

**AGREEMENT FOR THE PURCHASE OF GOODS AND SERVICES**

THIS AGREEMENT FOR THE PURCHASE OF GOODS AND SERVICES ("Agreement") is made \_\_\_\_\_, 2016, between Brenntag Pacific, Inc. ("Contractor"), whose address is 10747 Patterson Place, Santa Fe Springs, California 90670 and telephone number is 562-903-9626 and the City of Stockton, a municipal corporation ("City").

In consideration of the mutual promises set forth in this Agreement, the parties agree as follows:

1. Goods to be provided and services to be performed. Contractor shall provide the goods and perform the services as set forth on the attached Exhibit A incorporated herein by reference Contractor shall begin providing the goods/performing the services by July 1, 2016 and complete providing the goods/performing the services by June 30, 2017; provided, however, the parties may agree to change the beginning or ending date(s).

2. Compensation. For the goods and services under this Agreement, City shall pay Contractor the sum of \$ 0.2200 per dry pound of 25% Sodium Hydroxide and \$0.1990 per dry pound 50% Sodium Hydroxide.

3. Method of Payment. City shall pay Contractor within 30 days from the date Contractor's invoices are approved by the City Manager. Contractor shall submit monthly invoices.

4. Maintenance. Contractor shall maintain the goods as set forth in Exhibit A at a cost as set forth in Exhibit A. Contractor shall respond to calls for required maintenance from City personnel within 24 hours of the call; required maintenance occurs when the self check system fails to perform any of its functions. If Contractor is unable to resolve routine maintenance issues by phone within 48 hours, Contractor shall provide to City Operations personnel a resolution report indicating how and when the Contractor intends to resolve the issue. Within the period of the maintenance agreement, Contractor shall implement all software and firmware upgrades to the goods identified in Exhibit A at no cost to City. If software and firmware upgrades require a hardware upgrade, Contractor shall provide the upgraded hardware at no cost to the City. City personnel shall review and approve any upgrades prior to their installation.

5. Warranty. Contractor warrants that for one year the goods installed shall be free of defects in materials and workmanship. The one-year period shall begin upon the date the City provides in writing to Contractor acceptance of the goods. The warranty under this section shall provide coverage equal to or greater than those warranties that are customary in the industry and, at a minimum, include all parts and labor,

6. Indemnification. Contractor shall indemnify, save and hold harmless from and defend the City, members of the City Council and employees, agents and volunteers, against any and all claims, costs, demands, causes of action, suits, losses, and expense, including

attorneys fees, arising from or out of acts or omissions of Contractor, its officials, employees, agents or sub-contractors, in connection with the goods and services that the Contractor is to provide/perform under this Agreement, except where caused by the active or sole negligence of City, or City's willful misconduct.

7. Insurance. During the term of this Agreement, Contractor shall maintain in full force and effect at its own cost and expense the insurance coverage set forth on the attached Exhibit B and shall otherwise comply with the provisions of Exhibit B.

8. Business License. Prior to its execution of this Agreement, Contractor shall obtain a City business license.

9. Audit. City reserves the right to periodically audit all charges for good and services provided by Contractor.

10. Ownership of Goods. All goods accepted by the City shall be the property of the City.

11. Changes to the Agreement. This Agreement may not be modified except in writing by both parties.

12. Applicable Law. This Agreement shall be governed by the laws of the State of California and venue for any action brought in state court shall be in the Superior Court, County of San Joaquin, Stockton Branch or, for actions brought in federal court, the United States District Court for the Eastern District of California, Sacramento Division.

13. Non-Assignability. Contractor shall not assign or transfer this Agreement or any interest or obligation in this Agreement without the prior written consent of the City and then only upon such terms and conditions as City may set forth in writing.

14. Notices. All notices herein required shall be in writing and shall be sent certified or registered mail, postage prepaid, addressed as follows:

To Contractor: Brenntag Pacific, Inc.	To City:	City Manager
Attn: Laura Tua		City of Stockton
10747 Patterson Place		425 N. El Dorado St.
Santa Fe Springs, CA 90670		Stockton, CA 95202

15. Conformance to Applicable Laws. Contractor shall comply with all applicable Federal, State and Municipal laws, rules and ordinances. Contractor shall not discriminate in the employment of persons or in providing services under this Agreement on the basis of any legally protected classification including race, color, national origin, sex or religion of such person.

16. Miscellaneous Provisions.

a. City may terminate this Agreement at any time by mailing notice to Contractor at the address first stated above. Contractor shall be paid for that portion of goods provided / services provided when notice is received.

b. Contractor shall not assign or transfer this Agreement.

c. In the performance of this Agreement, Contractor, its employees and agents shall have the status of an independent contractor and not as an employee of the City for any purpose.

d. If either City or Contractor waives a breach of this Agreement, such waiver shall not constitute a waiver of other or succeeding breaches of this Agreement.

e. This Agreement constitutes the entire understanding of the parties.

IN WITNESS WHEREOF, the parties hereto have executed this Agreement the date and year first above written.

**CITY OF STOCKTON**

**CONTRACTOR NAME**

\_\_\_\_\_  
KURT O. WILSON  
CITY MANAGER

By: \_\_\_\_\_  
Signature

\_\_\_\_\_  
Print name

Title: \_\_\_\_\_

*[If Contractor is a corporation, signatures must comply with Corporations Code §313]*

ATTEST:

APPROVED AS TO FORM

\_\_\_\_\_  
BONNIE PAIGE  
CITY CLERK

\_\_\_\_\_  
JOHN LUEBBERKE  
CITY ATTORNEY

**STANDARD AGREEMENT, PAGE 1 OF 2**  
**BAY AREA CHEMICAL CONSORTIUM**  
**BID NO. 13-2016**  
**SUPPLY AND DELIVERY OF SODIUM HYDROXIDE**

Bay Area Chemical Consortium (BACC)  
c/o Dublin San Ramon Services District  
Regional Wastewater Treatment Facility  
7399 Johnson Drive  
Pleasanton, CA 94588

Dear Sirs:

I hereby agree to furnish sodium hydroxide identified in the attached bid forms, as solicited by the Bay Area Chemical Consortium (BACC), to one or more of the participating BACC Agencies.

Company: Brenntag Pacific, Inc.  
Address: 10747 Patterson Place  
City, State, ZIP: Santa Fe Springs, CA 90670  
Phone: (562) 903-9626  
Email: Ltua@brenntag.com  
Authorized Representative: Kosta Skourtis  
Signature:   
Date: March 28, 2016

WE ACKNOWLEDGE RECEIVING ADDENDUM/ADDENDA NUMBER \_\_\_\_\_ THROUGH \_\_\_\_\_.

SPECIFIC DEVIATIONS (if applicable, attach additional sheets if necessary):

**STANDARD AGREEMENT, PAGE 2 OF 2****BIDDER INFORMATION**

1. Legal Name of Bidder:  
Brenntag Pacific, Inc.
- 
2. Bidder's Street Address:  
10747 Patterson Place, Santa Fe Springs, CA 90670
- 
3. Mailing Address:  
same as above
- 
4. Business Telephone: (562) 903-9616 Fax Number: (562) 944-7484
5. Type of Supplier:  
 Sole Proprietor       Partnership       Corporation  
 If Corporation, indicate State where incorporated: Delaware
6. Business License Number issued by the City where the Supplier's principal place of business is located.  
 Number: 0580-10747-0000 Issuing City: Santa Fe Springs
7. Supplier Federal Tax Identification Number: 20-0552611
8. Emergency Contact: Name: Don Doodokyan  
 Phone Number: (415) 713-9683
9. Order Contact: Name: Don Doodokyan/ Customer Service Dept.  
 Address: 860 Wharf St., Richmond, CA 94804  
 Phone Number: 510.970.7540 Fax Number: 510.235.4182  
 Email: ddoodokyan@brenntag.com
10. References:
- | <u>Company/Agency Name</u>     | <u>Contact Name</u> | <u>Phone Number</u> |
|--------------------------------|---------------------|---------------------|
| 1) Dublin San Ramon            | Louanne Ivy         | (925) 875-2398      |
| 2) Santa Clara Valley Water    | Don Cook            | (408) 265-2607      |
| 3) Vallejo Sanitation District | Dan Ferguson        | (707) 644-8949      |
11. Chemical Manufacturer's name and address (if different from Bidder):  
 Brenntag Global Marketing
- 
- 
-

**Non-Collusion Affidavit  
To Be Executed By Bidder and Submitted With Bid**

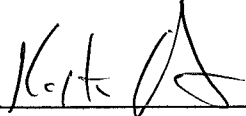
State of California )  
 ) ss.  
County of Los Angeles )

Kosta Skourtis, being first duly sworn, deposes and says that he or she is  
(Contractor's Authorized Representative)

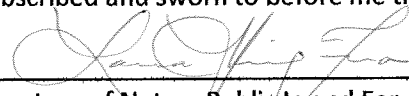
Vice President-Southern Region of Brenntag Pacific, Inc. the party making the  
(Title of Representative) (Contractor's Name)

Foregoing bid that the bid is not made in the interest of, or on behalf of, any undisclosed person, partnership, company, association, organization, or corporation; that the bid is genuine and not collusive or sham; that the bidder has not directly or indirectly induced or solicited any other bidder to put in a false or sham bid, and has not directly or indirectly colluded, conspired, connived, or agreed with any bidder or anyone else to put in a sham bid, or that anyone shall refrain from bidding; that the bidder has not in any manner, directly or indirectly, sought by agreement, communication, or conference with anyone to fix the bid price of the bidder or any other bidder, or to fix any overhead, profit, or cost element of the bid price, or of that of any other bid, or to secure any advantage against the public body awarding the contract of anyone interested in the proposed contract; that all statements contained in the bid are true; and, further, that the bidder has not, directly or indirectly, submitted his or her bid price or any breakdown thereof, or the contents thereof, or divulged information or data relative thereto, or paid, and will not pay, any fee to any corporation, partnership, company association, organization, bid depository, or to any member or agent thereof to effectuate a collusive or sham bid.

I declare under penalty of perjury under the laws of the state of California that the foregoing is true and correct.

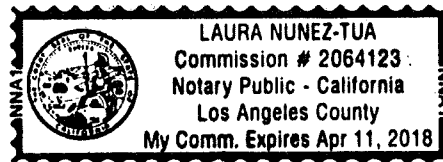
  
Signature of: President, Secretary,  
Manager, Owner, or Representative

Subscribed and sworn to before me this, 28 Day of March, 2016

  
Signature of Notary Public In and For

The County of Los Angeles

State of California



**All Signatures Must Be Witnessed By Notary**

**BAY AREA CHEMICAL CONSORTIUM  
BID FORM FOR BID NO. 13-2016, PAGE 1 OF 2**

Sealed bids must be enclosed in an envelope clearly marked:

**"BID FOR SODIUM HYDROXIDE  
BACC BID NO. 13-2016"**

And delivered to:

Louanne Ivy  
Administrative Analyst – Operations  
Dublin San Ramon Services District  
Regional Wastewater Treatment Facility  
7399 Johnson Drive  
Pleasanton, CA 94588

No later than 9:00 A.M. PDT  
Tuesday, April 5, 2016

Business Name:  
Brenntag Pacific, Inc.

Business Address  
10747 Patterson Place  
Santa Fe Springs, CA 90670

Telephone Number: (562) 903-9626

Facsimile Number: (562) 944-7484

Email Address: Ltua@brenntag.com

Authorized Representative (Please Print):  
Kosta Skourtis

Date: March 28, 2016

- I. All costs except California State sales tax for the purchase of sodium hydroxide must be included in the amount shown below on this Bid Form, including any and all mill assessments, fees, excise taxes, transportation charges, etc. Any exceptions to the bid must be noted under Specific Deviations on the Standard Agreement. Bidders shall submit bids in \$/dry lb.**

**BACC Agencies: North Bay Locations**

Central Contra Costa Sanitary District, City of Antioch, City of Martinez, City of Pittsburg, Contra Costa Water District, and West County Wastewater District.

Unit Price for 30% Sodium Hydroxide: \$ 0.2123 /dry lb.

Unit Price for 50% Sodium Hydroxide: \$ 0.1963 /dry lb.

**BACC Agencies: East Bay Locations**

Alameda County Water District

Unit Price for 50% Sodium Hydroxide: \$ 0.1963 /dry lb.

**BACC Agencies: South Bay Locations**

City of Sunnyvale and Santa Clara Valley Water District

Unit Price for 25% Sodium Hydroxide: \$ 0.2123 /dry lb.

Unit Price for 50% Sodium Hydroxide: \$ 0.1963 /dry lb.

**BAY AREA CHEMICAL CONSORTIUM  
BID FORM FOR BID NO. 13-2016, PAGE 2 OF 2**

**BACC Agencies:** Tri-Valley Locations

Zone 7 Water Agency

Unit Price for 25% Sodium Hydroxide: \$ 0.2123 /dry lb.  
Unit Price for 50% Sodium Hydroxide: \$ 0.1963 /dry lb.

**BACC Agencies:** Marin-Sonoma-Napa Locations

Marin Municipal Water District, Napa Sanitation District and North Marin Water District

Unit Price for 25% Sodium Hydroxide: \$ 0.2163 /dry lb.  
Unit Price for 50% Sodium Hydroxide: \$ 0.1982 /dry lb.

**BACC Agencies:** Central Valley Locations

City of Stockton

Unit Price for 25% Sodium Hydroxide: \$ 0.22 /dry lb.  
Unit Price for 50% Sodium Hydroxide: \$ 0.1990 /dry lb.

**BACC Agencies:** Sacramento Area Locations

Carmichael Water District, City of Roseville, City of Yuba City, El Dorado Irrigation District, Nevada Irrigation District, Placer County Water Agency, Rancho Murieta Community Services District, Sacramento County Water Agency, and Woodland Davis Clean Water Agency

Unit Price for 25% Sodium Hydroxide: \$ 0.22 /dry lb.  
Unit Price for 30% Sodium Hydroxide: \$ 0.22 /dry lb.  
Unit Price for 50% Sodium Hydroxide: \$ 0.1990 /dry lb.

**OPTIONAL BID ITEM:** Nevada Irrigation DistrictUnit Price for 25% Sodium Hydroxide in totes: \$ 0.76 /dry lb.**II. Bidders must submit all of the following, attached to this Bid Form:**

- a. An affidavit of compliance to the appropriate American Water Works Association (AWWA) and/or National Sanitation Foundation (NSF) standard is required for all chemicals and polymers being provided for potable water treatment. Bidders must include a statement by the chemical manufacturer, signed by an authorized representative on letterhead stationery, attesting to the affidavit's validity. In lieu of submitting an affidavit of compliance with AWWA/NSF standards and a letter attesting to the affidavit's validity, a current printout from NSF.org is acceptable.
- b. A representative analysis of the chemical to be supplied, as prepared by a reputable outside laboratory or Bidder's in-house laboratory if ISO certified.
- c. Product Bulletin and Typical Properties.
- d. Safety Data Sheet (SDS).
- e. If applicable, the name, address, and contact information for the third party hauling company as well as an affidavit signed by the Bidder that the third party hauler can and will deliver the chemical to each and every participating BACC Agency.



## Bay Area Chemical Consortium

### INFORMATION REQUIRED OF SUPPLIER

- **Sales Office**

Brenntag Pacific, Inc.  
860 Wharf Street  
Richmond, CA 94804  
(510) 970-7540 Fax (510) 235-4182

- **Normal Business Hours:** 7:30 a.m. – 5:30 p.m.

- **Contact Person(s) and email address:**

Don Doodokyan, Account Manager  
[ddoodokyan@brenntag.com](mailto:ddoodokyan@brenntag.com)  
(510) 970-7540 Office  
(415) 713-9683 Mobile

- **Ordering Information:**

Telephone Number(s): (510) 570-7540  
After hours: (510) 570-7540  
Don Doodokyan: (415) 713-9683

- **Chemical Emergency Assistance (24 hours/7 days a week)**

Telephone Numbers(s): 800-424-9300

- **MSDS:**

Attached

- **Current NSF 60 certification for the chemical works of origin for product:**

Attached

*Brenntag Pacific, Inc. Regional Headquarters  
10747 Patterson Place, Santa Fe Springs, CA 90670 (562) 903-9626*



The Public Health and Safety Organization

## NSF Product and Service Listings

These NSF Official Listings are current as of **Monday, March 28, 2016** at 12:15 a.m. Eastern Time. Please contact NSF International to confirm the status of any Listing, report errors, or make suggestions.

Alert: NSF is concerned about fraudulent downloading and manipulation of website text. Always confirm this information by clicking on the below link for the most accurate information:

<http://info.nsf.org/Certified/PwsChemicals/Listings.asp?CompanyName=Brenntag+Pacific%2C+Inc%2E&ChemicalName=Sodium+Hydroxide&PlantState=California+CA&>

### NSF/ANSI 60 Drinking Water Treatment Chemicals - Health Effects

#### Brenntag Pacific, Inc.

10747 Patterson Place  
Santa Fe Springs, CA 90670  
United States  
323-562-9500

**Facility :** Fresno, CA

#### Sodium Hydroxide

<i>Trade Designation</i>	<i>Product Function</i>	<i>Max Use</i>
Caustic Soda Solution, 25%	Corrosion & Scale Control pH Adjustment	200mg/L
Caustic Soda Solution, 30%	Corrosion & Scale Control pH Adjustment	165mg/L
Caustic Soda Solution, 50%	Corrosion & Scale Control pH Adjustment	100mg/L
Sodium Hydroxide Solution, 25%	Corrosion & Scale Control pH Adjustment	200mg/L

Sodium Hydroxide Solution, 30%	Corrosion & Scale Control pH Adjustment	165mg/L
Sodium Hydroxide Solution, 50%	Corrosion & Scale Control pH Adjustment	100mg/L
Sodium Hydroxide, 25%	Corrosion & Scale Control pH Adjustment	200mg/L
Sodium Hydroxide, 30%	Corrosion & Scale Control pH Adjustment	165mg/L
Sodium Hydroxide, 50%	Corrosion & Scale Control pH Adjustment	100mg/L

**Facility : Richmond, CA****Sodium Hydroxide****Trade Designation**

	<b>Product Function</b>	<b>Max Use</b>
Caustic Soda Solution, 50%	Corrosion & Scale Control pH Adjustment	100mg/L
Sodium Hydroxide Solution, 50%	Corrosion & Scale Control pH Adjustment	100mg/L
Sodium Hydroxide, 50%	Corrosion & Scale Control pH Adjustment	100mg/L

**Facility : South Gate, CA****Sodium Hydroxide****Trade Designation**

	<b>Product Function</b>	<b>Max Use</b>
Sodium Hydroxide Solution, 20%	Corrosion & Scale Control pH Adjustment	250mg/L
Sodium Hydroxide Solution, 25%	Corrosion & Scale Control pH Adjustment	200mg/L
Sodium Hydroxide Solution, 30%	Corrosion & Scale Control pH Adjustment	167mg/L
Sodium Hydroxide Solution, 50%	Corrosion & Scale Control pH Adjustment	100mg/L
Sodium Hydroxide, 20%	Corrosion & Scale Control pH Adjustment	250mg/L

Sodium Hydroxide, 25%	Corrosion & Scale Control pH Adjustment	200mg/L
Sodium Hydroxide, 30%	Corrosion & Scale Control pH Adjustment	167mg/L
Sodium Hydroxide, 50%	Corrosion & Scale Control pH Adjustment	100mg/L

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Number of matching Manufacturers is 1

Number of matching Products is 20

Processing time was 0 seconds



## **PRODUCT SPECIFICATION**

### **Liquid Caustic Soda, 30%**

**Product Grade:** Membrane  
**Chemical Name:** Sodium Hydroxide (NaOH)

Parameter		Unit	Specification
<b>Sodium Hydroxide</b>	<b>(NaOH)</b>	Wt. %	29 – 32
<b>Sodium Oxide</b>	<b>(Na<sub>2</sub>O)</b>	Wt. %	22.5 – 23.7
<b>Sodium Chloride</b>	<b>(NaCl)</b>	PPM	100 MAX
<b>Sodium Carbonate</b>	<b>(Na<sub>2</sub>CO<sub>3</sub>)</b>	Wt. %	0.15 MAX
<b>Sodium Chlorate</b>	<b>(NaClO<sub>3</sub>)</b>	PPM	25 MAX
<b>Sodium Sulfate</b>	<b>(Na<sub>2</sub>SO<sub>4</sub>)</b>	PPM	80 MAX
<b>Iron</b>	<b>(Fe)</b>	PPM	5.0 MAX
<b>Nickel</b>	<b>(Ni)</b>	PPM	0.5 MAX
<b>Mercury</b>	<b>(Hg)</b>	PPM	2 MAX
<b>Specific Gravity</b>			1.25 – 1.40

# CERTIFICATE OF ANALYSIS



## Liquid Caustic Soda, 30%

Product Grade: **Membrane**  
Location: **Richmond, CA**

ANALYSIS	RESULT	UNIT	SPEC LIMITS	METHOD
SODIUM HYDROXIDE (NaOH)	29.48	Wt %	29.00 - 32.00	ITM 4201
SODIUM OXIDE (Na <sub>2</sub> O)	22.84	Wt %	22.5 - 23.7	ITM 4201
SODIUM CHLORIDE (NaCl)	<100	PPM	100 Max	ASTM E1787
SODIUM CARBONATE (Na <sub>2</sub> CO <sub>3</sub> )	<0.15	Wt %	0.15 Max	ITM 4201
SODIUM CHLORATE (NaClO <sub>3</sub> )	<25	PPM	25 Max	ASTM E1787
SODIUM SULFATE (Na <sub>2</sub> SO <sub>4</sub> )	<80	PPM	80 Max	ASTM E1787
IRON (Fe)	<5	PPM	5.0 Max	ASTM E291
Nickel (Ni)	<0.5	PPM	0.5 Max	ICP
COLOR (DESCRIPTION)	Clear			ITM 1017
SPECIFIC GRAVITY (@ 60 °F)	1.33			ASTM D4052

PRODUCT NUMBER 279149  
 LOT NUMBER 305886  
 ANALYSIS PERFORMED BY Intertek<sup>1</sup>  
 EFFECTIVE DATE 5/1/2015

NOTE: This product meets all provisions of Food Chemicals Codex, Latest Edition (FCC)  
 Certified to NSF/ANSI Standard 60, MUL 100mg/L

<sup>1</sup>Results are calculated based on analysis of liquid caustic soda 50% performed by Intertek

Leo Fialla



Brenntag Global Marketing, LLC  
 4620 Creekstone Drive, Suite 140  
 Durham, NC 27703 (USA)  
 T +1 919-474-3400  
 F +1 919-472-0409



# CERTIFICATE OF ANALYSIS



## Liquid Caustic Soda, 25%

Product Grade: **Membrane**  
Location: **Richmond, CA**

ANALYSIS	RESULT	UNIT	SPEC LIMITS	METHOD
SODIUM HYDROXIDE (NaOH)	24.57	Wt %	23.00 - 27.00	ITM 4201
SODIUM OXIDE (Na <sub>2</sub> O)	19.04	Wt %	15.5 - 20.2	ITM 4201
SODIUM CHLORIDE (NaCl)	<100	PPM	100 Max	ASTM E1787
SODIUM CARBONATE (Na <sub>2</sub> CO <sub>3</sub> )	<0.15	Wt %	0.15 Max	ITM 4201
SODIUM CHLORATE (NaClO <sub>3</sub> )	<25	PPM	25 Max	ASTM E1787
SODIUM SULFATE (Na <sub>2</sub> SO <sub>4</sub> )	<80	PPM	80 Max	ASTM E1787
IRON (Fe)	<5	PPM	5.0 Max	ASTM E291
Nickel (Ni)	<0.5	PPM	0.5 Max	ICP
COLOR (DESCRIPTION)	Clear			ITM 1017
SPECIFIC GRAVITY (@ 60 °F)	1.28			ASTM D4052

PRODUCT NUMBER 666793  
 LOT NUMBER 305886  
 ANALYSIS PERFORMED BY Intertek<sup>1</sup>  
 EFFECTIVE DATE 5/1/2015

NOTE: This product meets all provisions of Food Chemicals Codex, Latest Edition (FCC)  
 Certified to NSF/ANSI Standard 60, MUL 100mg/L

<sup>1</sup>Results are calculated based on analysis of liquid caustic soda 50% performed by Intertek

Leo Fialla



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## **PRODUCT SPECIFICATION**

### **Liquid Caustic Soda, 25%**

**Product Grade:** Membrane  
**Chemical Name:** Sodium Hydroxide (NaOH)

Parameter		Unit	Specification
<b>Sodium Hydroxide</b>	<b>(NaOH)</b>	Wt. %	23 – 27
<b>Sodium Oxide</b>	<b>(Na<sub>2</sub>O)</b>	Wt. %	15.5 – 20.2
<b>Sodium Chloride</b>	<b>(NaCl)</b>	PPM	100 MAX
<b>Sodium Carbonate</b>	<b>(Na<sub>2</sub>CO<sub>3</sub>)</b>	Wt. %	0.15 MAX
<b>Sodium Chlorate</b>	<b>(NaClO<sub>3</sub>)</b>	PPM	25 MAX
<b>Sodium Sulfate</b>	<b>(Na<sub>2</sub>SO<sub>4</sub>)</b>	PPM	80 MAX
<b>Iron</b>	<b>(Fe)</b>	PPM	5.0 MAX
<b>Nickel</b>	<b>(Ni)</b>	PPM	0.5 MAX
<b>Mercury</b>	<b>(Hg)</b>	PPM	2 MAX
<b>Specific Gravity</b>			1.20 – 1.35

# CERTIFICATE OF ANALYSIS

**BRENTAG**

## Liquid Caustic Soda, 50%

Product Grade: **Diaphragm**  
 Tank Number: **55-1**  
 Location: **Richmond, CA**

ANALYSIS	RESULT	UNIT	SPEC LIMITS	METHOD
SODIUM HYDROXIDE (NaOH)	50.00	Wt %	48.5 - 51.0	ITM 4201
SODIUM OXIDE (Na <sub>2</sub> O)	38.74	Wt.%	37.59 - 39.52	ITM 4201
SODIUM CHLORIDE (NaCl)	43	PPM	100 Max	ASTM E1787
SODIUM CARBONATE (Na <sub>2</sub> CO <sub>3</sub> )	0.11	Wt.%	0.15 Max	ITM 4201
SODIUM CHLORATE (NaClO <sub>3</sub> )	23	PPM	-	ASTM E1787
SODIUM SULFATE (Na <sub>2</sub> SO <sub>4</sub> )	23	PPM	80 Max	ASTM E1787
IRON (Fe)	<0.1	PPM	5.0 Max	ITM 1059
COLOR (DESCRIPTION)	Clear			ITM 1017
SPECIFIC GRAVITY (@ 60 °F)	1.5279			ITM 4204

PRODUCT NUMBER 62409  
 LOT NUMBER 304388/304859  
 ANALYSIS PERFORMED BY Intertek  
 EFFECTIVE DATE 1/8/2015

NOTE: This product meets all provisions of Food Chemicals Codex, Latest Edition (FCC)  
 Certified to NSF/ANSI Standard 60, MÜL 100mg/L



Leo Fiella



Brenntag Global Marketing, LLC  
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 T +1 919-474-3400  
 F +1 919-472-0409





# SAFETY DATA SHEET

## 1. Identification

**Product identifier** SODIUM HYDROXIDE 30% DIA  
**Other means of identification** None.  
**Recommended use** ALL PROPER AND LEGAL PURPOSES  
**Recommended restrictions** None known.  
**Manufacturer/Importer/Supplier/Distributor information**  
**Manufacturer**  
**Company name** Brenntag Pacific Inc.  
**Address** 10747 Patterson Place  
 Santa Fe Springs, CA 90670  
**Telephone** 562-903-9626  
**E-mail** Not available.  
**Emergency phone number** 800-424-9300 CHEMTREC

## 2. Hazard(s) identification

**Physical hazards** Not classified.  
**Health hazards** Skin corrosion/irritation Category 1A  
 Serious eye damage/eye irritation Category 1  
**Environmental hazards** Not classified.  
**OSHA defined hazards** Not classified.  
**Label elements**



**Signal word** Danger  
**Hazard statement** Causes severe skin burns and eye damage. Causes serious eye damage.  
**Precautionary statement**  
**Prevention** Do not breathe mist or vapor. Wash thoroughly after handling. 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/shower. 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. Immediately call a poison center/doctor. Wash contaminated clothing before reuse.  
**Storage** Store locked up.  
**Disposal** Dispose of contents/container in accordance with local/regional/national/international regulations.  
**Hazard(s) not otherwise classified (HNOC)** None known.  
**Supplemental information** None.

## 3. Composition/information on ingredients

### Mixtures

Chemical name	Common name and synonyms	CAS number	%
SODIUM HYDROXIDE (NA(OH))		1310-73-2	30
Other components below reportable levels			70

\*Designates that a specific chemical identity and/or percentage of composition has been withheld as a trade secret.

**4. First-aid measures**

<b>Inhalation</b>	Move to fresh air. Call a physician if symptoms develop or persist.
<b>Skin contact</b>	Take off immediately all contaminated clothing. Rinse skin with water/shower. Call a physician or poison control center immediately. Chemical burns must be treated by a physician. Wash contaminated clothing before reuse.
<b>Eye contact</b>	Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Call a physician or poison control center immediately.
<b>Ingestion</b>	Call a physician or poison control center immediately. Rinse mouth. Do not induce vomiting. If vomiting occurs, keep head low so that stomach content doesn't get into the lungs.
<b>Most important symptoms/effects, acute and delayed</b>	Burning pain and severe corrosive skin damage. Causes serious eye damage. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Permanent eye damage including blindness could result.
<b>Indication of immediate medical attention and special treatment needed</b>	Provide general supportive measures and treat symptomatically. Chemical burns: Flush with water immediately. While flushing, remove clothes which do not adhere to affected area. Call an ambulance. Continue flushing during transport to hospital. Keep victim under observation. Symptoms may be delayed.
<b>General information</b>	Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves.

**5. Fire-fighting measures**

<b>Suitable extinguishing media</b>	Water fog. Foam. Dry chemical powder. Carbon dioxide (CO <sub>2</sub> ).
<b>Unsuitable extinguishing media</b>	Do not use water jet as an extinguisher, as this will spread the fire.
<b>Specific hazards arising from the chemical</b>	During fire, gases hazardous to health may be formed.
<b>Special protective equipment and precautions for firefighters</b>	Self-contained breathing apparatus and full protective clothing must be worn in case of fire.
<b>Fire fighting equipment/instructions</b>	Move containers from fire area if you can do so without risk.
<b>Specific methods</b>	Use standard firefighting procedures and consider the hazards of other involved materials.
<b>General fire hazards</b>	No unusual fire or explosion hazards noted.

**6. Accidental release measures**

<b>Personal precautions, protective equipment and emergency procedures</b>	Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Wear appropriate protective equipment and clothing during clean-up. Do not breathe mist or vapor. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ensure adequate ventilation. Local authorities should be advised if significant spillages cannot be contained. For personal protection, see section 8 of the SDS.
<b>Methods and materials for containment and cleaning up</b>	Large Spills: Stop the flow of material, if this is without risk. Dike the spilled material, where this is possible. Cover with plastic sheet to prevent spreading. Absorb in vermiculite, dry sand or earth and place into containers. Following product recovery, flush area with water.  Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination.  Never return spills to original containers for re-use. For waste disposal, see section 13 of the SDS.
<b>Environmental precautions</b>	Avoid discharge into drains, water courses or onto the ground.

**7. Handling and storage**

<b>Precautions for safe handling</b>	Do not breathe mist or vapor. Do not get in eyes, on skin, or on clothing. Avoid prolonged exposure. Provide adequate ventilation. Wear appropriate personal protective equipment. Observe good industrial hygiene practices.
<b>Conditions for safe storage, including any incompatibilities</b>	Store locked up. Store in original tightly closed container. Store away from incompatible materials (see Section 10 of the SDS).

## 8. Exposure controls/personal protection

### Occupational exposure limits

#### US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)

Components	Type	Value
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)	PEL	2 mg/m <sup>3</sup>

#### US. ACGIH Threshold Limit Values

Components	Type	Value
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)	Ceiling	2 mg/m <sup>3</sup>

#### US. NIOSH: Pocket Guide to Chemical Hazards

Components	Type	Value
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)	Ceiling	2 mg/m <sup>3</sup>

### 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. Eye wash facilities and emergency shower must be available when handling this product.

### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles) and a face shield.

#### Skin protection

##### Hand protection

Wear appropriate chemical resistant gloves. Suitable gloves can be recommended by the glove supplier.

##### Other

Wear appropriate chemical resistant clothing.

#### Respiratory protection

In case of insufficient ventilation, wear suitable respiratory equipment.

#### Thermal hazards

Wear appropriate thermal protective clothing, when necessary.

### General hygiene considerations

Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants.

## 9. Physical and chemical properties

### Appearance

#### Physical state

Liquid.

#### Form

Liquid.

#### Color

CLEAR COLORLESS

### Odor

SWEET PUNGENT

### Odor threshold

Not available.

### pH

Not available.

### Melting point/freezing point

38 °F (3.33 °C)

### Initial boiling point and boiling range

907.52 °F (486.4 °C) estimated

### Flash point

Not available.

### Evaporation rate

Not available.

### Flammability (solid, gas)

Not applicable.

### Upper/lower flammability or explosive limits

#### Flammability limit - lower (%)

Not available.

#### Flammability limit - upper (%)

Not available.

#### Explosive limit - lower (%)

Not available.

#### Explosive limit - upper (%)

Not available.

Vapor pressure	Not available.
Vapor density	Not available.
Relative density	Not available.
Solubility(ies)	
Solubility (water)	Not available.
Partition coefficient (n-octanol/water)	Not available.
Auto-ignition temperature	Not available.
Decomposition temperature	Not available.
Viscosity	Not available.
Other information	
Density	11.11 lbs/gal
Explosive properties	Not explosive.
Oxidizing properties	Not oxidizing.
Percent volatile	70 % estimated
Specific gravity	1.33

## 10. Stability and reactivity

Reactivity	The product is stable and non-reactive under normal conditions of use, storage and transport.
Chemical stability	Material is stable under normal conditions.
Possibility of hazardous reactions	Hazardous polymerization does not occur.
Conditions to avoid	Contact with incompatible materials.
Incompatible materials	Strong acids.
Hazardous decomposition products	No hazardous decomposition products are known.

## 11. Toxicological information

### Information on likely routes of exposure

Inhalation	May cause irritation to the respiratory system. Prolonged inhalation may be harmful.
Skin contact	Causes severe skin burns.
Eye contact	Causes serious eye damage.
Ingestion	Causes digestive tract burns.

**Symptoms related to the physical, chemical and toxicological characteristics** Burning pain and severe corrosive skin damage. Causes serious eye damage. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Permanent eye damage including blindness could result.

### Information on toxicological effects

Acute toxicity	Not available.
Skin corrosion/irritation	Causes severe skin burns and eye damage.
Serious eye damage/eye irritation	Causes serious eye damage.

### Respiratory or skin sensitization

Respiratory sensitization	Not a respiratory sensitizer.
Skin sensitization	This product is not expected to cause skin sensitization.

**Germ cell mutagenicity** No data available to indicate product or any components present at greater than 0.1% are mutagenic or genotoxic.

**Carcinogenicity** This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.

#### IARC Monographs. Overall Evaluation of Carcinogenicity

Not available.

#### OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Not listed.

#### US. National Toxicology Program (NTP) Report on Carcinogens

Not available.

**Reproductive toxicity** This product is not expected to cause reproductive or developmental effects.  
**Specific target organ toxicity - single exposure** Not classified.  
**Specific target organ toxicity - repeated exposure** Not classified.  
**Aspiration hazard** Not an aspiration hazard.  
**Chronic effects** Prolonged inhalation may be harmful.

**12. Ecological information**

**Ecotoxicity** The product is not classified as environmentally hazardous. However, this does not exclude the possibility that large or frequent spills can have a harmful or damaging effect on the environment.

Components	Species	Test Results
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)		
<b>Aquatic</b>		
Crustacea	EC50	Water flea (Ceriodaphnia dubia) 34.59 - 47.13 mg/l, 48 hours
Fish	LC50	Western mosquitofish (Gambusia affinis) 125 mg/l, 96 hours

\* Estimates for product may be based on additional component data not shown.

**Persistence and degradability** No data is available on the degradability of this product.  
**Bioaccumulative potential** No data available.  
**Mobility in soil** No data available.  
**Other adverse effects** No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this component.

**13. Disposal considerations**

**Disposal instructions** Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Dispose of contents/container in accordance with local/regional/national/international regulations.  
**Local disposal regulations** Dispose in accordance with all applicable regulations.  
**Hazardous waste code** The waste code should be assigned in discussion between the user, the producer and the waste disposal company.  
**Waste from residues / unused products** Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see: Disposal instructions).  
**Contaminated packaging** Since emptied containers may retain product residue, follow label warnings even after container is emptied. Empty containers should be taken to an approved waste handling site for recycling or disposal.

**14. Transport information**

**DOT**

**UN number** UN1824  
**UN proper shipping name** SODIUM HYDROXIDE SOLUTION  
**Transport hazard class(es)**  
**Class** 8  
**Subsidiary risk** -  
**Packing group** II  
**Special precautions for user** Read safety instructions, SDS and emergency procedures before handling.  
**ERG number** 154  
 DOT information on packaging may be different from that listed.

**IMDG**

**UN number** UN1824  
**UN proper shipping name** SODIUM HYDROXIDE SOLUTION (SODIUM HYDROXIDE (NA(OH)))  
**Transport hazard class(es)**  
**Class** 8  
**Subsidiary risk** -  
**Packing group** II  
**Environmental hazards**  
**Marine pollutant** No.  
**EmS** F-A, S-B

**Special precautions for user** Read safety instructions, SDS and emergency procedures before handling.

**DOT**



**IMDG**



## 15. Regulatory information

**US federal regulations** This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.

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

Not regulated.

**CERCLA Hazardous Substance List (40 CFR 302.4)**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2) Listed.

**SARA 304 Emergency release notification**

Not regulated.

**OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)**

Not listed.

**Superfund Amendments and Reauthorization Act of 1986 (SARA)**

**Hazard categories**

Immediate Hazard - Yes
Delayed Hazard - No
Fire Hazard - No
Pressure Hazard - No
Reactivity Hazard - No

**SARA 302 Extremely hazardous substance**

Not listed.

**SARA 311/312 Hazardous chemical** Yes

**SARA 313 (TRI reporting)**

Not regulated.

**Other federal regulations**

**Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List**

Not regulated.

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

Not regulated.

**Safe Drinking Water Act (SDWA)** Not regulated.

**US state regulations**

**US. California Controlled Substances. CA Department of Justice (California Health and Safety Code Section 11100)**

Not listed.

**US. California. Candidate Chemicals List. Safer Consumer Products Regulations (Cal. Code Regs, tit. 22, 69502.3, subd. (a))**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. Massachusetts RTK - Substance List**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

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

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. Pennsylvania Worker and Community Right-to-Know Law**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. Rhode Island RTK**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. California Proposition 65**

California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material is not known to contain any chemicals currently listed as carcinogens or reproductive toxins.

**International Inventories**

Country(s) or region	Inventory name	On inventory (yes/no)*
Australia	Australian Inventory of Chemical Substances (AICS)	Yes
Canada	Domestic Substances List (DSL)	Yes
Canada	Non-Domestic Substances List (NDSL)	No
China	Inventory of Existing Chemical Substances in China (IECSC)	Yes
Europe	European Inventory of Existing Commercial Chemical Substances (EINECS)	Yes
Europe	European List of Notified Chemical Substances (ELINCS)	No
Japan	Inventory of Existing and New Chemical Substances (ENCS)	Yes
Korea	Existing Chemicals List (ECL)	Yes
New Zealand	New Zealand Inventory	Yes
Philippines	Philippine Inventory of Chemicals and Chemical Substances (PICCS)	Yes
United States & Puerto Rico	Toxic Substances Control Act (TSCA) Inventory	Yes

\*A "Yes" indicates that all components of this product comply with the inventory requirements administered by the governing country(s)

A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).

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

**Issue date** 04-10-2015

**Revision date** 03-28-2016

**Version #** 08

**HMIS® ratings** Health: 3  
Flammability: 0  
Physical hazard: 0

**NFPA ratings** Health: 3  
Flammability: 0  
Instability: 1

**Disclaimer** While Brenntag believes the information contained herein to be accurate, Brenntag makes no representation or warranty, express or implied, regarding, and assumes no liability for, the accuracy or completeness of the information. The Buyer assumes all responsibility for handling, using and/or reselling the Product in accordance with applicable federal, state, and local law. This SDS shall not in any way limit or preclude the operation and effect of any of the provisions of Brenntag's terms and conditions of sale.



# SAFETY DATA SHEET

## 1. Identification

**Product identifier** SODIUM HYDROXIDE 25%  
**Other means of identification** None.  
**Recommended use** ALL PROPER AND LEGAL PURPOSES  
**Recommended restrictions** None known.  
**Manufacturer/Importer/Supplier/Distributor information**  
**Manufacturer**  
**Company name** Brenntag Pacific Inc.  
**Address** 10747 Patterson Place  
 Santa Fe Springs, CA 90670  
**Telephone** 562-903-9626  
**E-mail** Not available.  
**Emergency phone number** 800-424-9300 CHEMTREC

## 2. Hazard(s) identification

**Physical hazards** Not classified.  
**Health hazards** Skin corrosion/irritation Category 1A  
 Serious eye damage/eye irritation Category 1  
**Environmental hazards** Not classified.  
**OSHA defined hazards** Not classified.  
**Label elements**



**Signal word** Danger  
**Hazard statement** Causes severe skin burns and eye damage. Causes serious eye damage.  
**Precautionary statement**  
**Prevention** Do not breathe mist or vapor. Wash thoroughly after handling. 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/shower. 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. Immediately call a poison center/doctor. Wash contaminated clothing before reuse.  
**Storage** Store locked up.  
**Disposal** Dispose of contents/container in accordance with local/regional/national/international regulations.  
**Hazard(s) not otherwise classified (HNOC)** None known.  
**Supplemental information** None.

## 3. Composition/information on ingredients

### Mixtures

Chemical name	Common name and synonyms	CAS number	%
SODIUM HYDROXIDE (NA(OH))		1310-73-2	25
Other components below reportable levels			75

\*Designates that a specific chemical identity and/or percentage of composition has been withheld as a trade secret.

**4. First-aid measures**

<b>Inhalation</b>	Move to fresh air. Call a physician if symptoms develop or persist.
<b>Skin contact</b>	Take off immediately all contaminated clothing. Rinse skin with water/shower. Call a physician or poison control center immediately. Chemical burns must be treated by a physician. Wash contaminated clothing before reuse.
<b>Eye contact</b>	Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Call a physician or poison control center immediately.
<b>Ingestion</b>	Call a physician or poison control center immediately. Rinse mouth. Do not induce vomiting. If vomiting occurs, keep head low so that stomach content doesn't get into the lungs.
<b>Most important symptoms/effects, acute and delayed</b>	Burning pain and severe corrosive skin damage. Causes serious eye damage. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Permanent eye damage including blindness could result.
<b>Indication of immediate medical attention and special treatment needed</b>	Provide general supportive measures and treat symptomatically. Chemical burns: Flush with water immediately. While flushing, remove clothes which do not adhere to affected area. Call an ambulance. Continue flushing during transport to hospital. Keep victim under observation. Symptoms may be delayed.
<b>General information</b>	Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves.

**5. Fire-fighting measures**

<b>Suitable extinguishing media</b>	Water fog. Foam. Dry chemical powder. Carbon dioxide (CO <sub>2</sub> ).
<b>Unsuitable extinguishing media</b>	Do not use water jet as an extinguisher, as this will spread the fire.
<b>Specific hazards arising from the chemical</b>	During fire, gases hazardous to health may be formed.
<b>Special protective equipment and precautions for firefighters</b>	Self-contained breathing apparatus and full protective clothing must be worn in case of fire.
<b>Fire fighting equipment/instructions</b>	Move containers from fire area if you can do so without risk.
<b>Specific methods</b>	Use standard firefighting procedures and consider the hazards of other involved materials.
<b>General fire hazards</b>	No unusual fire or explosion hazards noted.

**6. Accidental release measures**

<b>Personal precautions, protective equipment and emergency procedures</b>	Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Wear appropriate protective equipment and clothing during clean-up. Do not breathe mist or vapor. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ensure adequate ventilation. Local authorities should be advised if significant spillages cannot be contained. For personal protection, see section 8 of the SDS.
<b>Methods and materials for containment and cleaning up</b>	Large Spills: Stop the flow of material, if this is without risk. Dike the spilled material, where this is possible. Cover with plastic sheet to prevent spreading. Absorb in vermiculite, dry sand or earth and place into containers. Following product recovery, flush area with water.  Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination.  Never return spills to original containers for re-use. For waste disposal, see section 13 of the SDS.
<b>Environmental precautions</b>	Avoid discharge into drains, water courses or onto the ground.

**7. Handling and storage**

<b>Precautions for safe handling</b>	Do not breathe mist or vapor. Do not get in eyes, on skin, or on clothing. Avoid prolonged exposure. Provide adequate ventilation. Wear appropriate personal protective equipment. Observe good industrial hygiene practices.
<b>Conditions for safe storage, including any incompatibilities</b>	Store locked up. Store in original tightly closed container. Store away from incompatible materials (see Section 10 of the SDS).

## 8. Exposure controls/personal protection

### Occupational exposure limits

#### US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)

Components	Type	Value
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)	PEL	2 mg/m <sup>3</sup>

#### US. ACGIH Threshold Limit Values

Components	Type	Value
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)	Ceiling	2 mg/m <sup>3</sup>

#### US. NIOSH: Pocket Guide to Chemical Hazards

Components	Type	Value
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)	Ceiling	2 mg/m <sup>3</sup>

### 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. Eye wash facilities and emergency shower must be available when handling this product.

### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles) and a face shield.

#### Skin protection

##### Hand protection

Wear appropriate chemical resistant gloves. Suitable gloves can be recommended by the glove supplier.

##### Other

Wear appropriate chemical resistant clothing.

#### Respiratory protection

In case of insufficient ventilation, wear suitable respiratory equipment.

#### Thermal hazards

Wear appropriate thermal protective clothing, when necessary.

### General hygiene considerations

Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants.

## 9. Physical and chemical properties

### Appearance

<b>Physical state</b>	Liquid.
<b>Form</b>	Liquid.
<b>Color</b>	CLEAR COLORLESS

**Odor** ODORLESS

**Odor threshold** Not available.

**pH** Not available.

**Melting point/freezing point** -1 °F (-18.33 °C)

**Initial boiling point and boiling range** 791.6 °F (422 °C) estimated

**Flash point** Not available.

**Evaporation rate** Not available.

**Flammability (solid, gas)** Not applicable.

### Upper/lower flammability or explosive limits

**Flammability limit - lower (%)** Not available.

**Flammability limit - upper (%)** Not available.

**Explosive limit - lower (%)** Not available.

**Explosive limit - upper (%)** Not available.

Vapor pressure	Not available.
Vapor density	Not available.
Relative density	Not available.
Solubility(ies)	
Solubility (water)	Not available.
Partition coefficient (n-octanol/water)	Not available.
Auto-ignition temperature	Not available.
Decomposition temperature	Not available.
Viscosity	Not available.
Other information	
Density	10.66 lbs/gal
Explosive properties	Not explosive.
Oxidizing properties	Not oxidizing.
Percent volatile	75 % estimated
Specific gravity	1.28

## 10. Stability and reactivity

Reactivity	The product is stable and non-reactive under normal conditions of use, storage and transport.
Chemical stability	Material is stable under normal conditions.
Possibility of hazardous reactions	Hazardous polymerization does not occur.
Conditions to avoid	Contact with incompatible materials.
Incompatible materials	Strong acids.
Hazardous decomposition products	No hazardous decomposition products are known.

## 11. Toxicological information

### Information on likely routes of exposure

Inhalation	May cause irritation to the respiratory system. Prolonged inhalation may be harmful.
Skin contact	Causes severe skin burns.
Eye contact	Causes serious eye damage.
Ingestion	Causes digestive tract burns.

**Symptoms related to the physical, chemical and toxicological characteristics** Burning pain and severe corrosive skin damage. Causes serious eye damage. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Permanent eye damage including blindness could result.

### Information on toxicological effects

Acute toxicity	Not available.
Skin corrosion/irritation	Causes severe skin burns and eye damage.
Serious eye damage/eye irritation	Causes serious eye damage.

### Respiratory or skin sensitization

Respiratory sensitization	Not a respiratory sensitizer.
Skin sensitization	This product is not expected to cause skin sensitization.

**Germ cell mutagenicity** No data available to indicate product or any components present at greater than 0.1% are mutagenic or genotoxic.

**Carcinogenicity** This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.

#### IARC Monographs. Overall Evaluation of Carcinogenicity

Not available.

#### OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Not listed.

#### US. National Toxicology Program (NTP) Report on Carcinogens

Not available.

<b>Reproductive toxicity</b>	This product is not expected to cause reproductive or developmental effects.
<b>Specific target organ toxicity - single exposure</b>	Not classified.
<b>Specific target organ toxicity - repeated exposure</b>	Not classified.
<b>Aspiration hazard</b>	Not an aspiration hazard.
<b>Chronic effects</b>	Prolonged inhalation may be harmful.

## 12. Ecological information

**Ecotoxicity** The product is not classified as environmentally hazardous. However, this does not exclude the possibility that large or frequent spills can have a harmful or damaging effect on the environment.

Components	Species	Test Results
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)		
<b>Aquatic</b>		
Crustacea	EC50	Water flea (Ceriodaphnia dubia) 34.59 - 47.13 mg/l, 48 hours
Fish	LC50	Western mosquitofish (Gambusia affinis) 125 mg/l, 96 hours

\* Estimates for product may be based on additional component data not shown.

<b>Persistence and degradability</b>	No data is available on the degradability of this product.
<b>Bioaccumulative potential</b>	No data available.
<b>Mobility in soil</b>	No data available.
<b>Other adverse effects</b>	No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this component.

## 13. Disposal considerations

<b>Disposal instructions</b>	Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Dispose of contents/container in accordance with local/regional/national/international regulations.
<b>Local disposal regulations</b>	Dispose in accordance with all applicable regulations.
<b>Hazardous waste code</b>	The waste code should be assigned in discussion between the user, the producer and the waste disposal company.
<b>Waste from residues / unused products</b>	Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see: Disposal instructions).
<b>Contaminated packaging</b>	Since emptied containers may retain product residue, follow label warnings even after container is emptied. Empty containers should be taken to an approved waste handling site for recycling or disposal.

## 14. Transport information

### DOT

<b>UN number</b>	UN1824
<b>UN proper shipping name</b>	SODIUM HYDROXIDE SOLUTION
<b>Transport hazard class(es)</b>	
<b>Class</b>	8
<b>Subsidiary risk</b>	-
<b>Packing group</b>	II
<b>Special precautions for user</b>	Read safety instructions, SDS and emergency procedures before handling.
<b>ERG number</b>	154
DOT information on packaging may be different from that listed.	

DOT



## 15. Regulatory information

**US federal regulations** This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.

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

Not regulated.

**CERCLA Hazardous Substance List (40 CFR 302.4)**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2) Listed.

**SARA 304 Emergency release notification**

Not regulated.

**OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)**

Not listed.

**Superfund Amendments and Reauthorization Act of 1986 (SARA)**

**Hazard categories**  
 Immediate Hazard - Yes  
 Delayed Hazard - No  
 Fire Hazard - No  
 Pressure Hazard - No  
 Reactivity Hazard - No

**SARA 302 Extremely hazardous substance**

Not listed.

**SARA 311/312 Hazardous chemical** Yes

**SARA 313 (TRI reporting)**

Not regulated.

**Other federal regulations**

**Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List**

Not regulated.

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

Not regulated.

**Safe Drinking Water Act (SDWA)** Not regulated.

**US state regulations**

**US. California Controlled Substances. CA Department of Justice (California Health and Safety Code Section 11100)**

Not listed.

**US. California. Candidate Chemicals List. Safer Consumer Products Regulations (Cal. Code Regs, tit. 22, 69502.3, subd. (a))**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. Massachusetts RTK - Substance List**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

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

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. Pennsylvania Worker and Community Right-to-Know Law**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. Rhode Island RTK**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. California Proposition 65**

California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material is not known to contain any chemicals currently listed as carcinogens or reproductive toxins.

**International Inventories**

Country(s) or region	Inventory name	On inventory (yes/no)*
Australia	Australian Inventory of Chemical Substances (AICS)	Yes
Canada	Domestic Substances List (DSL)	Yes
Canada	Non-Domestic Substances List (NDSL)	No
China	Inventory of Existing Chemical Substances in China (IECSC)	Yes
Europe	European Inventory of Existing Commercial Chemical Substances (EINECS)	Yes
Europe	European List of Notified Chemical Substances (ELINCS)	No
Japan	Inventory of Existing and New Chemical Substances (ENCS)	Yes
Korea	Existing Chemicals List (ECL)	Yes
New Zealand	New Zealand Inventory	Yes
Philippines	Philippine Inventory of Chemicals and Chemical Substances (PICCS)	Yes
United States & Puerto Rico	Toxic Substances Control Act (TSCA) Inventory	Yes

\*A "Yes" indicates that all components of this product comply with the inventory requirements administered by the governing country(s)

A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).

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

<b>Issue date</b>	04-05-2015
<b>Revision date</b>	03-01-2016
<b>Version #</b>	15
<b>HMIS® ratings</b>	Health: 3 Flammability: 0 Physical hazard: 0
<b>NFPA ratings</b>	Health: 3 Flammability: 0 Instability: 1
<b>Disclaimer</b>	While Brenntag believes the information contained herein to be accurate, Brenntag makes no representation or warranty, express or implied, regarding, and assumes no liability for, the accuracy or completeness of the information. The Buyer assumes all responsibility for handling, using and/or reselling the Product in accordance with applicable federal, state, and local law. This SDS shall not in any way limit or preclude the operation and effect of any of the provisions of Brenntag's terms and conditions of sale.
<b>Revision information</b>	Hazard(s) identification: Response Accidental release measures: Environmental precautions Handling and storage: Precautions for safe handling Exposure controls/personal protection: Hand protection Physical and chemical properties: Color Ecological information: Ecotoxicity



# SAFETY DATA SHEET

## 1. Identification

**Product identifier** SODIUM HYDROXIDE 50% DIA  
**Other means of identification** None.  
**Recommended use** ALL PROPER AND LEGAL PURPOSES  
**Recommended restrictions** None known.  
**Manufacturer/Importer/Supplier/Distributor information**  
**Manufacturer**  
**Company name** Brenntag Pacific Inc.  
**Address** 10747 Patterson Place  
 Santa Fe Springs, CA 90670  
**Telephone** 562-903-9626  
**E-mail** Not available.  
**Emergency phone number** 800-424-9300 CHEMTREC

## 2. Hazard(s) identification

**Physical hazards** Not classified.  
**Health hazards** Acute toxicity, dermal Category 4  
 Skin corrosion/Irritation Category 1A  
 Serious eye damage/eye irritation Category 1  
**Environmental hazards** Not classified.  
**OSHA defined hazards** Not classified.  
**Label elements**



**Signal word** Danger  
**Hazard statement** Harmful in contact with skin. Causes severe skin burns and eye damage. Causes serious eye damage.  
**Precautionary statement**  
**Prevention** Do not breathe mist or vapor. Wash thoroughly after handling. 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/shower. 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. Immediately call a poison center/doctor. Take off contaminated clothing and wash before reuse.  
**Storage** Store locked up.  
**Disposal** Dispose of waste and residues in accordance with local authority requirements.  
**Hazard(s) not otherwise classified (HNOC)** None known.  
**Supplemental information** 50% of the mixture consists of component(s) of unknown acute dermal toxicity.

## 3. Composition/information on ingredients

### Mixtures

Chemical name	Common name and synonyms	CAS number	%
SODIUM HYDROXIDE (NA(OH))		1310-73-2	50
Other components below reportable levels			50

\*Designates that a specific chemical identity and/or percentage of composition has been withheld as a trade secret.

**4. First-aid measures**

<b>Inhalation</b>	Move to fresh air. Call a physician if symptoms develop or persist.
<b>Skin contact</b>	Take off immediately all contaminated clothing. Rinse skin with water/shower. Call a physician or poison control center immediately. Chemical burns must be treated by a physician. Wash contaminated clothing before reuse.
<b>Eye contact</b>	Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Call a physician or poison control center immediately.
<b>Ingestion</b>	Call a physician or poison control center immediately. Rinse mouth. Do not induce vomiting. If vomiting occurs, keep head low so that stomach content doesn't get into the lungs.
<b>Most important symptoms/effects, acute and delayed</b>	Burning pain and severe corrosive skin damage. Causes serious eye damage. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Permanent eye damage including blindness could result.
<b>Indication of immediate medical attention and special treatment needed</b>	Provide general supportive measures and treat symptomatically. Chemical burns: Flush with water immediately. While flushing, remove clothes which do not adhere to affected area. Call an ambulance. Continue flushing during transport to hospital. Keep victim warm. Keep victim under observation. Symptoms may be delayed.
<b>General information</b>	Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves. Show this safety data sheet to the doctor in attendance.

**5. Fire-fighting measures**

<b>Suitable extinguishing media</b>	Water fog. Foam. Dry chemical powder. Carbon dioxide (CO <sub>2</sub> ).
<b>Unsuitable extinguishing media</b>	Do not use water jet as an extinguisher, as this will spread the fire.
<b>Specific hazards arising from the chemical</b>	During fire, gases hazardous to health may be formed.
<b>Special protective equipment and precautions for firefighters</b>	Self-contained breathing apparatus and full protective clothing must be worn in case of fire.
<b>Fire fighting equipment/instructions</b>	Move containers from fire area if you can do so without risk.
<b>Specific methods</b>	Use standard firefighting procedures and consider the hazards of other involved materials.
<b>General fire hazards</b>	No unusual fire or explosion hazards noted.

**6. Accidental release measures**

<b>Personal precautions, protective equipment and emergency procedures</b>	Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Wear appropriate protective equipment and clothing during clean-up. Do not breathe mist or vapor. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ensure adequate ventilation. Local authorities should be advised if significant spillages cannot be contained. For personal protection, see section 8 of the SDS.
<b>Methods and materials for containment and cleaning up</b>	Large Spills: Stop the flow of material, if this is without risk. Dike the spilled material, where this is possible. Cover with plastic sheet to prevent spreading. Absorb in vermiculite, dry sand or earth and place into containers. Following product recovery, flush area with water.  Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination.  Never return spills to original containers for re-use. For waste disposal, see section 13 of the SDS.
<b>Environmental precautions</b>	Avoid discharge into drains, water courses or onto the ground.

**7. Handling and storage**

<b>Precautions for safe handling</b>	Do not breathe mist or vapor. Do not get in eyes, on skin, or on clothing. Avoid prolonged exposure. When using, do not eat, drink or smoke. Provide adequate ventilation. Wear appropriate personal protective equipment. Wash hands thoroughly after handling. Wash contaminated clothing before reuse. Observe good industrial hygiene practices.
<b>Conditions for safe storage, including any incompatibilities</b>	Store locked up. Store in original tightly closed container. Store away from incompatible materials (see Section 10 of the SDS).

## 8. Exposure controls/personal protection

### Occupational exposure limits

#### US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)

Components	Type	Value
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)	PEL	2 mg/m <sup>3</sup>

#### US. ACGIH Threshold Limit Values

Components	Type	Value
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)	Ceiling	2 mg/m <sup>3</sup>

#### US. NIOSH: Pocket Guide to Chemical Hazards

Components	Type	Value
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)	Ceiling	2 mg/m <sup>3</sup>

### 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. Eye wash facilities and emergency shower must be available when handling this product.

### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles) and a face shield. Face shield is recommended.

#### Skin protection

##### Hand protection

Wear appropriate chemical resistant gloves. Suitable gloves can be recommended by the glove supplier.

##### Other

Wear appropriate chemical resistant clothing. Use of an impervious apron is recommended.

#### Respiratory protection

In case of insufficient ventilation, wear suitable respiratory equipment.

#### Thermal hazards

Wear appropriate thermal protective clothing, when necessary.

### General hygiene considerations

Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants.

## 9. Physical and chemical properties

### Appearance

<b>Physical state</b>	Liquid.
<b>Form</b>	Liquid.
<b>Color</b>	Colorless to slightly colored

### Odor

ODORLESS

### Odor threshold

Not available.

### pH

Not available.

### Melting point/freezing point

56 °F (13.33 °C)

### Initial boiling point and boiling range

1371.2 °F (744 °C) estimated

### Flash point

Not available.

### Evaporation rate

Not available.

### Flammability (solid, gas)

Not applicable.

### Upper/lower flammability or explosive limits

**Flammability limit - lower (%)** Not available.

**Flammability limit - upper (%)** Not available.

**Explosive limit - lower (%)** Not available.

<b>Explosive limit - upper (%)</b>	Not available.
<b>Vapor pressure</b>	Not available.
<b>Vapor density</b>	Not available.
<b>Relative density</b>	Not available.
<b>Solubility(ies)</b>	
<b>Solubility (water)</b>	Not available.
<b>Partition coefficient (n-octanol/water)</b>	Not available.
<b>Auto-ignition temperature</b>	Not available.
<b>Decomposition temperature</b>	Not available.
<b>Viscosity</b>	Not available.
<b>Other information</b>	
<b>Density</b>	12.76 lbs/gal
<b>Explosive properties</b>	Not explosive.
<b>Oxidizing properties</b>	Not oxidizing.
<b>Percent volatile</b>	50 % estimated
<b>Specific gravity</b>	1.53

## 10. Stability and reactivity

<b>Reactivity</b>	The product is stable and non-reactive under normal conditions of use, storage and transport.
<b>Chemical stability</b>	Material is stable under normal conditions.
<b>Possibility of hazardous reactions</b>	Hazardous polymerization does not occur.
<b>Conditions to avoid</b>	Contact with incompatible materials.
<b>Incompatible materials</b>	Strong acids.
<b>Hazardous decomposition products</b>	No hazardous decomposition products are known.

## 11. Toxicological information

### Information on likely routes of exposure

<b>Inhalation</b>	May cause irritation to the respiratory system. Prolonged inhalation may be harmful.
<b>Skin contact</b>	Causes severe skin burns. Harmful in contact with skin.
<b>Eye contact</b>	Causes serious eye damage.
<b>Ingestion</b>	Causes digestive tract burns.

**Symptoms related to the physical, chemical and toxicological characteristics** Burning pain and severe corrosive skin damage. Causes serious eye damage. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Permanent eye damage including blindness could result.

### Information on toxicological effects

<b>Acute toxicity</b>	Harmful in contact with skin.
<b>Skin corrosion/irritation</b>	Causes severe skin burns and eye damage.
<b>Serious eye damage/eye irritation</b>	Causes serious eye damage.

### Respiratory or skin sensitization

<b>Respiratory sensitization</b>	Not a respiratory sensitizer.
<b>Skin sensitization</b>	This product is not expected to cause skin sensitization.

**Germ cell mutagenicity** No data available to indicate product or any components present at greater than 0.1% are mutagenic or genotoxic.

**Carcinogenicity** This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.

#### IARC Monographs. Overall Evaluation of Carcinogenicity

Not available.

#### OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Not listed.

**US. National Toxicology Program (NTP) Report on Carcinogens**

Not available.

<b>Reproductive toxicity</b>	This product is not expected to cause reproductive or developmental effects.
<b>Specific target organ toxicity - single exposure</b>	Not classified.
<b>Specific target organ toxicity - repeated exposure</b>	Not classified.
<b>Aspiration hazard</b>	Not an aspiration hazard.
<b>Chronic effects</b>	Prolonged inhalation may be harmful.

**12. Ecological information**

**Ecotoxicity** The product is not classified as environmentally hazardous. However, this does not exclude the possibility that large or frequent spills can have a harmful or damaging effect on the environment.

Components	Species	Test Results
SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)		
<b>Aquatic</b>		
Crustacea	EC50	Water flea (Ceriodaphnia dubia) 34.59 - 47.13 mg/l, 48 hours
Fish	LC50	Western mosquitofish (Gambusia affinis) 125 mg/l, 96 hours

\* Estimates for product may be based on additional component data not shown.

<b>Persistence and degradability</b>	No data is available on the degradability of this product.
<b>Bioaccumulative potential</b>	No data available.
<b>Mobility in soil</b>	No data available.
<b>Other adverse effects</b>	No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this component.

**13. Disposal considerations**

<b>Disposal instructions</b>	Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Dispose of contents/container in accordance with local/regional/national/international regulations.
<b>Local disposal regulations</b>	Dispose in accordance with all applicable regulations.
<b>Hazardous waste code</b>	The waste code should be assigned in discussion between the user, the producer and the waste disposal company.
<b>Waste from residues / unused products</b>	Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see: Disposal instructions).
<b>Contaminated packaging</b>	Since emptied containers may retain product residue, follow label warnings even after container is emptied. Empty containers should be taken to an approved waste handling site for recycling or disposal.

**14. Transport information****DOT**

<b>UN number</b>	UN1824
<b>UN proper shipping name</b>	SODIUM HYDROXIDE SOLUTION
<b>Transport hazard class(es)</b>	
<b>Class</b>	8
<b>Subsidiary risk</b>	-
<b>Packing group</b>	II
<b>Special precautions for user</b>	Read safety instructions, SDS and emergency procedures before handling.
<b>ERG number</b>	154
DOT information on packaging may be different from that listed.	

DOT



## 15. Regulatory information

**US federal regulations** This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.

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

Not regulated.

**CERCLA Hazardous Substance List (40 CFR 302.4)**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2) Listed.

**SARA 304 Emergency release notification**

Not regulated.

**OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)**

Not listed.

**Superfund Amendments and Reauthorization Act of 1986 (SARA)**

**Hazard categories** Immediate Hazard - Yes  
 Delayed Hazard - No  
 Fire Hazard - No  
 Pressure Hazard - No  
 Reactivity Hazard - No

**SARA 302 Extremely hazardous substance**

Not listed.

**SARA 311/312 Hazardous chemical** No

**SARA 313 (TRI reporting)**

Not regulated.

**Other federal regulations**

**Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List**

Not regulated.

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

Not regulated.

**Safe Drinking Water Act (SDWA)** Not regulated.

**US state regulations**

**US. California Controlled Substances. CA Department of Justice (California Health and Safety Code Section 11100)**

Not listed.

**US. California. Candidate Chemicals List. Safer Consumer Products Regulations (Cal. Code Regs, tit. 22, 69502.3, subd. (a))**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. Massachusetts RTK - Substance List**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

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

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. Pennsylvania Worker and Community Right-to-Know Law**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. Rhode Island RTK**

SODIUM HYDROXIDE (NA(OH)) (CAS 1310-73-2)

**US. California Proposition 65**

California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material is not known to contain any chemicals currently listed as carcinogens or reproductive toxins.

**International Inventories**

Country(s) or region	Inventory name	On inventory (yes/no)*
Australia	Australian Inventory of Chemical Substances (AICS)	Yes
Canada	Domestic Substances List (DSL)	Yes
Canada	Non-Domestic Substances List (NDSL)	No
China	Inventory of Existing Chemical Substances in China (IECSC)	Yes
Europe	European Inventory of Existing Commercial Chemical Substances (EINECS)	Yes
Europe	European List of Notified Chemical Substances (ELINCS)	No
Japan	Inventory of Existing and New Chemical Substances (ENCS)	Yes
Korea	Existing Chemicals List (ECL)	Yes
New Zealand	New Zealand Inventory	Yes
Philippines	Philippine Inventory of Chemicals and Chemical Substances (PICCS)	Yes
United States & Puerto Rico	Toxic Substances Control Act (TSCA) Inventory	Yes

\*A "Yes" indicates that all components of this product comply with the inventory requirements administered by the governing country(s)

A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).

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

<b>Issue date</b>	05-26-2015
<b>Revision date</b>	10-30-2015
<b>Version #</b>	19
<b>HMIS® ratings</b>	Health: 3 Flammability: 0 Physical hazard: 0
<b>NFPA ratings</b>	Health: 3 Flammability: 0 Instability: 0
<b>Disclaimer</b>	While Brenntag believes the information contained herein to be accurate, Brenntag makes no representation or warranty, express or implied, regarding, and assumes no liability for, the accuracy or completeness of the information. The Buyer assumes all responsibility for handling, using and/or reselling the Product in accordance with applicable federal, state, and local law. This SDS shall not in any way limit or preclude the operation and effect of any of the provisions of Brenntag's terms and conditions of sale.
<b>Revision information</b>	Exposure controls/personal protection: Hand protection Other information, including date of preparation or last revision: Disclaimer GHS: Classification

**EXHIBIT B**  
**Insurance Requirements**  
**(Chemical Vendor - Sodium Hydroxide)**

Contractor shall procure and maintain for the duration of the contract insurance against claims for injuries to persons or damages to property which may arise from or in connection with the performance of the work hereunder and the results of that work by the Contractor, their agents, representatives, employees or subcontractors.

**MINIMUM SCOPE AND LIMIT OF INSURANCE**

Coverage shall be at least as broad as:

1. **Commercial General Liability (CGL):** Insurance Services Office Form CG 00 01 covering CGL on an "occurrence" basis, including products and completed operations, property damage, bodily injury and personal & advertising injury with limits no less than **\$3,000,000** per occurrence. If a general aggregate limit applies, either the general aggregate limit shall apply separately to this project/location or the general aggregate limit shall be twice the required occurrence limit.
2. **Automobile Liability (AL):** ISO Form Number CA 00 01 covering any auto (Code 1) with combined single limits of liability of no less than **\$1,000,000** per accident for bodily injury and property damage, including **MCS90** endorsement form.
3. **Workers' Compensation:** as required by the State of California, with Statutory Limits, and Employer's Liability Insurance with limit of no less than **\$1,000,000** per accident for bodily injury or disease.

If the contractor maintains higher limits than the minimums shown above, the City of Stockton requires and shall be entitled to coverage for the higher limits maintained by the contractor. Any available insurance proceeds in excess of the specified minimum limits of insurance and coverage shall be available to the City of Stockton.

**Other Insurance Provisions**

The insurance policies are to contain, or be endorsed to contain, the following provisions:

- ***Additional Insured Status***  
The *City of Stockton, its Mayor, Council, officers, representatives, agents, employees and volunteers* are to be covered as additional insureds on the CGL and AL policy with respect to liability arising out of work or operations performed by or on behalf of the Contractor including materials, parts, or equipment furnished in connection with such work or operations. General liability coverage can be provided in the form of an endorsement to the Contractor's insurance (**at**

least as broad as ISO Form CG 20 10 11 85 or if not available, through the addition of both CG 20 10 and CG 20 37 if a later edition is used).

- **Primary Coverage**

For any claims related to this contract, the Contractor's insurance coverage shall be primary insurance as respects the *City of Stockton, its Mayor, Council, officers, representatives, agents, employees and volunteers*. Any insurance or self-insurance maintained by the *City of Stockton, its Mayor, Council, officers, representatives, agents, employees and volunteers* shall be excess of the Contractor's insurance and shall not contribute with it. The City of Stockton does not accept primary endorsements limiting the Contractor's insurance coverage to sole negligence.

- **Notice of Cancellation**

Each insurance policy required above shall provide that coverage shall not be canceled, except with notice to the City of Stockton.

- **Waiver of Subrogation**

Contractor hereby grants to the City of Stockton a waiver of any right to subrogation which any insurer of said Contractor may acquire against the City of Stockton by virtue of the payment of any loss under such insurance. Contractor agrees to obtain any endorsement that may be necessary to affect this waiver of subrogation, but this provision applies regardless of whether or not the City of Stockton has received a waiver of subrogation endorsement from the insurer.

- **Deductibles and Self-Insured Retentions**

Any deductibles or self-insured retentions must be declared to and approved by the City of Stockton Risk Services. The City of Stockton may require the Contractor to purchase coverage with a lower deductible or retention or provide proof of ability to pay losses and related investigations, claim administration, and defense expenses within the retention.

- **Acceptability of Insurers**

Insurance is to be placed with insurers with a current A.M. Best's rating of no less than A:VII if admitted to do business in the State of California; If not admitted to do business in the State of California, insurance is to be placed with insurers with a current A.M. Best's rating of no less than A+:X.

- **Claims Made Policies**

If any of the required policies provide claims-made coverage:

- The Retroactive Date must be shown, and must be before the date of the contract or the beginning of contract work.

- If Claims Made policy form is used, a three (3) year discovery and reporting tail period of coverage is required after completion of work.

- **Verification of Coverage**

Contractor shall furnish the City of Stockton with original certificates and amendatory endorsements required by this clause. All certificates and endorsements are to be received and approved by the City of Stockton Risk Services before work commences. Failure to obtain the required documents prior to the work beginning shall not waive the Contractor's obligation to provide them. The City of Stockton reserves the right to require complete, certified copies of all required insurance policies, including endorsements required by these specifications, at any time, for any reason or no reason.

- **Special Risks or Circumstances**

The City of Stockton reserves the right to modify these requirements, including limits, based on the nature of the risk, prior experience, insurer, coverage, or other circumstances.

- **Certificate holder address**

Proper address for mailing certificates, endorsements and notices shall be:

- City of Stockton
- Attention: Risk Services
- 425 N. El Dorado Street
- Stockton, CA 95202

City of Stockton Risk Services Phone: 209-937-5037

City of Stockton Risk Services Fax: 209-937-8558

- **Maintenance of Insurance**

If at any time during the life of the Contract or any extension, the Contractor fails to maintain the required insurance in full force and effect, all work under the Contract shall be discontinued immediately. Any failure to maintain the required insurance shall be sufficient cause for the CITY to terminate this Contract.

- **Subcontractors**

If the Contractor should subcontract all or any portion of the work to be performed in this contract, the Contractor shall cover the sub-contractor, and/or require each sub-contractor to adhere to all subparagraphs of these Insurance Requirements section. Similarly, any cancellation, lapse, reduction or change of sub-contractor's insurance shall have the same impact as described above.