GEARTH

SAFETY DATA SHEET
ClearScale

GHS REV 10

1 Identification

Product identifier	ClearScale
Other means of identification	No data available
Recommended use	Eco-friendly descaling and rust remover — ready-to-use blend of organic and food-grade acids with readily biodegradable anionic and non-ionic surfactants.
Restrictions on use	No data available
Supplier	GEARTH (Pty) Ltd, 96 Lazy River Road, Centurion 0157, Gauteng, South Africa
Telephone	012 004 8183 | info@gearth.co.za
Emergency telephone number	**066 214 2274 (24 hours)**

2 Hazards identification

2.1 Classification of the substance or mixture

GHS classification	Source classification (SANS 10234): Flammable, Category 2; Eye damage / irritation, Category 2; Specific target organ toxicity single exposure, Category 3.

2.2 Label elements

Hazard pictograms	No data available
Signal word	Warning / Danger (source states both).
Hazard statements	H319 Causes serious eye irritation. H336 May cause drowsiness or dizziness.
Precautionary — prevention	P233 Keep container tightly closed. P261 Avoid breathing mist, vapours or sprays. P280 Wear eye / face protection.
Precautionary — response	P337 + P313 If eye irritation persists: get medical advice / attention. P305 + P351 + P338 IF IN EYES: rinse cautiously with water for several minutes; remove contact lenses if present and easy to do; continue rinsing.
Precautionary — storage	P403 + P233 + P235 Store in a well-ventilated place; keep container tightly closed; keep cool.
Precautionary — disposal	P501 Dispose of contents / packaging to an approved waste disposal plant.

2.3 Other hazards

OTHER HAZARDS DISCLOSURE

Strongly acidic compound (pH 1 – 2 as supplied): will irritate and dry sensitive skin; neutralise with alkalis prior to disposal. May cause a slippery spill (source data).

3 Composition / information on ingredients

Ingredient	CAS no.	EC no.	Conc. % (w/w)	Classification
Phosphoric acid (food grade)	7664-38-2	No data available	<10	R22 / R36 (source, pre-GHS phrases)
Total			**100**	

Exact composition percentages are withheld as a trade secret in accordance with the HCA Regulations, 2021. The classification of withheld components is reflected above.

4 First-aid measures

4.1 Description of first-aid measures

Inhalation	Fresh air.
Skin contact	Remove contaminated clothing, rinse with water and/or wash with soap. Apply skin cream to dry skin if required.
Eye contact	Rinse with water for 15 minutes, keeping eyelids open. If discomfort does not subside within 30 minutes, seek further medical attention.
Ingestion	Do not induce vomiting; keep the person calm and seek medical attention.

4.2 Most important symptoms and effects, both acute and delayed

Symptoms and effects	Eyes: discomfort, irritation, redness and pain. Skin: irritation and drying of sensitive skin. Ingestion: discomfort and pain with possible nausea and vomiting. Inhalation: may cause shortness of breath.

4.3 Indication of any immediate medical attention and special treatment needed

Medical attention	Never give anything by mouth to, or induce vomiting in, an unconscious person. Direct treatment at control of symptoms and the clinical condition of the patient; symptoms may re-occur or change over time — re-consult a physician in that event.

5 Fire-fighting measures

5.1 Extinguishing media

Suitable extinguishing media	Dry powder, water or foam agent.
Unsuitable extinguishing media	No data available

5.2 Special hazards arising from the substance or mixture

Specific hazards / hazardous combustion products	None known.

5.3 Advice for firefighters

Protective equipment for firefighters	No data available

6 Accidental release measures

Personal precautions, protective equipment and emergency procedures	Wear gloves and eye / face protection (see Section 8).
Environmental precautions	Do not discharge large volumes into sewers.
Methods and material for containment and cleaning up	Dry sand; discharge in accordance with local regulations. Small spills: transfer mechanically to a labelled, sealable container for recovery or safe disposal; soak up residues with absorbent material. Large spills: transfer by mechanical means (e.g. vacuum truck) to a salvage tank for recovery or safe disposal.

7 Handling and storage

7.1 Precautions for safe handling

Safe handling	Normal handling.

7.2 Conditions for safe storage, including any incompatibilities

Storage conditions	Cool, well-ventilated storage; avoid high temperature; keep container sealed and marked at all times; keep away from naked flame.
Packaging	5 L, 25 L, 200 L and 1000 L.
Shelf life	No data available
Incompatibilities	Avoid contact with alkalis.

8 Exposure controls / personal protection

8.1 Control parameters — occupational exposure limits

Substance	OEL type	Value	Source
Product as supplied	—	None established	HCA Regs 2021 Annexure 2

8.2 Appropriate engineering controls

Engineering controls	No specific or special measures required; foot shower optional.

8.3 Individual protection measures

Eye / face protection	Face shield or goggles.
Skin / hand protection	Wear gloves; full PPE. Glove material: No data available; breakthrough time: No data available
Respiratory protection	No data available Filter type: Not applicable
Thermal hazards	No data available

9 Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state	Viscous liquid (some separation may occur)
Colour	Dark brown
Odour	Pine
Melting point / freezing point	Not applicable per source
Boiling point or initial boiling point and boiling range	>100 °C
Flammability	No data available
Lower and upper explosion limit / flammability limit	Not applicable per source
Flash point	Not applicable per source
Auto-ignition temperature	Not applicable per source
Decomposition temperature	No data available
pH (concentration and temperature stated)	1 – 2 (as supplied)
Kinematic viscosity	No data available
Solubility	Soluble in water
Partition coefficient n-octanol/water (log Kow)	No data available
Vapour pressure	Not applicable per source (at 20 °C)
Density and/or relative density	Specific gravity 1.05 – 1.20
Relative vapour density	No data available
Particle characteristics	Not applicable

9.2 Other information

Explosive properties	No data available
Oxidising properties	No data available
Bulk density	No data available
Active solids	No data available

10 Stability and reactivity

Reactivity	No data available
Chemical stability	Stable at ambient conditions.
Possibility of hazardous reactions	No data available
Conditions to avoid	High temperatures; naked flames.
Incompatible materials	Alkalis.
Hazardous decomposition products	None known.

11 Toxicological information

Likely routes of exposure	Eye and skin contact; ingestion; inhalation of mists.
Symptoms related to exposure	Eyes: discomfort, irritation, redness, pain. Skin: irritation and drying of sensitive skin. Ingestion: discomfort and pain, possible nausea and vomiting. Inhalation: none known or reported; may cause shortness of breath.
Delayed and chronic effects	Not known or reported; if ingested or in contact with eyes, consult a doctor (source data).

Numerical measures of toxicity

Endpoint	Species	Route	Value
No data available	No data available	No data available	No data available

Source reports qualitative health-effects statements only; no numerical toxicity values.

Acute toxicity — dermal	No data available
Acute toxicity — inhalation	No data available
Skin corrosion / irritation	Will cause irritation and drying of sensitive skin (source data).
Serious eye damage / irritation	Eye damage / irritation Category 2 (source classification).
Respiratory sensitisation	No data available
Skin sensitisation	No data available
Germ cell mutagenicity	No data available
Carcinogenicity	No data available
Reproductive toxicity	No data available
STOT — single exposure	Category 3 (source classification).
STOT — repeated exposure	No data available
Aspiration hazard	No data available

12 Ecological information

Aquatic toxicity

Species	Endpoint	Value	Duration
No data available	No data available	No data available	No data available

Source states ecotoxicity not tested.

Persistence and degradability — method	No data available
Persistence and degradability — result	Contains readily biodegradable ingredients; the product can be successfully bioremediated.
Bioaccumulative potential	Not likely (source statement).
Mobility in soil	No data available
Other adverse effects	No data available

13 Disposal considerations

Waste residues	Recover or recycle if possible. The waste generator is responsible for determining toxicity and physical properties to set proper waste classification and disposal methods.
Disposal methods	In accordance with local regulations; if disposal is by a third party, use an authorised and reputable service provider. Neutralise with alkalis prior to disposal.
Contaminated packaging	Drain container thoroughly, then vent in a safe place away from sparks and fire. Do not puncture, cut or weld unclean drums; send to a drum recoverer or metal reclaimer.
Waste classification (NEM:WA 59 of 2008, GN R635)	No data available

14 Transport information

Mode	UN no.	Proper shipping name	Class	PG
Road (SANS 10228 / ADR)	Not applicable per source	No data available	8 (source ADR/RID data)	No data available
Rail (RID)	Not applicable per source	No data available	8 (source ADR/RID data)	No data available
Sea (IMDG)	No data available	No data available	No data available	No data available
Air (IATA)	No data available	No data available	No data available	No data available

Marine pollutant	No data available
Transport in bulk (IMO instruments)	Not applicable
Special precautions for user	May cause a slippery spill (source data). Source transport data covers road and rail only.

15 Regulatory information

Safety, health and environmental regulations specific to the product	Occupational Health and Safety Act 85 of 1993; Regulations for Hazardous Chemical Agents, 2021; NEM:WA 59 of 2008; None identified
NRCS VC 8054 status	No data available
Ecolabel certification	No data available
Chemical safety assessment	No data available

16 Other information

Date of preparation	18 August 2026
Latest revision	Rev 1.0, 18 August 2026
Summary of changes	First GEARTH issue (Rev 1.0). Safety content transferred unchanged from the source manufacturer's MSDS (revised 12 March 2026); no data re-tested or re-derived.
Full text of hazard (H) statements	H319 Causes serious eye irritation. H336 May cause drowsiness or dizziness.
Full text of precautionary (P) statements	P233 Keep container tightly closed. P261 Avoid breathing mist, vapours or sprays. P280 Wear eye / face protection. P305+P351+P338 IF IN EYES: rinse cautiously with water for several minutes; remove contact lenses if present and easy to do; continue rinsing. P337+P313 If eye irritation persists: get medical advice / attention. P403+P233+P235 Store in a well-ventilated place; keep container tightly closed; keep cool. P501 Dispose of contents / packaging to an approved waste disposal plant.
Key to abbreviations	GHS — Globally Harmonized System; OEL — occupational exposure limit; STOT — specific target organ toxicity; PG — packing group; SG — specific gravity; CAS — Chemical Abstracts Service; HCA — hazardous chemical agents.
References and data sources	Source manufacturer MSDS (revised 12 March 2026); GEARTH–source product mapping register (2026).
Classification method	Classified by the source manufacturer per SANS 10234 (GHS classification and labelling of chemicals). Alignment with UN GHS Rev 10 to be confirmed.
Training advice	Personnel using this product must be trained and advised on the best, safest and most effective means of application (source requirement).
Disclaimer	This information is based on present knowledge and describes the product for the purposes of health, safety and environmental requirements only. It does not constitute a guarantee of the properties of the product. Final determination of suitability for any use is the sole responsibility of the user.

SIGN-OFF

Prepared by	GEARTH (Pty) Ltd
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Supersedes	None — first GEARTH issue
Next review	August 2028
Data sources	Source manufacturer MSDS (revised 12 March 2026); GEARTH product mapping register (2026)