Guideline 403 (Acute Inhalation Toxicity)

Skin corrosion/irritation : Causes skin irritation.
pH: Not applicable (solvent-borne product)

Serious eye damage/irritation : Not classified
pH: Not applicable (solvent-borne product)

Respiratory or skin sensitization : May cause allergy or asthma symptoms or breathing difficulties if inhaled. May cause an allergic skin reaction.

Germ cell mutagenicity : May cause genetic defects (Dermal, Inhalation, Oral).

Carcinogenicity : May cause cancer (Dermal, Inhalation, Oral).

Toluene (108-88-3)	
IARC group	3 - Not classifiable

Reproductive toxicity : May damage fertility. Suspected of damaging the unborn child. (Dermal, Inhalation, Oral).

Ethylclycol Acetate (111-15-9)	
LOAEL (animal/male, F0/P)	≥ 1000 mg/kg Mouse; Testicular athropy; Source: Supplier SDS

Reproductive toxicity : May damage fertility. Suspected of damaging the unborn child. (Dermal, Inhalation, Oral).

STOT-single exposure : Causes damage to organs (central nervous system, liver, kidneys, Skin, optic nerve) (Dermal, Inhalation, Oral). May cause drowsiness or dizziness.

Xylene (1330-20-7)	
LOAEL (oral, rat)	≈ 150 mg/kg bodyweight XYLENE : ECHA
NOAEL (oral, rat)	≈ 250 mg/kg bodyweight XYLENE : ECHA
NOAEC (inhalation, rat, gas)	> 450 – < 1800 ppmv/4h XYLENE : 12H : ECHA
STOT-single exposure	Causes damage to organs (central nervous system) (Inhalation).

Hexamethylene diisocyanate (822-06-0)	
STOT-single exposure	May cause respiratory irritation.

Hexane (110-54-3)	
STOT-single exposure	May cause drowsiness or dizziness.

Toluene (108-88-3)	
STOT-single exposure	May cause drowsiness or dizziness.

Cyclohexane (110-82-7)	
STOT-single exposure	May cause drowsiness or dizziness.

Butanone (78-93-3)	
NOAEC (inhalation, rat, gas)	≈ 5041 ppm Source: ECHA
STOT-single exposure	May cause drowsiness or dizziness.

STOT-repeated exposure : May cause damage to organs (central nervous system, peripheral nervous system, liver, kidneys) through prolonged or repeated exposure (Inhalation, Dermal).

Xylene (1330-20-7)	
LOAEL (oral, rat, 90 days)	150 mg/kg bodyweight Animal: rat, Animal sex: male, Guideline: OECD Guideline 408 (Repeated Dose 90-Day Oral Toxicity Study in Rodents), Guideline: EPA OPP 82-1 (90-Day Oral Toxicity)

Hexamethylene diisocyanate (822-06-0)	
LOAEL (oral, rat, 90 days)	≈ 300 mg/kg bodyweight/day Duration: 2 weeks; Source: Supplier SDS
NOAEC (inhalation, rat, vapour, 28 days)	≈ 0.035 mg/l Duration: 2years; Source: Supplier SDS

Hexane (110-54-3)	
LOAEL (oral, rat, 90 days)	≥ 200 mg/kg bodyweight/day Source : ECHA
NOAEL (oral, rat, 28 days)	≥ 40 mg/kg bodyweight/day Source : ECHA
STOT-repeated exposure	May cause damage to organs (central nervous system) through prolonged or repeated exposure (Inhalation).

Toluene (108-88-3)	
LOAEL (oral, rat, 90 days)	≈ 1250 mg/kg bodyweight/day Source: ECHA
LOAEC (inhalation, rat, gas, 90 days)	≈ 2.261 mg/l Source: ECHA
NOAEL (oral, rat, 28 days)	≥ 625 mg/kg bodyweight/day
NOAEC (inhalation, rat, 28 days)	> 2.261 – < 4.71 mg/l Source : ECHA
NOAEL (oral, rat, 90 days)	≈ 625 mg/kg bodyweight/day Rat
NOAEC (inhalation, rat, gas, 90 days)	1.131 – 2.355 mg/l Air, Source: ECHA
NOAEC (inhalation, rat, vapour, 90 days)	2.355 mg/l air Animal: rat, Guideline: EU Method B.29 (Sub-Chronic Inhalation Toxicity:90-Day Study)
STOT-repeated exposure	May cause damage to organs (central nervous system) through prolonged or repeated exposure (Inhalation).

Naphta (petroleum), hydrotreated light (64742-49-0)	
LOAEC (inhalation, rat, vapour, 90 days)	16.6 mg/l air Animal: rat, Animal sex: male
NOAEC (inhalation, rat, 28 days)	≈ 1.402 mg/l ECHA
NOAEC (inhalation, rat, vapour, 90 days)	3.3 mg/l air Animal: rat, Animal sex: male

Cyclohexane (110-82-7)	
NOAEC (inhalation, rat, gas, 28 days)	> 500 – < 7000 ppmv/6h/day

Aspiration hazard : May be fatal if swallowed and enters airways.

Dura Paints - 2K Enamel - Catalyst	
Viscosity, kinematic	> 15 – < 20 mm²/s Estimated

Potential adverse human health effects and symptoms : Causes skin irritation. May cause an allergic skin reaction. High concentration of vapours may induce: headache, dizziness, drowsiness, nausea and vomiting and in severe cases, loss of consciousness. May cause allergy or asthma symptoms or breathing difficulties if inhaled. Toxic if swallowed.

SECTION 12: Ecological information

12.1. Toxicity

Ecology - general : Toxic to aquatic life with long lasting effects.

Hazardous to the aquatic environment, short–term (acute) : Not classified

Hazardous to the aquatic environment, long–term (chronic) : Toxic to aquatic life with long lasting effects.

Hexamethylene diisocyanate, oligomers (28182-81-2)	
EC50 72h - Algae [1]	> 1000 mg/l Test organisms (species): other:

Xylene (1330-20-7)	
LC50 - Fish [1]	> 2.6 – < 9.6 mg/l Source: ECHA
EC50 - Crustacea [1]	≥ 10.389 mg/l Source: Echa
EC50 72h - Algae [1]	> 4.6 – < 4.9 mg/l XYLENE : Aquatic Algae : ECHA
LOEC (chronic)	3.16 mg/l Test organisms (species): Daphnia magna Duration: '21 d'
NOEC chronic fish	> 1.3 mg/l Test organisms (species): Oncorhynchus mykiss (previous name: Salmo gairdneri) Duration: '56 d'
NOEC chronic algae	≈ 0.44 mg/l XYLENE : Aquatic Algae 73H : ECHA

Hexamethylene diisocyanate (822-06-0)	
LC50 - Fish [1]	≥ 82.8 mg/l Method EU C.1; Source : Supplier SDS
EC50 - Crustacea [1]	≥ 89.1 mg/l Species: Daphnia; Method EU C.2; Source : Supplier SDS
EC50 72h - Algae [1]	> 77.4 mg/l Method EU C.3; Source : Supplier SDS & ECHA
NOEC chronic algae	≈ 4.9 mg/l Duration 72hrs; Source : ECHA

Hexane (110-54-3)	
EC50 72h - Algae [1]	≈ 9.285 mg/l Source: ECHA

Toluene (108-88-3)	
LC50 - Fish [1]	5.5 mg/l Source: ECHA
EC50 - Crustacea [1]	3.78 mg/l Source: ECHA
EC50 72h - Algae [1]	≥ 134 mg/l Source: ECHA
ErC50 algae	≥ 84 mg/l Source : ECHA

Toluene (108-88-3)	
LOEC (chronic)	≥ 2.76 mg/l 7 Days - Source : ECHA
NOEC (chronic)	0.74 mg/l Test organisms (species): Ceriodaphnia dubia Duration: '7 d'
NOEC chronic fish	≥ 1.39 mg/l Source : ECHA
NOEC chronic crustacea	≈ 0.74 mg/l Source: ECHA
NOEC chronic algae	≥ 10 mg/l Sourc: ECHA

Ethylclycol Acetate (111-15-9)	
LC50 - Fish [1]	42.2 mg/l Source: HSDB
LC50 - Fish [2]	≥ 4.1 mg/l Species: Lepomis macrochirus; Source: Supplier SDS

Naphta (petroleum), hydrotreated light (64742-49-0)	
LOEC (chronic)	0.32 mg/l Test organisms (species): Daphnia magna Duration: '21 d'
NOEC (chronic)	0.17 mg/l Test organisms (species): Daphnia magna Duration: '21 d'

Cyclohexane (110-82-7)	
LC50 - Fish [1]	≥ 4.53 mg/l Test organisms (species): Pimephales promelas
EC50 - Crustacea [1]	≥ 0.9 mg/l Test organisms (species): Daphnia magna
EC50 72h - Algae [1]	≥ 4.42 mg/l Fresh water algae - Source : ECHA
NOEC chronic algae	≥ 0.925 mg/l freshwater algae - Source : ECHA

Butanone (78-93-3)	
LC50 - Fish [1]	2973 mg/l Test organisms (species): Pimephales promelas
EC50 - Crustacea [1]	308 mg/l Test organisms (species): Daphnia magna
EC50 72h - Algae [1]	1220 mg/l Test organisms (species): Raphidocelis subcapitata (previous names: Pseudokirchneriella subcapitata, Selenastrum capricornutum)
EC50 96h - Algae [1]	1240 mg/l Test organisms (species): Raphidocelis subcapitata (previous names: Pseudokirchneriella subcapitata, Selenastrum capricornutum)
NOEC chronic algae	≈ 566 mg/l Fresh water algae; Source: ECHA

12.2. Persistence and degradability

Dura Paints - 2K Enamel - Catalyst	
Persistence and degradability	Rapidly degradable

Hexamethylene diisocyanate, oligomers (28182-81-2)	
Persistence and degradability	

Xylene (1330-20-7)	
Persistence and degradability	
Chemical oxygen demand (COD)	> 2.56 – < 2.91 g O_2/g substance

Hexamethylene diisocyanate (822-06-0)	
Persistence and degradability	

Hexane (110-54-3)	
Persistence and degradability	

Toluene (108-88-3)	
Persistence and degradability	

Ethylclycol Acetate (111-15-9)	
Persistence and degradability	

Naphta (petroleum), hydrotreated light (64742-49-0)	
Persistence and degradability	

Cyclohexane (110-82-7)	
Persistence and degradability	

Butanone (78-93-3)	
Persistence and degradability	

12.3. Bioaccumulative potential

Dura Paints - 2K Enamel - Catalyst	
Bioaccumulative potential	No additional information available

Xylene (1330-20-7)	
Partition coefficient n-octanol/water (Log Pow)	> 3.155 – < 3.16 XYLENE @ 20 °C : ECHA
Partition coefficient n-octanol/water (Log Kow)	> 3.12 – < 3.2 XYLENE @ 20 °C and pH 7: ECHA

Hexamethylene diisocyanate (822-06-0)	
Partition coefficient n-octanol/water (Log Kow)	≈ 3.2 @ 20 °C; Source: ECHA

Hexane (110-54-3)	
Partition coefficient n-octanol/water (Log Kow)	> 3.42 – < 5.8 At 20 °C and pH 7 - Source: ECHA

Toluene (108-88-3)	
Partition coefficient n-octanol/water (Log Kow)	2.73 Source: HSDB

Ethylclycol Acetate (111-15-9)	
Partition coefficient n-octanol/water (Log Kow)	0.24 Source: GESTIS
Bioaccumulative potential	The substance has low potential for bioaccumulation.

Cyclohexane (110-82-7)	
Bioconcentration factor (BCF REACH)	≈ 167 l/kg ww Source : ECHA
Partition coefficient n-octanol/water (Log Pow)	≈ 3.44 @ 20 °C Source : ECHA
Partition coefficient n-octanol/water (Log Kow)	≈ 3.44 @ 25 °C and pH 7 Source : ECHA

Butanone (78-93-3)	
Partition coefficient n-octanol/water (Log Kow)	≈ 0.3 At 40 °C; Source: ECHA

12.4. Mobility in soil

Dura Paints - 2K Enamel - Catalyst	
Mobility in soil	No additional information available

Xylene (1330-20-7)	
Organic Carbon Normalized Adsorption Coefficient (Log Koc)	≈ 537 XYLENE: @ 20 °C : ECHA

Hexane (110-54-3)	
Organic Carbon Normalized Adsorption Coefficient (Log Koc)	≈ 2187.76 @ 20 °C - Source : ECHA

Toluene (108-88-3)	
Surface tension	≈ 27.73 mN/m

Cyclohexane (110-82-7)	
Organic Carbon Normalized Adsorption Coefficient (Log Koc)	≈ 770 at 20°C; Source: ECHA

12.5. Other adverse effects

Ozone : Not classified

Other adverse effects : No additional information available

SECTION 13: Disposal Considerations

13.1. Disposal methods

Regional waste regulation : HCA Regulations under OHSA (2021). South Africa's Waste Act (Act 59 of 2008).

Waste treatment methods : Unwanted product may be brushed onto absorbent material, such as newspaper or cardboard, allowed to dry completely in a well-ventilated area, and disposed of via waste collection. Incineration at licensed facilities must occur in a hazardous waste incinerator with air pollution control systems.

Sewage disposal recommendations : Do not dispose of waste into sewer or stormwater systems.

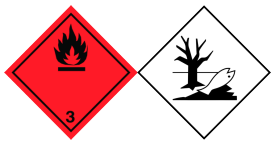
Product/Packaging disposal recommendations : Recycle or dispose of in compliance with current legislation.

Ecological waste information : The waste of the product should be considered as hazardous as the product itself, with the likelihood of impacting the environment in the same way. Consider the handling and disposal of the waste as defined by the product itself.

Additional information : Flammable vapours may accumulate in the container.

SECTION 14: Transport information

In accordance with SANS / UN RTDG / IMDG / IATA

SANS	UN RTDG	IMDG	IATA
14.1. UN number			
1263	1263	1263	1263
14.2. UN Proper Shipping Name			
PAINT RELATED MATERIAL	PAINT RELATED MATERIAL	PAINT RELATED MATERIAL	Paint
Transport document description			
Not applicable	UN 1263 PAINT RELATED MATERIAL, 3, III	UN 1263 PAINT RELATED MATERIAL, 3, III, MARINE POLLUTANT/ENVIRONMENTALLY HAZARDOUS	UN 1263 Paint, 3, III, ENVIRONMENTALLY HAZARDOUS
14.3. Transport hazard class(es)			
3	3	3	3
	 Not applicable		
14.4. Packing group, if applicable			
III	III	III	III

SANS	UN RTDG	IMDG	IATA
14.5. Environmental hazards			
Dangerous for the environment : Yes	Dangerous for the environment : Yes	Dangerous for the environment : Yes Marine pollutant : Yes	Dangerous for the environment : Yes
No supplementary information available			

14.6. Special precautions for user

SANS

Special provisions (SANS)	:	163, 187, 223
Limited quantities (SANS)	:	5 L
Excepted quantities (SANS)	:	E1
Packagings, large packagings and IBCs Packing instructions (SANS)	:	P001, IBC03, LP01
Packagings, large packagings and IBCs Special packing instructions (SANS)	:	PP1
Portable tank and bulk containers instructions (SANS)	:	T2
Portable tank and bulk container special provisions (SANS)	:	TP1, TP29

UN RTDG

Special provisions (UN RTDG)	:	163, 223, 367
Limited quantities (UN RTDG)	:	5L
Excepted quantities (UN RTDG)	:	E1
Packing instruction (UN RTDG)	:	P001, IBC03, LP01
Special packing provisions (UN RTDG)	:	PP1
Portable tank and bulk container special instructions (UN RTDG)	:	T2
Portable tank and bulk container special provisions (UN RTDG)	:	TP1, TP29

IMDG

Special provisions (IMDG)	:	163, 223, 367, 955
Limited quantities (IMDG)	:	5 L
Excepted quantities (IMDG)	:	E1
Packing instructions (IMDG)	:	P001, LP01
Special packing provisions (IMDG)	:	PP1
IBC packing instructions (IMDG)	:	IBC03
Tank instructions (IMDG)	:	T2
Tank special provisions (IMDG)	:	TP1, TP29
EmS-No. (Fire)	:	F-E - FIRE SCHEDULE Echo - NON-WATER-REACTIVE FLAMMABLE LIQUIDS
EmS-No. (Spillage)	:	S-E - SPILLAGE SCHEDULE Echo - FLAMMABLE LIQUIDS, FLOATING ON WATER
Stowage category (IMDG)	:	A
Properties and observations (IMDG)	:	Miscibility with water depends upon the composition.

IATA

PCA Excepted quantities (IATA)	:	E1
PCA Limited quantities (IATA)	:	Y344
PCA limited quantity max net quantity (IATA)	:	10L
PCA packing instructions (IATA)	:	355
PCA max net quantity (IATA)	:	60L
CAO packing instructions (IATA)	:	366
CAO max net quantity (IATA)	:	220L
Special provisions (IATA)	:	A3, A72, A192
ERG code (IATA)	:	3L

14.7. Transport in bulk according to IMO instructions

Not applicable

SECTION 15: Regulatory information

15.1. National regulations

15.1.1. OCCUPATIONAL HEALTH AND SAFETY ACT, 1993

Prohibited Hazardous Chemical Agents
Not regulated

15.1.2. National Environmental Management Act, 1998

Regulation No. 51358 (Prior Informed Consent Procedure Regulations, 2024)
Not regulated

15.2. Safety, health, and environmental national regulations specific for the product

State or local regulations : This product complies with South African legal lead limit of 90ppm or less.

SECTION 16: Other information

Issue date : 11/07/2023
Revision date : 15/10/2026
Supersedes : 15/10/2026

Full text of H-statements:	
H225	Highly flammable liquid and vapour
H226	Flammable liquid and vapour
H302	Harmful if swallowed
H304	May be fatal if swallowed and enters airways
H311	Toxic in contact with skin
H312	Harmful in contact with skin
H315	Causes skin irritation
H317	May cause an allergic skin reaction
H319	Causes serious eye irritation
H330	Fatal if inhaled
H331	Toxic if inhaled
H332	Harmful if inhaled
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled
H335	May cause respiratory irritation
H336	May cause drowsiness or dizziness
H340	May cause genetic defects
H350	May cause cancer
H360	May damage fertility or the unborn child
H361	Suspected of damaging fertility or the unborn child
H370	Causes damage to organs
H373	May cause damage to organs through prolonged or repeated exposure
H400	Very toxic to aquatic life
H401	Toxic to aquatic life

Full text of H-statements:	
H410	Very toxic to aquatic life with long lasting effects
H411	Toxic to aquatic life with long lasting effects

Safety Data Sheet (SDS), South Africa (HCA)

This 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.