Sikaflex-221



SDS Number: Version **Revision Date:** Date of last issue: 2021/01/19 2021/07/11 000000601552 Date of first issue: 2015/12/10 4.0

Section 1: Identification

Product name Sikaflex-221

Product code : 000000601552

Manufacturer or supplier's details

Company : Sika (NZ) Ltd.

85-91 Patiki Road

Avondale

Auckland AKL 1026

Telephone : +64 9 820 2900 : 0800 734 607

Emergency telephone num-

ber

Telefax : +64 9 828 4091 E-mail address : info@nz.sika.com

Recommended use of the chemical and restrictions on use

Product use : Sealant/adhesive

Section 2: Hazard identification

GHS Classification

Flammable Liquids 3.1D

Skin irritation 6.3B

Respiratory sensitisation 6.5A

Skin sensitisation 6.5B

Carcinogenicity 6.7B

Toxic to Reproduction 6.8B

Specific Target Organ Toxicity: 6.9B

(Oral)

Specific Target Organ Toxicity: 6.9B (Central nervous system)

(Inhalation)

GHS label elements

Hazard pictograms

Signal word Danger

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Hazard statements : H227 Combustible liquid.

H316 Causes mild skin irritation.

H317 May cause an allergic skin reaction.

H334 May cause allergy or asthma symptoms or breathing

difficulties if inhaled.

H351 Suspected of causing cancer.

H361 Suspected of damaging fertility or the unborn child.

H371 May cause damage to organs if swallowed. H371 May cause damage to organs if inhaled.

H373 May cause damage to organs (Central nervous system)

through prolonged or repeated exposure if inhaled.

Precautionary statements

Prevention:

P201 Obtain special instructions before use.

P202 Do not handle until all safety precautions have been read and understood.

P210 Keep away from heat/ sparks/ open flames/ hot surfaces. No smoking.

P260 Do not breathe dust/ fume/ gas/ mist/ vapours/ spray.

P264 Wash skin thoroughly after handling.

P270 Do not eat, drink or smoke when using this product.

P272 Contaminated work clothing should not be allowed out of the workplace.

P280 Wear protective gloves/ protective clothing/ eye protection/ face protection.

Response:

P302 + P352 IF ON SKIN: Wash with plenty of soap and water. P304 + P341 IF INHALED: If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing.

P308 + P313 IF exposed or concerned: Get medical advice/attention.

P309 + P311 IF exposed or if you feel unwell: Call a POISON CENTER or doctor/ physician.

P321 Specific treatment (see supplemental first aid instructions on this label).

P333 + P313 If skin irritation or rash occurs: Get medical advice/ attention.

P363 Wash contaminated clothing before reuse.

P370 + P378 In case of fire: Use dry sand, dry chemical or alcohol-resistant foam for extinction.

Storage:

P403 + P235 Store in a well-ventilated place. Keep cool. P405 Store locked up.

Disposal:

P501 Dispose of contents/ container to an approved waste disposal plant.

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Other hazards which do not result in classification

None known.

Section 3: Composition/information on ingredients

Substance / Mixture : Mixture

Components

Chemical name	CAS-No.	Concentration (% w/w)
xylene	1330-20-7	>= 1 -< 2.5
Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)	64742-82-1	>= 1 -< 2.5
4,4'-methylenediphenyl diisocyanate	101-68-8	>= 0.1 -< 1

Section 4: First-aid measures

General advice : Move out of dangerous area.

Consult a physician.

Show this safety data sheet to the doctor in attendance.

If inhaled : Move to fresh air.

Consult a physician after significant exposure.

In case of skin contact : Take off contaminated clothing and shoes immediately.

Wash off with soap and plenty of water. If symptoms persist, call a physician.

In case of eye contact : Remove contact lenses.

Keep eye wide open while rinsing.

If eye irritation persists, consult a specialist.

If swallowed : Clean mouth with water and drink afterwards plenty of water.

Do not give milk or alcoholic beverages.

Never give anything by mouth to an unconscious person.

Most important symptoms and effects, both acute and

delayed

No known significant effects or hazards.

See Section 11 for more detailed information on health effects

and symptoms.

Causes mild skin irritation.

May cause an allergic skin reaction.

May cause allergy or asthma symptoms or breathing difficul-

ties if inhaled.

Suspected of causing cancer.

Suspected of damaging fertility or the unborn child.

May cause damage to organs if swallowed. May cause damage to organs if inhaled.

May cause damage to organs through prolonged or repeated

exposure if inhaled.

Notes to physician : Treat symptomatically.

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Section 5: Fire-fighting measures

Suitable extinguishing media Carbon dioxide (CO2)

Unsuitable extinguishing

media

Water

Hazardous combustion prod: :

No hazardous combustion products are known

Specific extinguishing meth-

Standard procedure for chemical fires.

Special protective equipment :

for firefighters

In the event of fire, wear self-contained breathing apparatus.

Section 6: Accidental release measures

Personal precautions, protec- :

tive equipment and emergency procedures

Use personal protective equipment. Deny access to unprotected persons.

Environmental precautions

Do not flush into surface water or sanitary sewer system. If the product contaminates rivers and lakes or drains inform

respective authorities.

Methods and materials for

containment and cleaning up

Soak up with inert absorbent material (e.g. sand, silica gel,

acid binder, universal binder, sawdust).

Keep in suitable, closed containers for disposal.

Section 7: Handling and storage

Advice on protection against

fire and explosion

Normal measures for preventive fire protection.

Advice on safe handling Avoid exceeding the given occupational exposure limits (see

section 8).

Do not get in eyes, on skin, or on clothing. For personal protection see section 8.

Smoking, eating and drinking should be prohibited in the ap-

plication area.

Follow standard hygiene measures when handling chemical

products

Handle in accordance with good industrial hygiene and safety Hygiene measures

practice.

When using do not eat or drink. When using do not smoke.

Wash hands before breaks and at the end of workday.

Conditions for safe storage Store in original container.

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Keep in a well-ventilated place. Observe label precautions.

Store in accordance with local regulations.

Section 8: Exposure controls/personal protection

Components with workplace control parameters

Components	CAS-No.	Value type (Form of exposure)	Control parameters / Permissible concentration	Basis	
xylene	1330-20-7	WES-TWA	50 ppm 217 mg/m3	NZ OEL	
Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)	64742-82-1	WES-TWA	300 ppm 890 mg/m3	NZ OEL	
		WES-STEL	500 ppm 1,480 mg/m3	NZ OEL	
4,4'-methylenediphenyl diiso- cyanate	101-68-8	WES-TWA	0.02 mg/m3 (NCO)	NZ OEL	
	Further information: Skin sensitiser, Respiratory sensitiser				
		WES-STEL	0.07 mg/m3 (NCO)	NZ OEL	

Biological occupational exposure limits

Components	CAS-No.	Control	Biological	Sampling	Permissible	Basis
		parameters	specimen	time	concentration	
xylene	1330-20-7	Methylhip- puric acid	Urine	End of shift	1.5 g/l	NZ BEI
4,4'-methylenediphenyl diisocyanate	101-68-8	4,4- Diaminodi- phenyl	Urine	End of exposure or end of shift	10 μg/g cre- atinine	NZ BEI

Personal protective equipment

Respiratory protection : Use respiratory protection unless adequate local exhaust

ventilation is provided or exposure assessment demonstrates that exposures are within recommended exposure guidelines. The filter class for the respirator must be suitable for the max-

imum expected contaminant concentration

(gas/vapour/aerosol/particulates) that may arise when handling the product. If this concentration is exceeded, self-

contained breathing apparatus must be used.

Hand protection : Chemical-resistant, impervious gloves complying with an

approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is nec-

essary.

Eye protection : Safety eyewear complying with an approved standard should

be used when a risk assessment indicates this is necessary.

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Skin and body protection : Choose body protection in relation to its type, to the concen-

tration and amount of dangerous substances, and to the spe-

cific work-place.

Section 9: Physical and chemical properties

Appearance : paste

Colour : various

Odour : characteristic

Odour Threshold : No data available

pH : Not applicable

Melting point/range / Freezing :

point

No data available

Boiling point/boiling range : No data available

Flash point : ca. 64.6 °C (148.3 °F)

(Method: closed cup)

Evaporation rate : No data available

Flammability (solid, gas) : No data available

Upper explosion limit / Upper

flammability limit

No data available

Lower explosion limit / Lower :

flammability limit

No data available

Vapour pressure : 0.01 hPa

Relative vapour density : No data available

Density : 1.26 g/cm3 (23 °C (73 °F))

Solubility(ies)

Water solubility : insoluble

Solubility in other solvents : No data available

Partition coefficient: n-

octanol/water

: No data available

Auto-ignition temperature : No data available

Decomposition temperature : No data available

Viscosity

Viscosity, dynamic : No data available

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Viscosity, kinematic : ca. $> 20.5 \text{ mm2/s} (40 ^{\circ}\text{C} (104 ^{\circ}\text{F}))$

Explosive properties : No data available

Oxidizing properties : No data available

Volatile organic compounds : Directive 2010/75/EU of 24 November 2010 on industrial

emissions (integrated pollution prevention and control) Volatile organic compounds (VOC) content: 4.1% w/w

Section 10: Stability and reactivity

Reactivity : No dangerous reaction known under conditions of normal use.

Chemical stability : The product is chemically stable.

Possibility of hazardous reac- :

tions

No hazards to be specially mentioned.

Conditions to avoid : No data available

Incompatible materials : No data available

Section 11: Toxicological information

Acute toxicity

Not classified based on available information.

Components:

xylene:

Acute oral toxicity : LD50 Oral (Rat): 3,523 mg/kg

Acute dermal toxicity : LD50 Dermal (Rabbit): 1,700 mg/kg

4,4'-methylenediphenyl diisocyanate:

Acute oral toxicity : LD50 Oral (Rat): > 4,700 mg/kg

Method: OECD Test Guideline 401

Acute inhalation toxicity : LC50: 1.5 mg/l

Exposure time: 4 h

Test atmosphere: dust/mist Method: Expert judgement

Skin corrosion/irritation

Causes mild skin irritation.

Serious eye damage/eye irritation

Not classified based on available information.

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Respiratory or skin sensitisation

Skin sensitisation

May cause an allergic skin reaction.

Respiratory sensitisation

May cause allergy or asthma symptoms or breathing difficulties if inhaled.

Chronic toxicity

Germ cell mutagenicity

Not classified based on available information.

Carcinogenicity

Suspected of causing cancer.

Reproductive toxicity

Suspected of damaging fertility or the unborn child.

STOT - single exposure

May cause damage to organs if swallowed.

May cause damage to organs if inhaled.

STOT - repeated exposure

May cause damage to organs (Central nervous system) through prolonged or repeated exposure if inhaled.

Aspiration toxicity

Not classified based on available information.

Section 12: Ecological information

Ecotoxicity

Components:

xylene:

plants

Toxicity to algae/aquatic

EC50 (Pseudokirchneriella subcapitata (green algae)): 2.2

mg/l

Exposure time: 72 h

Method: OECD Test Guideline 201

Toxicity to fish (Chronic tox-

icity)

NOEC (Oncorhynchus mykiss (rainbow trout)): > 1.3 mg/l

Exposure time: 56 d

Toxicity to daphnia and other :

aquatic invertebrates (Chron-

ic toxicity)

NOEC (Daphnia (water flea)): 1.17 mg/l

Exposure time: 7 d

Persistence and degradability

No data available

Bioaccumulative potential

No data available

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Mobility in soil

No data available

Other adverse effects

Product:

Additional ecological infor-

mation

: There is no data available for this product.

Section 13: Disposal considerations

Disposal methods

Waste from residues : The product should not be allowed to enter drains, water

courses or the soil.

Do not contaminate ponds, waterways or ditches with chemi-

cal or used container.

Send to a licensed waste management company.

Contaminated packaging : Empty remaining contents.

Dispose of as unused product. Do not re-use empty containers.

Do not burn, or use a cutting torch on, the empty drum.

Section 14: Transport information

International Regulations

UNRTDG

Not regulated as a dangerous good

IATA-DGR

Not regulated as a dangerous good

IMDG-Code

Not regulated as a dangerous good

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Not applicable for product as supplied.

National Regulations

NZS 5433

Not regulated as a dangerous good

Section 15: Regulatory information

Safety, health and environmental regulations/legislation specific for the substance or mixture

International Chemical Weapons Convention (CWC) : Not applicable

Schedules of Toxic Chemicals and Precursors

HSNO Approval Number

HSR002680

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HSW Controls

Certified handler certificate not required.

Tracking hazardous substance not required.

Refer to the Health and Safety at Work (Hazardous Substances) Regulations 2017, for further information.

The components of this product are reported in the following inventories:

NZIoC : On the inventory, in compliance with the inventory

Section 16: Other information

Full text of other abbreviations

NZ BEI : New Zealand. Biological Exposure Indices

NZ OEL : New Zealand. Workplace Exposure Standards for Atmospher-

ic Contaminants

NZ OEL / WES-TWA : Workplace Exposure Standard - Time Weighted average
NZ OEL / WES-STEL : Workplace Exposure Standard - Short-Term Exposure Limit

ADG : Australian Dangerous Goods Code.

ADR : European Agreement concerning the International Carriage of

Dangerous Goods by Road

CAS : Chemical Abstracts Service
DNEL : Derived no-effect level

EC50 : Half maximal effective concentration

GHS : Globally Harmonized System

IATA : International Air Transport Association

IMDG : International Maritime Code for Dangerous Goods

LD50 : Median lethal dosis (the amount of a material, given all at

once, which causes the death of 50% (one half) of a group of

test animals)

LC50 : Median lethal concentration (concentrations of the chemical in

air that kills 50% of the test animals during the observation

period)

MARPOL : International Convention for the Prevention of Pollution from

Ships, 1973 as modified by the Protocol of 1978

OEL : Occupational Exposure Limit

PBT : Persistent, bioaccumulative and toxic PNEC : Predicted no effect concentration

REACH : Regulation (EC) No 1907/2006 of the European Parliament

and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH), establishing a European Chemicals Agency

SVHC : Substances of Very High Concern

vPvB : Very persistent and very bioaccumulative

The information contained in this Safety Data Sheet corresponds to our level of knowledge at the time of publication. All warranties are excluded. Our most current General Sales Conditions shall apply. Please consult the product data sheet prior to any use and processing.

Changes as compared to previous version!

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