

SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

1.1 Product identifier

Trade name: Ventana Plant Science pH UP
Brand: GrowersHouse, Ventana Plant Science

1.2 Relevant identified uses of the substance or mixture and uses advised against

Relevant identified uses: Industrial or Commercial Use only.
Uses advised against: All other uses.

1.3 Details of the supplier of the Safety Data Sheet

GrowersHouse
3635 E. 34th St
Tucson, AZ 85713
USA

Phone: (855) 289-1441
E-mail: staff@growerhouse.com

SECTION 2: HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture

Classification according to OSHA Hazardous Communication Standard 29 CFR 910.1200.

Acute toxicity (oral), category 4
Skin corrosive, category 1
Eye damaging, category 1
Respiratory irritation, category 1

2.2 Label elements

Labelling according to OSHA Hazardous Communication Standard 29 CFR 910.1200:



Signal word: Danger

Hazard statements:

H302	Harmful if swallowed.
H314	Causes severe skin burns and eye damage.
H318	Causes serious eye damage.
H335	May cause respiratory irritation.

Precautionary statements:

P220 Keep/Store away from clothing/combustible materials.
P221 Take any precaution to avoid mixing with combustibles.
P261 Avoid breathing dust/ fume/ gas/ mist/ vapors/ spray.
P264 Wash hands thoroughly after handling.
P270 Do not eat, drink or smoke when using this product.
P304 + P340 IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.

P330 Rinse mouth.

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.

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

P303 + P361 + P353 IF ON SKIN (or hair): Remove/ Take off immediately all contaminated clothing.

Rinse skin with water/ shower.

P332 + P313 If skin irritation occurs: Get medical advice/ attention.

P362 Take off contaminated clothing and wash before reuse.

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

P405 Store locked up.

2.3 Other hazards

None known.

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

This product is a mixture meeting the criteria for classification in accordance with OSHA Hazardous Communication Standard 29 CFR 1910.1200.

Ingredients:

Name	CAS No.	GHS classification	% (w/v)
Potassium hydroxide	1310-58-3	Skin Corr. 1, H314	Proprietary
Proprietary	Proprietary	Not classified.	>55

SECTION 4: FIRST AID MEASURES

4.1 Description of first aid measures

Following inhalation: If inhaled, remove victim to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical attention.

Following skin contact: In case of contact, immediately flush skin with plenty of water. Remove contaminated clothing and shoes. Wash clothing before reuse. Thoroughly clean shoes before reuse.

Following eye contact: In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Get medical attention immediately.

Following ingestion: If swallowed, DO NOT induce vomiting unless directed to do so by medical personnel. Get medical attention immediately. If the victim is fully conscious, give a cupful of water. Never give anything by mouth to an unconscious person. Rinse mouth.

Protection of first aider: Not applicable.

4.2 Most important symptoms and effects

Symptoms: The known symptoms and effects are described in section 2.2 of this SDS.

Risks: Untreated symptoms may result in additional health risks.

4.3 Indication of any immediate medical and special treatment

The physician may contact the national poison center for advice.

SECTION 5: FIREFIGHTING MEASURES

5.1 Extinguishing media

Suitable extinguishing media: Dry chemical, CO₂, water spray or alcohol-resistant foam.

Unsuitable extinguishing media: No data available.

5.2 Specific hazards arising from mixture

The product causes burns of eyes, skin and mucous membranes.

5.3 Advice for fire fighters

Special protective equipment for firefighters:

As in any fire, wear self-contained breathing apparatus pressure-demand and full protective gear.

5.4 Other information

No other information available.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 NOTES FOR NON-EMERGENCY PERSONNEL: Put on appropriate personal protective equipment (see section 8).

6.2 ENVIRONMENTAL PRECAUTIONS: Should not be released into the environment. Do not allow material to contaminate the groundwater system. Do not flush into surface water or the sanitary sewer system.

Notes for those trained to participate in an emergency:

6.3 ACCIDENTAL RELEASE MEASURES: Contain spilled material if possible.

SECTION 7: HANDLING AND STORAGE

7.1 Precautions for safe handling

Wash thoroughly after handling. Do not allow water to get into the container because of a violent reaction. Minimize dust generation and accumulation. Do not get in the eyes, on the skin, or on clothing. Keep the container tightly closed. Avoid ingestion and inhalation. Discard contaminated shoes. Use only with adequate ventilation.

7.2 Conditions for safe storage, including any incompatibilities

Storage Conditions: Keep containers tightly closed in a dry, cool, and well-ventilated place. Protect from moisture. Corrosive area. Incompatible Materials. Water. Metals. Acids.

Incompatible materials: See section 10.

7.3 Specific end uses See section 1.2.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters

Relevant DNELs and other threshold levels				
Endpoint	Threshold level	Protection goal, route of exposure	Used in	Exposure time
DNEL	1 mg/m ³	human, inhalatory	worker (industry)	chronic - local effects

8.2 Exposure controls

Engineering controls:

Use local exhaust ventilation, or other engineering controls to maintain airborne levels below exposure limit requirements or guidelines. If there are no applicable exposure limit requirements or guidelines, general ventilation should be sufficient for most operations. Local exhaust ventilation may be necessary for some operations.

Personal Protective equipment:

Hand: Wear suitable gloves. Chemical protection gloves are suitable, which are tested according to EN 374. Check leak-tightness/impermeability prior to use. For special purposes, it is recommended to check the resistance to chemicals of the protective gloves mentioned above together with the supplier of these gloves. The times are approximate values from measurements at 22 ° C and permanent contact. Increased temperatures due to heated substances, body heat etc. and a reduction of the effective layer thickness by stretching can lead to a considerable reduction of the breakthrough time. If in doubt, contact manufacturer. At an approx. 1.5 times larger / smaller layer thickness, the respective breakthrough time is doubled / halved. The data apply only to the pure substance. When transferred to substance mixtures, they may only be considered as a guide.

Body protection: Appropriate protective clothing should be worn to prevent skin contact.

Eye: Use safety goggles with side protection. Wear face protection.

Respiratory: Respiratory protection necessary at: Dust formation. Particulate filter device (EN 143). P2 (filters at least 94 % of airborne particles, colour code: White).

Other measures: No statement available.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Liquid
Color:	Clear/slightly hazy
Odor:	Odorless
Odor threshold:	No data available
pH:	14
Melting point/range:	-33 °C
Boiling point/range:	133 °C
Flash point:	not applicable
Evaporation rate:	No data available
Flammability:	non-combustible
Upper/lower flammability or explosive limits:	No data available
Vapor pressure:	6.4 mmHg (25 °C)
Vapor density:	No data available
Relative Density:	1.283 - 1.572
Solubility(ies):	completely miscible (water)
Partition coefficient (n-octanol/water):	No data available
Auto-ignition temperature:	No data available
Decomposition temperature:	not relevant
Viscosity:	No data available
Explosive properties:	No data available
Oxidizing properties:	No data available

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity

Yes.

10.2 Chemical stability

Stable under recommended storage conditions.

10.3 Possibility of hazardous reactions

Polymerization will not occur.

10.4 Conditions to avoid

Avoid moisture.

10.5 Incompatible materials

Heat is generated when mixed with water. Spattering and boiling can occur.

10.6 Hazardous decomposition products

This material decomposes if contaminated, causing fire and possible explosions. Oxygen can be liberate at temperatures above ambient.

SECTION 11: TOXICOLOGICAL INFORMATION

General information:

This product does not contain known human carcinogens.

11.1 Information on toxicological effects

Acute Toxicity:

Harmful if swallowed.

Skin corrosion/irritation:

Cause severe skin burns.

Serious eye damage/irritation:

Causes serious eye damage.

Respiratory or skin sensitization:

May cause respiratory irritation.

Germ cell mutagenicity:

No statements available for any of the ingredients.

Carcinogenicity:

This product does not contain known human carcinogens.

Reproductive toxicity:

No statements available for any of the ingredients.

STOT – single exposure:

No statements available for any of the ingredients.

STOT – repeated exposure:

No statements available for any of the ingredients.

Aspiration hazard:

No statements available for any of the ingredients.

Likely route(s) of exposure:

Skin exposure and eye exposure are the most likely to occur. Accidental ingestion is also possible.

SECTION 12: ECOLOGICAL INFORMATION

General information:

No statements available for any of the ingredients

12.1 Toxicity

No statements available for any of the ingredients.

12.2 Persistence and degradability

Physical- and photochemical elimination:

No statements available for any of the ingredients.

Biodegradation:

No statements available for any of the ingredients.

12.3 Bioaccumulative potential

No statements available for any of the ingredients.

12.4 Mobility in soil**Known/Predicted environmental distribution:**

No statements available for any of the ingredients.

Surface tension:

No statements available for any of the ingredients.

Adsorption/Desorption:

No statements available for any of the ingredients.

12.5 Results of PBT and vPvB assessment

This product does not contain components which are considered to be persistent, bioaccumulative and toxic (PBT) or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

12.6 Other adverse effects

No statements available for any of the ingredients.

SECTION 13: DISPOSAL CONSIDERATIONS**13.1 Waste treatment methods****Product:**

Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. US EPA guidelines for the classification determination are listed in 40 CFR Parts 261.3. Additionally, waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification.

Waste material:

Dispose according to Federal, State, Provincial and Local regulations.

SECTION 14: TRANSPORT INFORMATION**14.1 UN number**

ADR/RID/IDMG/IATA: UN 1814

14.2 UN proper shipping name

ADR/RID/IDMG/IATA: Potassium hydroxide, solution

14.3 Transport hazard class(es)

ADR/RID/IDMG/IATA: 8

14.4 Packing group

ADR/RID/IDMG/IATA: II

14.5 Environmental hazards

ADR/RID/IDMG/IATA: Non-regulated

14.6 Special precautions for user

No statements available.

14.7 Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code

Not applicable, as product is not shipped in bulk.

SECTION 15: REGULATORY INFORMATION

International Inventories

TSCA: Complies

DSL: All components are listed either on the DSL or NDSL.

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List.

US Federal Regulations

SARA 313: Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372.

SARA 311/312 Hazard Categories

Acute health hazard: Yes

Chronic Health Hazard: No

Fire hazard: No

Sudden release of pressure hazard: No

Reactive Hazard: No

CWA (Clean Water Act)

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42).

CERCLA

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material.

U.S. State Regulations

California Prop 65, Safe Drinking Water and Toxic Enforcement Act of 1986 This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

Canada

WHMIS Hazard Class

Not determined.

SECTION 16: OTHER INFORMATION

Further information

The information presented in this Safety Data Sheet (SDS) is accurate to the best of our knowledge at the date of publication. The information given within the SDS is meant solely as a guide for safe handling, use, transportation, processing, storage, release and disposal. In no means can the information within the SDS be considered as a warranty or specification for quality.