OLYMPIC REGION CLEAN AIR AGENCY

2940 Limited Lane NW - Olympia, Washington 98502 - 360-539-7610 – Fax 360-491-6308

FORM 1- NOTICE OF CONSTRUCTION

TO CONSTRUCT - INSTALL - ESTABLISH OR MODIFY AN AIR CONTAMINANT SOURCE

Form 1 Instructions:

1. Please complete all the fields below. **This NOC application is considered incomplete until signed.**
2. If the application contains any confidential business information, please complete a Request of Confidentiality of Records (www.orcaa.org/forms).
3. Duty to Correction Application: An applicant has the duty to supplement or correct an application. Any applicant who fails to submit any relevant facts or who has submitted incorrect information in a permit application must, upon becoming aware of such failure or incorrect submittal, promptly submit supplementary factors or corrected information.

Business Name: Capitol City Press Inc.	**For ORCAA use only**
Mailing Address: 2975 37th Ave SW Tumwater WA 98512	File No: 1244 County No: 67 Source No: 104 Application No: 24NOC1687
Physical Address of Project or New Source: Same as mailing	Date Received: Received SEP 2 4 2024 ORCAA
Billing Address: Same as mailing	

Project or Equipment to be installed/established:
Replace one Quickmaster and one plate processor

Anticipated startup date: ___ / ___ / 2023   Is facility currently registered with ORCAA? Yes ☐ No ☐

This project must meet the requirements of the State Environmental Policy Act (SEPA) before ORCAA can issue final approval. Indicate the SEPA compliance option:

- ☐ SEPA was satisfied by ________________ (government agency) on ___/___/___ (date) - Include a copy of the SEPA determination
- ☐ SEPA threshold determination by ________________ (government agency) is pending - Include a copy of the environmental checklist
- ☐ ORCAA is the only government agency requiring a permit - Include ORCAA Environmental Checklist
- ☐ This project is exempt from SEPA per ________________ (WAC citation).

Name of Owner of Business: Mike McKnight		Agency Use Only
Title: President		
Email: mmcknight@capitolcitypress.com	Phone: 3609433556	
Authorized Representative for Application (if different than owner): Jeff White		
Title: IT and Equipment Manager		
Email: jwhite@capitolcitypress.com	Phone: 3607906316	
I hereby certify that the information contained in this application is, to the best of my knowledge, complete and correct.		
Signature of Owner or Authorized Representative: (sign in Blue Ink)		
[signature]	**Date:** 9/23/24	
IMPORTANT: Do not send via email or other electronic means. ORCAA must receive Original, hardcopy, signed application and payment prior to processing application.		

ref cash receipt 4695

FORM 4
FACILITY EMISSIONS SUMMARY

Facility: Capitol City Press

Page of

Instructions: on back.

Emission Unit ID#	TSP	PM-10	SOx	NOx	VOC	CO
Facility Total						

FORM 5
EMISSIONS OF HAZARDOUS AIR POLLUTANTS

Facility: Capitol City Press Emission Unit ID#:______________ Page ___ of___

Pollutant Name	CAS #	Maximum Emission Rate (lbs/hr)	Annual Emission Rate (tons/yr)
Facility Total			

FORM 6
BACT ANALYSIS TABLE

CONTROL OPTION	UNCONTROLLED EMISSION RATE[1] (lbs/hr)	CONTROL EFFICIENCY (% removal)	ANNUAL EMISSION REDUCTIONS[2] (tons)	ANNUALIZED COST RANGE[3] (range $)	RANGE OF COST EFFECTIVENESS ($/ton)	ENERGY, ENVIRONMENTAL ECONOMIC IMPACTS[4] (y/n,)
1.						
2.						
3.						
4.						
5.						

[1] Attach emissions calculations to support uncontrolled emissions rates.
[2] Expected annual emissions reductions should be based on expected operations considering startups, shutdowns, maintenance downtime and effectiveness of the control option under each scenario. All calculations and assumptions should be documented.
[3] Attach economic analysis calculations.
[4] Attach explanation and quantification of any claimed environmental or energy impacts.

Consumables

Technical information
Saphira Thermoplate PN 101

Heidelberg USA, Inc.
1000 Gutenberg Drive
Kennesaw, Georgia 30144
Phone 800 437 7388
info@heidelberg.com
www.heidelberg.com/us

Heidelberg Canada Graphic Equipment Limited
5900 Keaton Crescent
Mississauga, Ontario L5R 3K2
Phone 800 363 4800
ca.customerservice@heidelberg.com
www.heidelberg.com/ca

Saphira® Thermoplate PN 101 is the next generation of thermal two layer positive working plate technology, which has a wide range of applications, especially for commercial and packaging printers.

Saphira Thermoplate PN 101 is designed for longer runs with robust and dependable performance through a wide range of aggressive press conditions, which reduces or eliminates the need to post bake.

Benefits & Features:
- Positive working thermal plate with higher resistance to chemicals
- Proven performer in commercial, packaging and UV printing
- Patented 2 layer coating technology & non ablative
- Excellent visual image contrast & incredible lithographic properties

Ordering Information:
Saphira® Thermoplate PN 101 is available to order online or by contacting your local Heidelberg Consumables Sales Representative.

Technical Specifications:

Plate Type	Positive thermal working plates
Substrate	High quality level grained and anodized aluminum
Spectral Sensitivity	125 mj/cm at 830nm
Lighting Conditions	Daylight
Resolution	AM (1-99%) 200lpi, FM 10 microns (w/ optimized CtP), Hybrid (1-99%) 400lpi/ 20 microns
Available Gauges	6, 8, 12, and 15 gauges
High Run Length	Up to 400,000+* impression unbaked Up to 500,000+* impressions baked
Press Conditions	No special inks or fountain solutions required, UV Link compatible

*depending on the printing conditions

Publishing Information
Printed in Print Media Center Atlanta
Printing: Speedmaster XL 75 Anicolor
Consumables: Saphira

Last update: 08/2016

Subject to technical modifications and other changes.

HEIDELBERG

SAFETY DATA SHEET

Classified in accordance 29 CFR 1910.1200

1. Identification

Product identifier: SU45.CN5000074 Saphira Replenisher Thermal Plate PN 101

Recommended restrictions

Recommended use: Offset plate developer solution
Restrictions on use: Reserved for industrial and professional use.

Manufacturer/Importer/Distributor Information
Manufacturer

Heidelberg USA, Inc□ □ □
1000 Gutenberg Drive
6Kennesaw, GA 30144

Telephone: 1-888-472-9655 prompt 3
Fax: Product Support
E-mail: hus.regulatory@heidelberg.com

Emergency telephone number:

Transport Emergency

Chemtrec: USA/Canada +1 800 424-9300
International: Mexico 800-681-9531

Non-transportation

Health Emergency Phone: +1 303 6235716
Agfa Information Phone: +1 201 4402500

2. Hazard(s) identification

Hazard Classification

Health Hazards

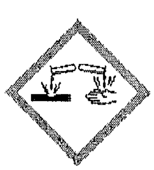
Skin Corrosion/Irritation	Category 1
Serious Eye Damage/Eye Irritation	Category 1

Environmental Hazards

Acute hazards to the aquatic environment	Category 3

Label Elements

Hazard Symbol:



Signal Word: Danger

Hazard Statement: Causes severe skin burns and eye damage.
Harmful to aquatic life.

Precautionary

Statements

Prevention: Do not breathe dust/fume/gas/mist/vapors/spray. Wash face, hands and any exposed skin thoroughly after handling. Avoid release to the environment. Wear protective gloves/protective clothing/eye protection/face protection.

Response: IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water [or shower]. Wash contaminated clothing before reuse. Specific treatment (see supplemental first aid instructions on this label). IF INHALED: Remove person to fresh air and keep comfortable for breathing. Immediately call a POISON CENTER/doctor. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

Storage: Store locked up.

Disposal: Dispose of contents/ container to an approved facility in accordance with local, regional, national and international regulations.

Hazard(s) not otherwise classified (HNOC): None.

3. Composition/information on ingredients

Mixtures

Chemical Identity	Common name and synonyms	CAS number	Content in percent (%)*
Disodium metasilicate	sodium metasilicate.5 aq	6834-92-0	3 - <5%
Sodium octanoate	No data available.	1984-06-1	1 - <5%
Sodium hydroxide	SODIUM HYDROXIDE	1310-73-2	0.1 - <1%
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.	73038-25-2	0.1 - <1%
Ethanediol	GLYCOL	107-21-1	0 - <0.1%

* All concentrations are percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.

The exact concentration has been withheld as a trade secret.

4. First-aid measures

Description of necessary first-aid measures

General information: Get medical attention if symptoms occur.

Inhalation: Move into fresh air and keep at rest. Get medical attention immediately. Show this safety data sheet to the doctor in attendance.

Skin Contact: Immediately flush with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Get medical attention if symptoms occur. Wash contaminated clothing before reuse.

Eye contact: Flush thoroughly with water for at least 15 minutes. Get medical assistance.

Ingestion: Rinse mouth with plenty of water. Call a physician immediately. Show this safety data sheet to the doctor in attendance.

Personal Protection for First-aid Responders: CAUTION! First aid personnel must be aware of own risk during rescue! See Section 8 of the SDS for Personal Protective Equipment.

Most important symptoms and effects, both acute and delayed:

Symptoms: See section 11 of the SDS for additional information on health hazards.

Hazards: See section 11 of the SDS for additional information on health hazards.

Indication of immediate medical attention and special treatment needed

Treatment: Treat symptomatically.

5. Fire-fighting measures

General Fire Hazards: No unusual fire or explosion hazards noted.

Suitable (and unsuitable) extinguishing media

Suitable extinguishing media: Extinguish with foam, carbon dioxide, dry powder or water fog.

Unsuitable extinguishing media: Do not use water jet as an extinguisher, as this will spread the fire.

Special hazards arising from the substance or mixture: During fire, gases hazardous to health may be formed.

Special protective equipment and precautions for fire-fighters

Special fire-fighting procedures: No data available.

Special protective equipment for fire-fighters: Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures: See Section 8 of the SDS for Personal Protective Equipment. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Keep unauthorized personnel away. Avoid breathing dust/fume/gas/mist/vapors/spray. Provide adequate ventilation.

For non-emergency personnel: Use personal protective equipment.

For emergency responders: Warn everybody of potential hazards and evacuate if necessary. Use personal protective equipment.

Methods and material for containment and cleaning up: Prevent further leakage or spillage if safe to do so. Stop the flow of material, if this is without risk. Small Spillages: Absorb spill with vermiculite or other inert material, then place in a container for chemical waste. Containers with collected spillage must be properly labelled with correct contents and hazard symbol. Clean surface thoroughly to remove residual contamination. Large Spillages: Dike far ahead of larger spill for later recovery and disposal.

Environmental Precautions: Do not contaminate water sources or sewer. Prevent entry into waterways, sewer, basements or confined areas. Contact local authorities in case of spillage to drain/aquatic environment.

7. Handling and storage

Handling

Technical measures (e.g. Local and general ventilation): Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Emergency showers and eye wash stations should be available.

Safe handling advice: Do not get in eyes. Wash hands thoroughly after handling. Do not get in eyes, on skin, on clothing.

Contact avoidance measures: Contact with incompatible materials.

Storage

Safe storage conditions: Store locked up. Store in tightly closed original container in a dry, cool and well-ventilated place. Store away from incompatible materials.

Safe packaging materials: Suitable materials: Keep in original container.

8. Exposure controls/personal protection

Control Parameters

Occupational Exposure Limits

Chemical Identity	Type	Exposure Limit Values	Source
Sodium hydroxide	Ceil_Time	2 mg/m3	US. NIOSH: Pocket Guide to Chemical Hazards, as amended
	Ceiling	2 mg/m3	US. ACGIH Threshold Limit Values, as amended
	Ceiling	2 mg/m3	US. OSHA Table Z-1-A (29 CFR 1910.1000), as amended
	PEL	2 mg/m3	US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000), as

				amended
Ethanediol	Ceiling	50 ppm	125 mg/m3	US. OSHA Table Z-1-A (29 CFR 1910.1000), as amended
Ethanediol - Aerosol, inhalable.	STEL		10 mg/m3	US. ACGIH Threshold Limit Values, as amended
Ethanediol - Vapor fraction	TWA	25 ppm		US. ACGIH Threshold Limit Values, as amended
	STEL	50 ppm		US. ACGIH Threshold Limit Values, as amended

Please refer to the latest edition of the appropriate source text and consult an industrial hygienist or similar professional, or local agencies, for further information.

Biological Limit Values

No biological exposure limits noted for the ingredient(s).

Appropriate Engineering Controls

Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Emergency showers and eye wash stations should be available.

Individual protection measures, such as personal protective equipment

General information:

Educate and train employees in the safe use and handling of this product. Do not eat, drink or smoke when using the product. Eye wash facilities and emergency shower must be available when handling this product. Wash at the end of each work shift and before eating, smoking and using the toilet.

Eye/face protection:

Safety goggles

Skin Protection

Hand Protection:

Protective gloves should be used if there is a risk of direct contact or splash., Chemical resistant gloves required for prolonged or repeated contact., Butyl rubber., Glove thickness: > 0.35 mm, Break-through time: > 240 min, Risk of splashes:, Nitrile rubber., Nitrile gloves are recommended, but be aware that the liquid may penetrate the gloves. Frequent change is advisable., The most suitable glove must be chosen in consultation with the gloves supplier, who can inform about the breakthrough time of the glove material.

Skin and Body Protection:

Wear suitable protective clothing as protection against splashing or contamination.

Respiratory Protection:	Under normal conditions of use, respirator protection is not required. In case of inadequate ventilation, use respiratory protection. If respirators are used, institute a program in accordance with OSHA standard 29CFR1910.134 or Canada CSA Standard Z94.4-02. Use respiratory equipment with combination filter, type AB/P2.
Hygiene measures:	Employees should wash their hands and face before eating, drinking, or using tobacco products. Keep away from foodstuffs, drinks and tobacco.

9. Physical and chemical properties

Information on basic physical and chemical properties

Appearance	
Physical state:	liquid
Form:	liquid
Color:	Colorless
Odor:	Odorless
Odor Threshold:	No data available.
Freezing point:	< 32 °F/< 0 °C
Boiling Point:	> 212 °F/> 100 °C
Flammability:	Not flammable.
Upper/lower limit on flammability or explosive limits	
Explosive limit - upper:	No data available.
Explosive limit - lower:	No data available.
Flash Point:	Not applicable Aqueous solution.
Autoignition Temperature:	Not applicable Aqueous solution.
Decomposition Temperature:	No data available.
pH:	> 13
Viscosity	
Dynamic viscosity:	No data available.
Kinematic viscosity:	No data available.
Flow Time:	No data available.
Solubility(ies)	
Solubility in Water:	Soluble
Solubility (other):	No data available.
Partition coefficient (n-octanol/water):	Not applicable Mixture
Vapor pressure:	23 hPa
Relative density:	1.067 (68 °F/20 °C)
Density:	1.067 g/cm3 (68 °F/20 °C)
Bulk density:	No data available.
Relative vapor density:	No data available.
Particle characteristics	
Particle Size:	No data available.
Particle Size Distribution:	No data available.

Specific surface area:	No data available.
Surface charge/Zeta potential:	No data available.
Shape:	No data available.
Crystallinity:	No data available.
Surface treatment:	No data available.

Other information

VOC Content: 0 g/l ~0.0 % (calculated)

10. Stability and reactivity

Reactivity:	Material is stable under normal conditions.
Chemical Stability:	No data available.
Possibility of hazardous reactions:	Not known.
Conditions to avoid:	Avoid heat or contamination.
Incompatible Materials:	None known.
Hazardous Decomposition Products:	By heating and fire, harmful vapors/gases may be formed.

11. Toxicological information

Information on likely routes of exposure

Inhalation:	Inhalation is the primary route of exposure. In high concentrations, vapors, fumes or mists may irritate nose, throat and mucus membranes.
Skin Contact:	Moderately irritating to skin with prolonged exposure.
Eye contact:	Causes serious eye damage.
Ingestion:	May be ingested by accident. Ingestion may cause irritation and malaise.

Information on toxicological effects

Acute toxicity (list all possible routes of exposure)

Oral

Product:	Not classified for acute toxicity based on available data.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	LD 50 (Rat): 7,712 mg/kg Experimental result, Key study

Dermal

Product:	Not classified for acute toxicity based on available data.
Components:	
Disodium metasilicate	LD 50 (Rat): > 5,000 mg/kg Read-across based on grouping of substances (category approach), Key study
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	LD 50 (Mouse): > 3,500 mg/kg Experimental result, Weight of Evidence study

Inhalation

Product:	Not classified for acute toxicity based on available data.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	LC 50 (Rat, 6 h): > 2.5 mg/l Aerosol; 2 = reliable with restrictions; Aerosol, Experimental result, Weight of Evidence study

Repeated dose toxicity

Product:	No data available.
Components:	
Disodium metasilicate	NOAEL (Rat(Female, Male), Oral, 3 Months): > 227 mg/kg Oral Experimental result, Key study
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	NOAEL (Rat(Male), Oral, 16 Weeks): 150 mg/kg Oral Experimental result, Weight of Evidence study NOAEL (Rat(Male), Oral, 12 Months): 150 mg/kg Oral Experimental result, Supporting study

Skin Corrosion/Irritation

Product:	No data available.
Components:	
Disodium metasilicate	Corrosive in vivo Experimental result, Key study
Sodium octanoate	No data available.
Sodium hydroxide	Corrosive
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	Not irritant in vivo Experimental result, Key study

Serious Eye Damage/Eye Irritation

Product:	No data available.
Components:	
Disodium metasilicate	Corrosive In vitro
Sodium octanoate	No data available.
Sodium hydroxide	Corrosive

Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	Not irritating in vivo EU

Respiratory or Skin Sensitization

Product:	No data available.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	Skin sensitization:, in vivo (Guinea pig): Non sensitising

Carcinogenicity

Product:	No data available.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

IARC Monographs on the Evaluation of Carcinogenic Risks to Humans:
No carcinogens present or none present in regulated quantities

ACGIH: US.ACGIH Threshold Limit Values:
No carcinogens present or none present in regulated quantities

US. National Toxicology Program (NTP) Report on Carcinogens:
No carcinogens present or none present in regulated quantities

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050), as amended:
No carcinogens present or none present in regulated quantities

Germ Cell Mutagenicity

In vitro

Product:	No data available.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

In vivo

Product:	No data available.
Components:	
Disodium metasilicate	No data available.

Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Reproductive toxicity
Product: No data available.
Components:

Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Specific Target Organ Toxicity - Single Exposure
Product: No data available.
Components:

Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Specific Target Organ Toxicity - Repeated Exposure
Product: No data available.
Components:

Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Aspiration Hazard
Product: No data available.
Components:

Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Information on health hazards

Other hazards
Product: No data available.

12. Ecological information

Ecotoxicity:

Acute hazards to the aquatic environment:

Fish

Product:	No data available.
Components:	
Disodium metasilicate	LC 50 (Danio rerio, 96 h): 210 mg/l Experimental result, Key study
Sodium octanoate	No data available.
Sodium hydroxide	LC 50 (Leuciscus idus, 48 h): 189 mg/l Experimental result, Supporting study
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	LC 50 (Zebra danio (Danio rerio), 96 h): 10 - 100 mg/l
Ethanediol	LC 50 (Pimephales promelas, 96 h): 72,860 mg/l Experimental result, Key study

Aquatic Invertebrates

Product:	No data available.
Components:	
Disodium metasilicate	EC 50 (Daphnia magna, 48 h): 1,700 mg/l Read-across based on grouping of substances (category approach), Key study
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	EC 50 (Daphnia magna, 48 h): > 100 mg/l Experimental result, Key study

Toxicity to Aquatic Plants

Product:	No data available.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Toxicity to microorganisms

Product:	No data available.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-,	No data available.

phosphate	
Ethanediol	EC50 (Pseudomonas putida (bacteria), 16 h): > 10,000.00 mg/l (QSAR)

Chronic hazards to the aquatic environment:

Fish

Product:	No data available.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	NOAEL (Pimephales promelas, 7 d): 15,380 mg/l (semi-static) Experimental result, Weight of Evidence study

Aquatic Invertebrates

Product:	No data available.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Toxicity to Aquatic Plants

Product:	No data available.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Toxicity to microorganisms

Product:	No data available.
Components:	
Disodium metasilicate	No data available.
Sodium octanoate	No data available
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	EC50 (Pseudomonas putida (bacteria), 16 h): > 10,000.00 mg/l (QSAR)

Persistence and Degradability

Biodegradation

Product:	No data available.
Components:	
Disodium metasilicate	No data available.

Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	90 - 100 % (10 d) Detected in water. Experimental result, Key study

BOD/COD Ratio

Product: No data available.

Components:

Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Bioaccumulative potential

Bioconcentration Factor (BCF)

Product: No data available.

Components:

Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Partition Coefficient n-octanol / water (log Kow)

Product: Log Kow: Not applicable Mixture

Components:

Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	Log Kow: -1.36 Log Kow: -1.36 (QSAR)

Mobility in soil:

Product No data available.

Components:

Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Product This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

Components:

Disodium metasilicate	No data available.
Sodium octanoate	No data available.
Sodium hydroxide	No data available.
Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate	No data available.
Ethanediol	No data available.

Other adverse effects:

Other hazards
Product: No data available.

13. Disposal considerations

General information: Waste disposal should be in accordance with existing federal, state and local environmental control laws.

Disposal methods: Wash before disposal. Dispose to controlled facilities.

Since emptied containers retain product residue, follow label warnings even after container is emptied.

Contaminated Packaging: Dispose in accordance with all applicable regulations.

US. RCRA Hazardous Waste Classification (40 CFR 261) When discarded in its purchased form, this product meets the criteria of corrosivity, and should be managed as a hazardous waste (EPA Hazardous Waste Number D002).

14. Transport information

DOT

UN number or ID number	UN1719
UN Proper Shipping Name	Caustic alkali liquids, n.o.s.(Sodium hydroxide, Disodium metasilicate)
Transport Hazard Class(es)	
Class	8
Label(s)	8
Packing Group	II
Environmental Hazards	No

Special precautions for user

IATA

UN number or ID number	UN1719
Proper Shipping Name	Caustic alkali liquid, n.o.s.(Sodium hydroxide, Disodium metasilicate)
Transport Hazard Class(es)	
Class	8
Label(s)	8
Packing Group	II
Excepted quantity	E2
Environmental Hazards	No
Special precautions for user	
Other information	
Passenger and cargo aircraft	Allowed.
Cargo aircraft only	Allowed.

IMDG

UN number or ID number	UN1719
UN Proper Shipping Name	CAUSTIC ALKALI LIQUID, N.O.S.(Sodium hydroxide, Disodium metasilicate)
Transport Hazard Class(es)	
Class	8
Label(s)	8
EmS No.	F-AS-B
Packing Group	II
Limited quantity	1.00L
Excepted quantity	E2
Environmental Hazards	No
Special precautions for user	

15. Regulatory information

US Federal Regulations

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)
None present or none present in regulated quantities.

US. Toxic Substances Control Act (TSCA) Section 5(a)(2) Final Significant New Use Rules (SNURs) (40 CFR 721, Subpt E)
None present or none present in regulated quantities.

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050), as amended
None present or none present in regulated quantities.

CERCLA Hazardous Substance List (40 CFR 302.4):

Chemical Identity
Sodium hydroxide
Sodium hydroxide
ETHYLENE GLYCOL

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories

Skin Corrosion or Irritation, Serious eye damage or eye irritation

US. EPCRA (SARA Title III) Section 304 Extremely Hazardous Substances Reporting Quantities and the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) Hazardous Substances

None present or none present in regulated quantities.

US. EPCRA (SARA Title III Section 313 Toxic Chemical Release Inventory (TRI) Reporting

None present or none present in regulated quantities.

Clean Air Act (CAA) Section 111 SOCMI Intermediate or Final Volatile Organic Compounds (40 CFR 60.489):

Chemical Identity
ETHYLENE GLYCOL

Clean Air Act (CAA) Section 112, 1990 Amendments, Statutory Hazardous Air Pollutants:

Chemical Identity
ETHYLENE GLYCOL

Clean Air Act (CAA) Section 112(i) High-Risk Hazardous Air Pollutants (40 CFR 63.74):
None present or none present in regulated quantities.

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130):
None present or none present in regulated quantities.

Clean Water Act Section 311 Hazardous Substances (40 CFR 117.3)

Chemical Identity
SODIUM HYDROXIDE

US State Regulations

US. California Proposition 65

WARNING: This product can expose you to chemicals including, Ethanediol which is [are] known to the State of California to cause birth defects or other reproductive harm.

For more information go to www.P65Warnings.ca.gov.

US. Toxic Substances Control Act (TSCA)

- Disodium metasilicate : y
- Sodium octanoate : y
- Sodium hydroxide : y
- Poly(oxy-1,2-ethanediyl), α-isotridecyl-ω-hydroxy-, phosphate : y
- Ethanediol : y

16.Other information, including date of preparation or last revision

Issue Date: 06-14-2023

Version #: 1.0

Further Information: This information is furnished without warranty, expressed or implied, and is believed to be accurate to the best knowledge of Agfa Corporation. The data on this SDS relates only to the specific material designated herein. Agfa Corporation assumes no legal responsibility for use or reliance upon these data.

SAFETY DATA SHEET

Classified in accordance 29 CFR 1910.1200

1. Identification

Product identifier: SU45.CN5000073 Saphira Developer Thermal Plate PN 101

Recommended restrictions

Recommended use: Offset plate developer solution
Restrictions on use: Reserved for industrial and professional use.

Manufacturer/Importer/Distributor Information

Manufacturer

Heidelberg USA, Inc
1000 Gutenberg Drive
Kennesaw, GA 30144

Telephone: 1-888-472-9655 prompt 3
Contact: Product Support
E-mail: hus.regulatory@heidelberg.com

Emergency telephone number:

Transport Emergency

Chemtrec: USA/Canada +1 800 424-9300
International: Mexico 800-681-9531

Non-transportation

Health Emergency Phone: +1 303 623-5716
Agfa Information Phone: +1 201 440-2500

2. Hazard(s) identification

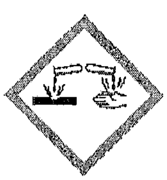
Hazard Classification

Health Hazards

Skin Corrosion/Irritation	Category 1B
Serious Eye Damage/Eye Irritation	Category 1

Label Elements

Hazard Symbol:



Signal Word: Danger

Hazard Statement: Causes severe skin burns and eye damage.

Precautionary Statements

Prevention: Do not breathe dust/fume/gas/mist/vapors/spray. Wash thoroughly after handling. Wear protective gloves/protective clothing/eye protection/face protection.

Response: IF INHALED: Remove person to fresh air and keep comfortable for breathing. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water [or shower]. IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. Immediately call a POISON CENTER/doctor. Wash contaminated clothing before reuse.

Storage: Store locked up.

Disposal: Dispose of contents/container to an appropriate treatment and disposal facility in accordance with applicable laws and regulations, and product characteristics at time of disposal.

Hazard(s) not otherwise classified (HNOC): None.

3. Composition/information on ingredients

Mixtures

Chemical Identity	Common name and synonyms	CAS number	Content in percent (%)*
Disodium metasilicate	No data available.	6834-92-0	5 - <10%
Sodium octanoate	No data available.	1984-06-1	1 - <5%
sodium hydroxide	No data available.	1310-73-2	0.1 - <1%
Ethanediol	No data available.	107-21-1	0 - <0.1%

* All concentrations are percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.

The exact concentration has been withheld as a trade secret.

4. First-aid measures

Description of necessary first-aid measures

General information: Get medical attention if symptoms occur.

Inhalation: Move into fresh air and keep at rest. Get medical attention immediately. Show this safety data sheet to the doctor in attendance.

Skin Contact: Immediately flush with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Get medical attention if symptoms occur. Wash contaminated clothing before reuse.

Eye contact: Flush thoroughly with water for at least 15 minutes. Get medical assistance.

Ingestion: Rinse mouth with plenty of water. Call a physician immediately. Show this safety data sheet to the doctor in attendance.

Personal Protection for First-aid Responders: CAUTION! First aid personnel must be aware of own risk during rescue! See Section 8 of the SDS for Personal Protective Equipment.

Most important symptoms/effects, acute and delayed

Symptoms: See section 11 of the SDS for additional information on health hazards.

Hazards: See section 11 of the SDS for additional information on health hazards.

Indication of immediate medical attention and special treatment needed

Treatment: Treat symptomatically.

5. Fire-fighting measures

General Fire Hazards: No unusual fire or explosion hazards noted.

Suitable (and unsuitable) extinguishing media

Suitable extinguishing media: Extinguish with foam, carbon dioxide, dry powder or water fog.

Unsuitable extinguishing media: Do not use water jet as an extinguisher, as this will spread the fire.

Specific hazards arising from the chemical: During fire, gases hazardous to health may be formed.

Special protective equipment and precautions for firefighters

Special fire fighting procedures: No data available.

Special protective equipment for fire-fighters: Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures: See Section 8 of the SDS for Personal Protective Equipment. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Keep unauthorized personnel away.

For emergency responders: Warn everybody of potential hazards and evacuate if necessary. Use personal protective equipment.

For non-emergency personnel: Use personal protective equipment.

Methods and material for containment and cleaning up: Absorb spill with vermiculite or other inert material, then place in a container for chemical waste. Dike far ahead of larger spill for later recovery and disposal.

Environmental Precautions: Do not contaminate water sources or sewer. Prevent further leakage or spillage if safe to do so.

7. Handling and storage

Handling

Technical measures (e.g. Local and general ventilation): Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Emergency showers and eye wash stations should be available.

Safe handling advice: Do not get in eyes. Wash hands thoroughly after handling. Do not get in eyes, on skin, on clothing.

Contact avoidance measures: Contact with incompatible materials.

Hygiene measures: Employees should wash their hands and face before eating, drinking, or using tobacco products. Keep away from foodstuffs, drinks and tobacco.

Storage

Safe storage conditions: Store locked up.

Safe packaging materials: Suitable materials: Keep in original container.

8. Exposure controls/personal protection

Control Parameters

Occupational Exposure Limits

Chemical Identity	Type	Exposure Limit Values	Source
sodium hydroxide	Ceiling	2 mg/m3	US. ACGIH Threshold Limit Values, as

				amended (03 2014)
	Ceil_Time		2 mg/m3	US. NIOSH: Pocket Guide to Chemical Hazards, as amended (2010)
	PEL		2 mg/m3	US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000), as amended (02 2006)
	Ceiling		2 mg/m3	US. OSHA Table Z-1-A (29 CFR 1910.1000), as amended (1989)
Ethanediol - Aerosol, inhalable.	STEL		10 mg/m3	US. ACGIH Threshold Limit Values, as amended (03 2017)
Ethanediol - Vapor fraction	TWA	25 ppm		US. ACGIH Threshold Limit Values, as amended (03 2017)
	STEL	50 ppm		US. ACGIH Threshold Limit Values, as amended (03 2017)
Ethanediol	Ceiling	50 ppm	125 mg/m3	US. OSHA Table Z-1-A (29 CFR 1910.1000), as amended (1989)

Appropriate Engineering Controls

Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Emergency showers and eye wash stations should be available.

Individual protection measures, such as personal protective equipment

General information: Educate and train employees in the safe use and handling of this product. Do not eat, drink or smoke when using the product. Eye wash facilities and emergency shower must be available when handling this product. Wash at the end of each work shift and before eating, smoking and using the toilet.

Eye/face protection: Safety goggles

Skin Protection

Hand Protection: Protective gloves should be used if there is a risk of direct contact or splash., Chemical resistant gloves required for prolonged or repeated contact., Butyl rubber., Glove thickness: > 0.35 mm, Break-through time: > 240 min, Risk of splashes:, Nitrile rubber., Nitrile gloves are recommended, but be aware that the liquid may penetrate the gloves. Frequent change is advisable., The most suitable glove must be chosen in consultation with the gloves supplier, who can inform about the breakthrough time of the glove material.

Skin and Body Protection: Wear suitable protective clothing as protection against splashing or contamination.

Respiratory Protection: Under normal conditions of use, respirator protection is not required. In case of inadequate ventilation, use respiratory protection. If respirators are used, OSHA requires compliance with its respiratory protection program (29 CFR 1910.134).

Hygiene measures: Employees should wash their hands and face before eating, drinking, or using tobacco products. Keep away from foodstuffs, drinks and tobacco.

9. Physical and chemical properties

Appearance	
Physical state:	liquid
Form:	liquid
Color:	Colorless
Odor:	Odorless
Odor Threshold:	No data available.
pH:	13.3 (25 °C)
Freezing point:	< 0 °C
Boiling Point:	> 100 °C
Flash Point:	> 93.33 °C
Evaporation Rate:	Almost no evaporation (20°C).
Flammability (solid, gas):	Not applicable
Explosive limit - upper:	No data available.
Explosive limit - lower:	No data available.
Vapor pressure:	Aqueous solution.
Relative vapor density:	No data available.
Density:	No data available.
Relative density:	1.064
Solubility(ies)	
Solubility in Water:	No data available.
Solubility (other):	No data available.
Partition coefficient (n-octanol/water):	No data available
Self Ignition Temperature:	Not applicable
Decomposition Temperature:	No data available.
Kinematic viscosity:	No data available
Dynamic viscosity:	No data available
Explosive properties:	No data available.
Oxidizing properties:	No data available.
Other information	
VOC Content:	0.0 g/lVOC content excluding water

10. Stability and reactivity

Reactivity:	Material is stable under normal conditions.
Chemical Stability:	Material is stable under normal conditions.
Possibility of hazardous reactions:	Not known.
Conditions to avoid:	Avoid heat or contamination.
Incompatible Materials:	None known.

Hazardous Decomposition Products: By heating and fire, harmful vapors/gases may be formed.

11. Toxicological information

Symptoms related to the physical, chemical and toxicological characteristics

Inhalation: Inhalation is the primary route of exposure. In high concentrations, vapors, fumes or mists may irritate nose, throat and mucus membranes.

Skin Contact: Causes severe skin burns.

Eye contact: Causes serious eye damage.

Ingestion: Ingestion may cause severe irritation of the mouth, the esophagus and the gastrointestinal tract.

Information on toxicological effects

Acute toxicity (list all possible routes of exposure)

Oral
Product: Not classified for acute toxicity based on available data.

Dermal
Product: Not classified for acute toxicity based on available data.

Inhalation
Product: Not classified for acute toxicity based on available data.

Repeated dose toxicity
Product: No data available.
Components:

Disodium metasilicate: NOAEL (Rat(Female, Male), Oral, 3 Months): > 227 mg/kg Oral Experimental result, Key study

Ethanediol: NOAEL (Rat(Male), Oral, 12 Months): 150 mg/kg Oral Experimental result, Supporting study
NOAEL (Mouse(Female, Male), Oral, 92 - 96 d): 12,500 ppm(m) Oral Experimental result, Weight of Evidence study
NOAEL (Rat(Female, Male), Oral, 33 d): 200 mg/kg Oral Experimental result, Weight of Evidence study
NOAEL (Rat(Male), Oral, 16 Weeks): 150 mg/kg Oral Experimental result, Weight of Evidence study

Skin Corrosion/Irritation
Product: Corrosive The health hazard evaluation is based on the toxicological properties of a similar material.

Serious Eye Damage/Eye Irritation
Product: Corrosive The health hazard evaluation is based on the toxicological properties of a similar material.

Respiratory or Skin Sensitization
Product: No data available.

Carcinogenicity
Product: No data available.

IARC Monographs on the Evaluation of Carcinogenic Risks to Humans:
No carcinogens present or none present in regulated quantities

US. National Toxicology Program (NTP) Report on Carcinogens:
No carcinogens present or none present in regulated quantities

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050), as amended:
No carcinogens present or none present in regulated quantities

Germ Cell Mutagenicity

In vitro
Product: No data available.

In vivo
Product: No data available.

Reproductive toxicity
Product: No data available.

Specific Target Organ Toxicity - Single Exposure
Product: No data available.

Specific Target Organ Toxicity - Repeated Exposure
Product: No data available.

Aspiration Hazard
Product: No data available.

Other effects: No data available.

12. Ecological information

Ecotoxicity:

Acute hazards to the aquatic environment:

Fish
Product: No data available.
Components:

Disodium metasilicate	LC 50 (Danio rerio, 96 h): 210 mg/l Experimental result, Key study
sodium hydroxide	LC 50 (Leuciscus idus, 48 h): 189 mg/l Experimental result, Supporting study
Ethanediol	LC 50 (Pimephales promelas, 96 h): 72,860 mg/l Experimental result, Key study

Aquatic Invertebrates

Product:	No data available.
Components:	
Disodium metasilicate	EC 50 (Daphnia magna, 48 h): 1,700 mg/l Read-across based on grouping of substances (category approach), Key study
sodium hydroxide	EC 50 (Ceriodaphnia sp., 48 h): 40.4 mg/l Experimental result, Key study
Ethanediol	EC 50 (Daphnia magna, 48 h): > 100 mg/l Experimental result, Key study

Toxicity to Aquatic Plants
Product: No data available.

Toxicity to microorganisms
Product: No data available.

Chronic hazards to the aquatic environment:

Fish
Product: No data available.

Aquatic Invertebrates
Product: No data available.

Toxicity to Aquatic Plants
Product: No data available.

Toxicity to microorganisms
Product: No data available.

Persistence and Degradability

Biodegradation
Product: No data available.
Components:
Ethanediol: 90 - 100 % (10 d) Detected in water. Experimental result, Key study

BOD/COD Ratio
Product: No data available.

Bioaccumulative potential
Product: No data available.

Partition Coefficient n-octanol / water (log Kow)
Product: Log Kow: No data available

Mobility in soil:
Product No data available.

Other adverse effects: No data available.

13. Disposal considerations

General information: Waste disposal should be in accordance with existing federal, state and local environmental control laws.

Disposal methods:	Discharge, treatment, or disposal may be subject to national, state, or local laws. Since emptied containers retain product residue, follow label warnings even after container is emptied.
Contaminated Packaging:	Dispose in accordance with all applicable regulations.
US. RCRA Hazardous Waste Classification (40 CFR 261)	When discarded in its purchased form, this product meets the criteria of corrosivity, and should be managed as a hazardous waste (EPA Hazardous Waste Number D002).

14. Transport information

DOT

UN Number	UN1719
UN Proper Shipping Name	Caustic alkali liquids, n.o.s.(Sodium hydroxide, Disodium metasilicate)
Transport Hazard Class(es)	
Class	8
Label(s)	8
Packing Group	II
Environmental Hazards	No
Special precautions for user	

IATA

UN Number	UN1719
Proper Shipping Name	Caustic alkali liquid, n.o.s.(Sodium hydroxide, Disodium metasilicate)
Transport Hazard Class(es)	
Class	8
Label(s)	8
Packing Group	II
Limited quantity	0.50L
Excepted quantity	E2
Environmental Hazards	No
Special precautions for user	

Other information

Passenger and cargo aircraft	Allowed.
Cargo aircraft only	Allowed.

IMDG

UN Number	UN1719
UN Proper Shipping Name	CAUSTIC ALKALI LIQUID, N.O.S.(Sodium hydroxide, Disodium metasilicate)
Transport Hazard Class(es)	
Class	8
Label(s)	8
EmS No.	F-AS-B
Packing Group	II
Limited quantity	1.00L
Excepted quantity	E2
Environmental Hazards	No
Special precautions for user	

15. Regulatory information

US Federal Regulations

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)
None present or none present in regulated quantities.

US. Toxic Substances Control Act (TSCA) Section 5(a)(2) Final Significant New Use Rules (SNURs) (40 CFR 721, Subpt E)
None present or none present in regulated quantities.

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050), as amended
None present or none present in regulated quantities.

CERCLA Hazardous Substance List (40 CFR 302.4):

Chemical Identity
sodium hydroxide
Ethanediol

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories
Skin Corrosion or Irritation, Serious eye damage or eye irritation

US. EPCRA (SARA Title III) Section 304 Extremely Hazardous Substances Reporting Quantities and the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) Hazardous Substances
None present or none present in regulated quantities.

US. EPA Emergency Planning and Community Right-To-Know Act (EPCRA) SARA Title III Section 313 Toxic Chemicals (40 CFR 372.65) - Supplier Notification Required

None present or none present in regulated quantities.

Clean Air Act (CAA) Section 111 SOCMI Intermediate or Final Volatile Organic Compounds (40 CFR 60.489):

Chemical Identity
Ethanediol

Clean Air Act (CAA) Section 112, 1990 Amendments, Statutory Hazardous Air Pollutants:

Chemical Identity
Ethanediol

Clean Air Act (CAA) Section 112(i) High-Risk Hazardous Air Pollutants (40 CFR 63.74):

None present.

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130):

None present or none present in regulated quantities.

Clean Water Act Section 311 Hazardous Substances (40 CFR 117.3)

Chemical Identity
sodium hydroxide

US State Regulations

US. California Proposition 65

WARNING: This product can expose you to chemicals including, Ethanediolwhich is [are] known to the State of California to cause birth defects or other reproductive harm.

For more information go to www.P65Warnings.ca.gov.

US. New Jersey Worker and Community Right-to-Know Act

No ingredient regulated by NJ Right-to-Know Law present.

US. Massachusetts RTK - Substance List

No ingredient regulated by MA Right-to-Know Law present.

US. Pennsylvania RTK - Hazardous Substances

No ingredient regulated by PA Right-to-Know Law present.

US. Rhode Island RTK

No ingredient regulated by RI Right-to-Know Law present.

US. Toxic Substances Control Act (TSCA)

All components of this product are listed, or excluded from listing, on the United States Environmental Protection Agency Toxic Substance Control Act (U.S, EPA TSCA) 8(b) inventory.

16.Other information, including date of preparation or last revision

Issue Date:	04-01-2023
Version #:	1.2
Further Information:	This information is furnished without warranty, expressed or implied, and is believed to be accurate to the best knowledge of Agfa Corporation. The data on this SDS relates only to the specific material designated herein. Agfa Corporation assumes no legal responsibility for use or reliance upon these data.

SAFETY DATA SHEET

1. Identification

Product identifier: SU45.CN2001387 Plate Finisher/ Gum Protect 20lt 4NV1P

Other means of identification
SDS number: 000001014625

Recommended use and restriction on use
Recommended use: Offset plate finisher solution
Restrictions on use: Reserved for industrial and professional use.

Manufacturer/Importer/Supplier/Distributor Information

Manufacturer

Company Name: Heidelberg USA, Inc
Address: 1000 Gutenberg Drive
Kennesaw, GA 30144

Telephone: 1-888-472-9655 prompt 3
Contact Person: Product Support
E-mail: hus.regulatory@heidelberg.com

Emergency telephone number:

Transport Emergency	Non-transportation
Call CHEMTREC : USA/Canada +1 800 424-9300	Health Emergency Phone : +1 303 6235716
International : Mexico 800-681-9531	Agfa Information Phone : +1 201 4402500

2. Hazard(s) identification

Hazard Classification

Health Hazards

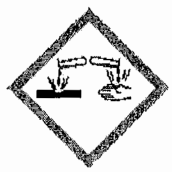
Serious Eye Damage/Eye Irritation	Category 1

Environmental Hazards

Acute hazards to the aquatic environment	Category 3
Chronic hazards to the aquatic environment	Category 3

Label Elements

Hazard Symbol:



Signal Word: Danger

Hazard Statement: Causes serious eye damage.
Harmful to aquatic life with long lasting effects.

Precautionary Statements

Prevention: Wear protective gloves/protective clothing/eye protection/face protection. Avoid release to the environment.

Response: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER/doctor.

Disposal: Dispose of contents/container to an appropriate treatment and disposal facility in accordance with applicable laws and regulations, and product characteristics at time of disposal.

Other hazards which do not result in GHS classification: None.

3. Composition/information on ingredients

Mixtures

Chemical Identity	Common name and synonyms	CAS number	Content in percent (%)*
sodium salts of sulfonated 1,1'-oxybisbenzene tetrapropylene derivative		119345-04-9	3 - <5%
Citric acid		77-92-9	1 - <5%

* All concentrations are percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.

4. First-aid measures

General information: CAUTION! First aid personnel must be aware of own risk during rescue!

Ingestion: Rinse mouth thoroughly.

Inhalation: Move to fresh air.

Skin Contact: Remove contaminated clothing and wash the skin thoroughly with soap and water after work.

Eye contact: Immediately flush with plenty of water for at least 15 minutes. If easy to do, remove contact lenses. Call a physician or poison control center immediately.

Most important symptoms/effects, acute and delayed

Symptoms: See section 11 of the SDS for additional information on health hazards.

Hazards: See section 11 of the SDS for additional information on health hazards.

Indication of immediate medical attention and special treatment needed

Treatment: Skin and/or eye contact. Flush thoroughly with water for at least 15 minutes. Get medical assistance.

5. Fire-fighting measures

General Fire Hazards: No unusual fire or explosion hazards noted.

Suitable (and unsuitable) extinguishing media

Suitable extinguishing media: Use fire-extinguishing media appropriate for surrounding materials.

Unsuitable extinguishing media: Do not use water jet as an extinguisher, as this will spread the fire.

Specific hazards arising from the chemical: During fire, gases hazardous to health may be formed.

Special protective equipment and precautions for firefighters

Special fire fighting procedures: No data available.

Special protective equipment for fire-fighters: Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures: Use personal protective equipment. Put on protective equipment before entering danger area.

Methods and material for containment and cleaning up: Stop the flow of material, if this is without risk. Absorb with sand or other inert absorbent.

Notification Procedures: See Section 8 of the SDS for Personal Protective Equipment. For waste disposal, see section 13 of the SDS.

Environmental Precautions: Avoid release to the environment. Prevent further leakage or spillage if safe to do so.

7. Handling and storage

Precautions for safe handling: Provide adequate ventilation. Wear appropriate personal protective equipment. Observe good industrial hygiene practices.

Conditions for safe storage, including any incompatibilities: Store away from incompatible materials.

8. Exposure controls/personal protection

Control Parameters

Occupational Exposure Limits

None of the components have assigned exposure limits.

Appropriate Engineering Controls Educate and train employees in the safe use and handling of this product.

Individual protection measures, such as personal protective equipment

General information: Provide easy access to water supply and eye wash facilities. Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Follow training instructions when handling this material.

Eye/face protection: Safety goggles

Skin Protection

Hand Protection: Protective gloves should be used if there is a risk of direct contact or splash. Chemical resistant gloves required for prolonged or repeated contact. Butyl rubber. Glove thickness: > 0.70 mm Break-through time: > 480 min Risk of splashes: Nitrile rubber. Nitrile gloves are recommended, but be aware that the liquid may penetrate the gloves. Frequent change is advisable. The most suitable glove must be chosen in consultation with the gloves supplier, who can inform about the breakthrough time of the glove material.

Other: Wear suitable protective clothing as protection against splashing or contamination.

Respiratory Protection: Under normal conditions of use, respirator protection is not required. In case of inadequate ventilation, use respiratory protection. If respirators are used, OSHA requires compliance with its respiratory protection program (29 CFR 1910.134).

Hygiene measures: Do not get in eyes. Observe good industrial hygiene practices.

9. Physical and chemical properties

Appearance

Physical state:	liquid
Form:	liquid
Color:	Light yellow
Odor:	Nearly odourless
Odor threshold:	No data available.
pH:	3.6 (25 °C)
Melting point/freezing point:	< 0 °C (Literature.)
Initial boiling point and boiling range:	> 100 °C (Literature.)
Flash Point:	> 100 °C (Literature.)
Evaporation rate:	Almost no evaporation (20°C).

Flammability (solid, gas):	not auto-flammable
Upper/lower limit on flammability or explosive limits	
Flammability limit - upper (%):	No data available.
Flammability limit - lower (%):	No data available.
Explosive limit - upper (%):	No data available.
Explosive limit - lower (%):	No data available.
Vapor pressure:	23.00 hPa (20 °C) (Literature.)
Vapor density:	No data available.
Relative density:	1.0730 (20 °C) (Literature.)
Solubility(ies)	
Solubility in water:	completely soluble
Solubility (other):	No data available.
Partition coefficient (n-octanol/water):	No data available.
Auto-ignition temperature:	No data available.
Decomposition temperature:	No data available.
Viscosity:	No data available.

Other information

VOC:	0.0 g/l VOC content excluding water

10. Stability and reactivity

Reactivity:	Material is stable under normal conditions.
Chemical Stability:	Material is stable under normal conditions.
Possibility of hazardous reactions:	No data available.
Conditions to avoid:	Avoid heat or contamination.
Incompatible Materials:	No data available.
Hazardous Decomposition Products:	By heating and fire, harmful vapors/gases may be formed.

11. Toxicological information

Symptoms related to the physical, chemical and toxicological characteristics

Ingestion:	May be ingested by accident. Ingestion may cause irritation and malaise.

Inhalation: Inhalation is the primary route of exposure. In high concentrations, vapors, fumes or mists may irritate nose, throat and mucus membranes.

Skin Contact: Moderately irritating to skin with prolonged exposure.

Eye contact: Eye contact is possible and should be avoided. Causes serious eye damage.

Information on toxicological effects

Acute toxicity (list all possible routes of exposure)

Oral
Product: Not classified for acute toxicity based on available data.

Dermal
Product: ATEmix 22,727.27 mg/kg

Inhalation
Product: Not classified for acute toxicity based on available data.

Repeated dose toxicity
Product: No data available.

Specified substance(s):
sodium salts of sulfonated 1,1'-oxybisbenzene tetrapropylene derivative: NOAEL (Rat(Male), Oral, 90 - 91 d): 600 mg/kg Oral Read-across from supporting substance (structural analogue or surrogate), Key study
NOAEL (Rat(Female), Oral, 90 - 91 d): 200 mg/kg Oral Read-across from supporting substance (structural analogue or surrogate), Key study

Specified substance(s):
Citric acid: LOAEL (Rat, Oral, 10 d): 8,000 mg/kg Oral Experimental result, Supporting study

Skin Corrosion/Irritation
Product: No data available.

Serious Eye Damage/Eye Irritation
Product: No data available.

Specified substance(s):

sodium salts of sulfonated 1,1'-oxybisbenzene tetrapropylene derivative	in vivo (Rabbit, 48 hrs): EU GHS

Respiratory or Skin Sensitization

Product: No data available.

Carcinogenicity

Product: No data available.

IARC Monographs on the Evaluation of Carcinogenic Risks to Humans:
No carcinogenic components identified

US. National Toxicology Program (NTP) Report on Carcinogens:
No carcinogenic components identified

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050):
No carcinogenic components identified

Germ Cell Mutagenicity

In vitro

Product: No data available.

In vivo

Product: No data available.

Reproductive toxicity

Product: No data available.

Specific Target Organ Toxicity - Single Exposure

Product: No data available.

Specific Target Organ Toxicity - Repeated Exposure

Product: No data available.

Target Organs

No data available.

Aspiration Hazard

Product: No data available.

Other effects: No data available.

12. Ecological information

Ecotoxicity:

Acute hazards to the aquatic environment:

Fish

Product:	No data available.
Specified substance(s):	
sodium salts of sulfonated 1,1'-oxybisbenzene tetrapropylene derivative	LC 50 (Various, 96 h): 6.2 mg/l experimental result
Citric acid	LC 50 (Leuciscus idus, 48 h): 760 mg/l experimental result

Aquatic Invertebrates

Product:	No data available.
Specified substance(s):	
sodium salts of sulfonated 1,1'-oxybisbenzene tetrapropylene derivative	LC 50 (48 h): 1.64 mg/l experimental result
Citric acid	EC 50 (48 h): > 50 mg/l experimental result

Chronic hazards to the aquatic environment:

Fish
Product: No data available.

Aquatic Invertebrates
Product: No data available.

Toxicity to Aquatic Plants
Product: No data available.

Persistence and Degradability

Biodegradation

Product: No data available.

BOD/COD Ratio

Product: No data available.

Bioaccumulative potential

Bioconcentration Factor (BCF)

Product: No data available.

Partition Coefficient n-octanol / water (log Kow)

Product: No data available.

Specified substance(s):

Citric acid — Log Kow: -1.7

Mobility in soil: No data available.

Known or predicted distribution to environmental compartments

sodium salts of sulfonated 1,1'-oxybisbenzene tetrapropylene derivative	No data available.
Citric acid	No data available.

Other adverse effects: Harmful to aquatic life with long lasting effects.

13. Disposal considerations

General information: Waste disposal should be in accordance with existing federal, state and local environmental control laws.

Disposal instructions: Discharge, treatment, or disposal may be subject to national, state, or local laws. Since emptied containers retain product residue, follow label warnings even after container is emptied.

Contaminated Packaging: Dispose in accordance with all applicable regulations.

US. RCRA Hazardous Waste Classification (40 CFR 261) When discarded in its purchased form, this product meets the criteria of corrosivity, and should be managed as a hazardous waste (EPA Hazardous Waste Number D002).

14. Transport information

DOT

UN Number	Not regulated.
UN Proper Shipping Name	Not regulated.
Transport Hazard Class(es)	Not regulated.
Packing Group	Not regulated.
Environmental Hazards	Not regulated.
Special precautions for user	Not regulated.

IMDG

UN Number	Not regulated.
UN Proper Shipping Name	Not regulated.
Transport Hazard Class(es)	Not regulated.
Packing Group	Not regulated.
Marine Pollutant	Not regulated.
Special precautions for user	Not regulated.

IATA

UN Number	Not regulated.
Proper Shipping Name	Not regulated.
Transport Hazard Class(es)	Not regulated.
Packing Group	Not regulated.
Environmental Hazards	Not regulated.
Special precautions for user	Not regulated.
Packing instruction (cargo aircraft)	Not regulated.
Packing instruction (passenger aircraft)	Not regulated.

15. Regulatory information

US Federal Regulations

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

None present or none present in regulated quantities.

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Chemical Identity	OSHA hazard(s)

CERCLA Hazardous Substance List (40 CFR 302.4):

Chemical Identity	Reportable quantity
Sodium hexametaphosphate	lbs. 5,000

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories
Immediate (Acute) Health Hazards

SARA 302 Extremely Hazardous Substance

Chemical Identity	Reportable quantity	Threshold Planning Quantity

SARA 304 Emergency Release Notification

Chemical Identity	Reportable quantity
Sodium hexametaphosphate	lbs. 5,000

SARA 311/312 Hazardous Chemical

Chemical Identity	Threshold Planning Quantity

SARA 313 (TRI Reporting)

Chemical Identity	Reporting threshold for other users	Reporting threshold for manufacturing and processing

Clean Water Act Section 311 Hazardous Substances (40 CFR 117.3)

Chemical Identity	Reportable quantity
Sodium hexametaphosphate	Reportable quantity: 5,000 lbs.

Clean Air Act (CAA) Section 111 SOCMI Intermediate or Final Volatile Organic Compounds (40 CFR 60.489):
None present.

Clean Air Act (CAA) Section 112, 1990 Amendments, Statutory Hazardous Air Pollutants:
None present.

Clean Air Act (CAA) Section 112(i) High-Risk Hazardous Air Pollutants (40 CFR 63.74):
None present.

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130):
None present or none present in regulated quantities.

US State Regulations

US. California Proposition 65
No ingredient regulated by CA Prop 65 present.

US. New Jersey Worker and Community Right-to-Know Act

Chemical Identity

US. Massachusetts RTK - Substance List

Chemical Identity
Sodium hexametaphosphate

US. Pennsylvania RTK - Hazardous Substances

Chemical Identity
Sodium hexametaphosphate

US. Rhode Island RTK

Chemical Identity
Sodium hexametaphosphate

US. Toxic Substances Control Act (TSCA)

All components of this product are listed, or excluded from listing, on the United States Environmental Protection Agency Toxic Substance Control Act (U.S, EPA TSCA) 8(b) inventory.

16.Other information, including date of preparation or last revision

Issue Date:	04-01-2023
Revision Date:	No data available.
Version #:	1.0
Further Information:	This information is furnished without warranty, expressed or implied, and is believed to be accurate to the best knowledge of Agfa Corporation. The data on this SDS relates only to the specific material designated herein. Agfa Corporation assumes no legal responsibility for use or reliance upon these data.
Disclaimer:	This information is provided without warranty. The information is believed to be correct. This information should be used to make an independent determination of the methods to safeguard workers and the environment.

SAFETY DATA SHEET
SU45.15003010 - Plate NS5 Neutralizing Solution

1. PRODUCT AND COMPANY IDENTIFICATION

Product identifier
Product Code SU45.15003010 - Plate NS5 Neutralizing Solution
Product Name NS5 Solution

Other means of identification

Recommended use of the chemical and restrictions on use
Neutralizing solution. Use only for the purpose on the product label.

Distributor:
Heidelberg USA, Inc.
1000 Gutenberg Drive
Kennesaw, GA 30144
Contact: Product Support Email: hus.regulatory@heidelberg.com Phone:+1 (800) 437-7388 Prompt 3

Emergency telephone number
24 Hour Emergency Phone Number: CHEMTREC USA & CANADA +1 (800) 424-8300, CHEMTREC MEXICO +1 (800) 681-9531

2. HAZARDS IDENTIFICATION

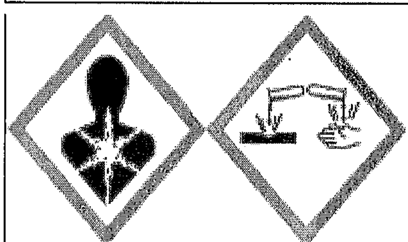
Classification

Skin corrosion/irritation	Category 1
Serious eye damage/eye irritation	Category 1
Carcinogenicity	Category 1A

Label elements - Emergency Overview

Danger

Hazard statements
Causes severe skin burns and eye damage
May cause cancer



Appearance Clear **Physical state** Liquid **Odor** No Information available

Precautionary Statements - Prevention
Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Use personal protective equipment as required. Do not breathe dust/fume/gas/mist/vapors/spray. Wash face, hands and any exposed skin thoroughly after handling.

Precautionary Statements - Response
Specific Treatment (See Section 4 on the SDS).
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor/physician.
IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower. Wash contaminated clothing before reuse.
IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. Immediately call a POISON CENTER or doctor/physician.
IF SWALLOWED: Rinse mouth. DO NOT induce vomiting.

Precautionary Statements - Storage
Store in a well-ventilated place. Keep container tightly closed. Keep out of reach of children.
Precautionary Statements - Disposal
Dispose of contents/container to an approved waste disposal plant.

Hazards not otherwise classified (HNOC)
Other Information
Unknown Acute Toxicity 0% of the mixture consists of ingredient(s) of unknown toxicity.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical Name	CAS No.	Weight-%	Trade Secret
Citric Acid	77-92-9	15-40	*
Sulfuric Acid	7664-93-9	.1-1	*

*The exact percentage (concentration) of composition has been withheld as a trade secret.

4. FIRST AID MEASURES

First aid measures

Skin Contact Wash off immediately with soap and plenty of water while removing all contaminated clothes and shoes. Wash contaminated clothing before reuse. If irritation persists or burns occur, get medical attention.

Eye contact Immediately flush with plenty of water. After initial flushing, remove any contact lenses and continue flushing for at least 15 minutes. Keep eye wide open while rinsing. Do not rub affected area. Seek immediate medical attention/advice.

Inhalation Remove to fresh air. Get medical attention for any breathing difficulty.

Ingestion Rinse mouth. Do NOT induce vomiting. Drink plenty of water. If symptoms persist, call a physician.

Self-protection of the first aider Use personal protective equipment as required.

Most important symptoms and effects, both acute and delayed

Symptoms No Information available.

Indication of any immediate medical attention and special treatment needed

Note to physicians Treat symptomatically.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media
Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

Unsuitable extinguishing media Caution: Use of water spray when fighting fire may be inefficient.

Specific hazards arising from the chemical
No Information available.

Explosion data
Sensitivity to Mechanical Impact None.
Sensitivity to Static Discharge None.

Protective equipment and precautions for firefighters
As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions Use personal protective equipment as required. Avoid contact with eyes and skin. Evacuate personnel to safe areas. Keep people away from and upwind of spill/leak.

Environmental precautions

Environmental precautions Prevent entry into waterways, sewers, basements or confined areas. Do not flush into surface water or sanitary sewer system. Prevent further leakage or spillage if safe to do so. Prevent product from entering drains.

Methods and material for containment and cleaning up

Methods for containment Prevent further leakage or spillage if safe to do so.

Methods for cleaning up Dilute material with sodium carbonate to a pH of 6.0.

7. HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling Ensure adequate ventilation, especially in confined areas. Use personal protective equipment as required. Use with local exhaust ventilation. Do not breathe dust/fume/gas/mist/vapors/spray.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep container tightly closed. Keep out of the reach of children. Keep containers tightly closed in a cool, well-ventilated place. Keep in properly labeled containers.

Incompatible materials None known based on information supplied.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure Guidelines This product, as supplied, does not contain any hazardous materials with occupational exposure limits established by the region specific regulatory bodies.

Chemical Name	ACGIH TLV	OSHA PEL	NIOSH IDLH
Sulfuric Acid 7664-93-9	TWA: 0.2 mg/m³ thoracic particulate matter	TWA: 1 mg/m³ (vacated) TWA: 1 mg/m³	IDLH: 15 mg/m³ TWA: 1 mg/m³

NIOSH IDLH Immediately Dangerous to Life or Health

Other Information Vacated limits revoked by the Court of Appeals decision in AFL-CIO v. OSHA, 965 F.2d 962 (11th Cir., 1992).

Appropriate engineering controls

Engineering Controls Showers, Eyewash stations & Ventilation systems.

Individual protection measures, such as personal protective equipment

Eye/face protection Tight sealing safety goggles. Face protection shield.

Skin and body protection Wear chemical resistant gloves.

Respiratory protection If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Positive-pressure supplied air respirators or air purifying respirators may be required for high airborne contaminant concentrations. Respiratory protection must be provided in accordance with current local regulations.

General Hygiene When using do not eat, drink or smoke. Wash contaminated clothing before reuse. Regular cleaning of equipment, work area and clothing is recommended.

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Physical state	Liquid
Appearance	Clear
Odor	No Information available
Odor threshold	No Information available

Property	Values	Remarks • Method
pH	<2	
Specific Gravity	1.173	
Viscosity	Not Applicable	**Remarks**
Melting point/freezing point	No Information available	
Boiling point / boiling range	No Information available	
Flash point		
Evaporation rate	No Information available	
Flammability (solid, gas)	No Information available	
Upper flammability limit:	No Information available	
Lower flammability limit:	No Information available	
Vapor pressure	No Information available	
Vapor density	No Information available	
Water solubility	No Information available	
Partition Coefficient (n-octanol/water)	No Information available	
Autoignition temperature	No Information available	
Decomposition temperature	No Information available	

Other Information

Density Lbs/Gal No Information available
VOC Content (%) No Information available

10. STABILITY AND REACTIVITY

Reactivity
No data available

Chemical stability
Stable under recommended storage conditions.

Possibility of Hazardous Reactions
None under normal processing.

Conditions to avoid
Extremes of temperature and direct sunlight.

Incompatible materials
None known based on information supplied.

Hazardous Decomposition Products
None known based on information supplied.

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

Product Information The primary effects and toxicity of this material are due to it corrosive nature.

Inhalation Causes burns.

Eye contact Corrosive to the eyes and may cause severe damage including blindness.

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

Ingestion Causes burns.

Chemical Name	Oral LD50	Dermal LD50	Inhalation LC50
Citric Acid 77-92-9	= 3 g/kg (Rat) = 3000 mg/kg (Rat)	-	-
Sulfuric Acid 7664-93-9	= 2140 mg/kg (Rat)	-	= 510 mg/m³ (Rat) 2 h

Information on toxicological effects

Symptoms No Information available.

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

Corrosivity Causes burns. Extremely corrosive and destructive to tissue. Risk of serious damage to eyes.
Sensitization No Information available.
Germ cell mutagenicity No Information available.
Carcinogenicity The table below indicates whether each agency has listed any ingredient as a carcinogen.

Chemical Name	ACGIH	IARC	NTP	OSHA
Sulfuric Acid 7664-93-9	A2	Group 1	Known	X

ACGIH (American Conference of Governmental Industrial Hygienists)
A2 - Suspected Human Carcinogen

IARC (International Agency for Research on Cancer)
Group 1 - Carcinogenic to Humans
NTP (National Toxicology Program)
Known - Known Carcinogen
OSHA (Occupational Safety and Health Administration of the US Department of Labor)
X - Present

Reproductive toxicity	No Information available.
STOT - single exposure	No Information available.
STOT - repeated exposure	No Information available.
Chronic toxicity	Avoid repeated exposure.
Aspiration hazard	No Information available.

Numerical measures of toxicity - Product Information

Unknown Acute Toxicity 0% of the mixture consists of ingredient(s) of unknown toxicity.
The following values are calculated based on chapter 3.1 of the GHS document .

12. ECOLOGICAL INFORMATION

Ecotoxicity

0% of the mixture consists of components(s) of unknown hazards to the aquatic environment

Chemical Name	Algae/aquatic plants	Fish	Crustacea
Citric Acid 77-92-9	-	1516: 96 h Lepomis macrochirus mg/L LC50 static	120: 72 h Daphnia magna mg/L EC50
Sulfuric Acid 7664-93-9	-	500: 96 h Brachydanio rerio mg/L LC50 static	29: 24 h Daphnia magna mg/L EC50

Persistence and degradability
No Information available.

Bioaccumulation
No Information available.

Chemical Name	Partition coefficient
Citric Acid 77-92-9	-1.72

Other adverse effects No Information available.

13. DISPOSAL CONSIDERATIONS

Waste treatment methods

Disposal of wastes	Disposal should be in accordance with applicable regional, national and local laws and regulations.
Contaminated packaging	Do not reuse container.
US EPA Waste Number	D002

This product contains one or more substances that are listed with the State of California as a hazardous waste.

Chemical Name	California Hazardous Waste Status
Sulfuric Acid 7664-93-9	Toxic Corrosive

14. TRANSPORT INFORMATION

The shipping classification information in this section (Section 14) is meant as a guide to the overall classification of the product. However, transportation classifications may be subject to change with changes in package size. Consult shipper requirements under 49 CFR, IATA and IMDG to assure regulatory compliance.

DOT

DOT Proper Shipping name UN1760, Corrosive Liquid, n.o.s. (contains Sulfuric Acid), 8, II

15. REGULATORY INFORMATION

International Inventories

TSCA	Complies
DSL/NDSL	Complies
EINECS/ELINCS	Complies
ENCS	Does not comply
IECSC	Complies
KECL	Complies
PICCS	Complies
AICS	Complies

Legend:

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
AICS - Australian Inventory of Chemical Substances

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).

Chemical Name	CWA - Reportable Quantities	CWA - Toxic Pollutants	CWA - Priority Pollutants	CWA - Hazardous Substances
Sulfuric Acid 7664-93-9	1000 lb	-	-	X

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.

Chemical Name	Hazardous Substances RQs	CERCLA/SARA RQ	Reportable Quantity (RQ)
Sulfuric Acid 7664-93-9	1000 lb	1000 lb	RQ 1000 lb final RQ RQ 454 kg final RQ

US State Regulations

California Proposition 65

This product contains chemicals known to the state of California to cause cancer, or birth defects or other reproductive harm.

Chemical Name	California Proposition 65
Sulfuric Acid - 7664-93-9	Carcinogen

U.S. State Right-to-Know Regulations

Chemical Name	New Jersey	Massachusetts	Pennsylvania
Sulfuric Acid 7664-93-9	X	X	X

U.S. EPA Label Information

EPA Pesticide Registration Number Not Applicable

16. OTHER INFORMATION

HMIS	**Health hazards** 2	**Flammability** 0	**Physical hazards** 0	**Personal protection** X

Legend

N/A - Not Applicable
N/E - Not Established
N/D - Not Determined
N/K - Not Known

Issue Date 08-May-2014
Revision Date 01-Apr-2023
Revision Note No Information available

Disclaimer

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

End of Safety Data Sheet