SAFETY DATA SHEET
according to the OSHA Hazard Communication Standard

BIOBAN™ SP 100 Antimicrobial

Version	Revision Date:	SDS Number:	Date of last issue: 06/10/2024
2.0	09/05/2025	203000021757	Country / Language: US / EN

SECTION 1. IDENTIFICATION

Product name : BIOBAN™ SP 100 Antimicrobial

Product code : 000000000062633640

EPA registration number : 464-78

Manufacturer or supplier's details

Company : LANXESS Corporation
Product Safety & Regulatory Affairs
111 RIDC Park West Drive
Pittsburgh, Pennsylvania 15275-1112

Responsible Department : (800) LANXESS
(412) 809-1000
lanxesshes@lanxess.com

Emergency telephone : CHEMTREC (800) 424-9300 or
(703) 527-3887 (Outside U.S.A) and mention CCN12916.
Lanxess Emergency Phone (800) 410-3063.

Recommended use of the chemical and restrictions on use

Recommended use : Biocide for industrial application

SECTION 2. HAZARDS IDENTIFICATION

GHS classification in accordance with the OSHA Hazard Communication Standard (29 CFR 1910.1200)

Hazards for the product as supplied

Self-heating substances and mixtures : Category 1

Acute toxicity (Oral) : Category 4

Skin corrosion : Sub-category 1A

Serious eye damage : Category 1

Carcinogenicity : Category 2

Other hazards

None known.

GHS label elements

Hazard pictograms	:	
Signal Word	:	Danger
Hazard Statements	:	H251 Self-heating; may catch fire. H302 Harmful if swallowed. H314 Causes severe skin burns and eye damage. H335 May cause respiratory irritation. H351 Suspected of causing cancer.
Supplemental Hazard Statements	:	Corrosive to the respiratory tract.
Precautionary Statements	:	**Prevention:** P201 Obtain special instructions before use. P202 Do not handle until all safety precautions have been read and understood. P260 Do not breathe dust. P264 Wash skin thoroughly after handling. P270 Do not eat, drink or smoke when using this product. P271 Use only outdoors or in a well-ventilated area. P280 Wear protective gloves/ protective clothing/ eye protection/ face protection/ hearing protection. **Response:** P301 + P312 + P330 IF SWALLOWED: Call a POISON CENTER/ doctor if you feel unwell. Rinse mouth. P301 + P330 + P331 IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. P303 + P361 + P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/ shower. P304 + P340 + P310 IF INHALED: Remove person to fresh air and keep comfortable for breathing. Immediately call a POISON CENTER/ doctor. P305 + P351 + P338 + P310 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. P308 + P313 IF exposed or concerned: Get medical advice/ attention. P363 Wash contaminated clothing before reuse. **Storage:** P403 + P233 Store in a well-ventilated place. Keep container tightly closed. P405 Store locked up. P407 Maintain air gap between stacks or pallets. P410 Protect from sunlight. P413 Store bulk masses greater than 40 KG/ 88 LB at temperatures not exceeding 40 °C/ 104 °F.

P420 Store separately.

Disposal:

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

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance / Mixture : Mixture

Components

Chemical name	CAS No./Unique ID	Concentration (% w/w)
sodium 2-biphenylate	132-27-4*	>= 60 - <= 80
sodium hydroxide	1310-73-2*	>= 0.5 - <= 1.5

* Indicates that the identifier is a CAS No.
Any concentration shown as a range is to protect confidentiality or is due to batch variation.

SECTION 4. FIRST AID MEASURES

General advice : Move out of dangerous area.
Consult a physician.
Do not leave the victim unattended.
Show this safety data sheet to the doctor in attendance.

If inhaled : Get medical attention immediately.
Remove victim to fresh air and keep at rest in a position comfortable for breathing.
If unconscious, place in recovery position and get medical attention immediately.
Maintain open airway.
If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel.

In case of skin contact : Get medical attention immediately.
Wash off immediately with soap and plenty of water while removing all contaminated clothes and shoes.
Continue to rinse for 30 minutes.
Chemical burns must be treated promptly by a physician.
Wash contaminated clothing before reuse.

In case of eye contact : Get medical attention immediately.
In case of contact, flush eyes with plenty of water for at least 30 minutes. Use fingers to ensure that eyelids are separated and that the eye is being irrigated.
Remove contact lenses, if present and easy to do. Continue rinsing.
Chemical burns must be treated promptly by a physician.

If swallowed : Rinse mouth with water.
Do not induce vomiting unless directed to do by medical personnel.
If vomiting occurs, the head should be kept low so that vomit does not enter the lungs.
If unconscious, place in recovery position and get medical attention immediately.
Never give anything by mouth to an unconscious person.
Maintain open airway.

Most important symptoms and effects, both acute and delayed

Symptoms : Acute overexposure to this product may cause dizziness, headache, drowsiness, malaise, abdominal pain.
Eye: Corrosive with symptoms of reddening, tearing, swelling, burning and possible permanent damage.
Skin: Reddening, burning, and possible permanent damage.
May cause respiratory tract irritation with symptoms of coughing, sore throat and runny nose.
Adverse symptoms sometimes include the following:
carcinogenic effects

Effects : Harmful if swallowed.
Causes serious eye damage.
May cause respiratory irritation.
Suspected of causing cancer.
Causes severe burns.
Corrosive to the respiratory tract.

Protection of first-aiders : First Aid responders should pay attention to self-protection and use the recommended protective clothing (chemical resistant gloves, splash protection).
If potential for exposure exists refer to Section 8 for specific personal protective equipment.

Notes to physician : Treat symptomatically.

SECTION 5. FIRE-FIGHTING MEASURES

Suitable extinguishing media : Water fog or fine spray.
Dry chemical fire extinguishers.
Carbon dioxide (CO2)
Foam
Alcohol resistant foams (ATC type) are preferred. General purpose synthetic foams (including AFFF) or protein foams may function, but will be less effective.

Unsuitable extinguishing media : Do not use direct water stream.
May spread fire.

Specific hazards during fire : Violent steam generation or eruption may occur upon applica-

fighting		tion of direct water stream to hot liquids. Do not permit dust to accumulate. When suspended in air dust can pose an explosion hazard. Minimize ignition sources. If dust layers are exposed to elevated temperatures, spontaneous combustion may occur. Dense smoke is produced when product burns. Do not allow run-off from fire fighting to enter drains or water courses. Very toxic to aquatic life with long lasting effects.
Hazardous combustion products	:	During a fire, smoke may contain the original material in addition to combustion products of varying composition which may be toxic and/or irritating. Combustion products may include and are not limited to: Phenolic compounds. Benzene compounds. Carbon dioxide (CO2) Carbon monoxide Metal oxides
Further information	:	Keep people away. Isolate fire and deny unnecessary entry. Cool surroundings with water to localize fire zone. Burning liquids may be extinguished by dilution with water. Do not use direct water stream. May spread fire. Hand held dry chemical or carbon dioxide extinguishers may be used for small fires. Dust explosion hazard may result from forceful application of fire extinguishing agents. Burning liquids may be moved by flushing with water to protect personnel and minimize property damage.
Special protective equipment for fire-fighters	:	Wear positive-pressure self-contained breathing apparatus (SCBA) and protective fire fighting clothing (includes fire fighting helmet, coat, trousers, boots, and gloves). Avoid contact with this material during fire fighting operations. If contact is likely, change to full chemical resistant fire fighting clothing with self-contained breathing apparatus. If this is not available, wear full chemical resistant clothing with self-contained breathing apparatus and fight fire from a remote location. For protective equipment in post-fire or non-fire clean-up situations, refer to the relevant sections.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures	:	Evacuate area. Keep upwind of spill. Ventilate area of leak or spill. Only trained and properly protected personnel must be in-

volved in clean-up operations.
Spilled material may cause a slipping hazard.
Refer to protective measures listed in sections 7 and 8.

Environmental precautions : Prevent from entering into soil, ditches, sewers, waterways and/or groundwater. See Section 12, Ecological Information.
Spills or discharge to natural waterways is likely to kill aquatic organisms.
If the product contaminates rivers and lakes or drains inform respective authorities.

Methods and materials for containment and cleaning up : Stop leak if safe to do so.
Contain spilled material if possible.
Pump into suitable and properly labeled containers.

SECTION 7. HANDLING AND STORAGE

Advice on protection against fire and explosion : Avoid dust formation.
Provide appropriate exhaust ventilation at places where dust is formed.

Advice on safe handling : Keep out of reach of children.
Keep away from heat and sources of ignition.
Do not get in eyes, on skin, or on clothing.
Do not swallow.
Do not breathe dust, fume, gas, mist, vapors or spray.
Keep container closed.
Use only with adequate ventilation/personal protection.
No smoking, open flames or sources of ignition in handling and storage area.
Workers should be protected from the possibility of contact with molten resin.
Do not get molten material in eyes, on skin or clothing.
Product shipped/handled hot can cause thermal burns.
Containers, even those that have been emptied, can contain vapors. Do not cut, drill, grind, weld, or perform similar operations on or near empty containers.
See Section 8, EXPOSURE CONTROLS AND PERSONAL PROTECTION.

Conditions for safe storage : Keep away from heat and sources of ignition.
Store in a dry place.
Store away from incompatible materials (see section 10) and food and drink.

Further information on storage conditions : Store in the original container and keep the container tightly closed. Do not store above 40°C.

Recommended storage temperature : 41 - 104 °F / 5 - 40 °C

Bulk storage mass : 40 kg

Further information on storage stability : Stable under recommended storage conditions.

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Ingredients with workplace control parameters

Components	CAS-No.	Value type (Form of exposure)	Control parameters / Permissible concentration	Basis
sodium hydroxide	1310-73-2	C	2 mg/m3	ACGIH
		TWA	2 mg/m3	OSHA Z-1

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

Personal protective equipment

Respiratory protection : Respiratory protection should be worn when there is a potential to exceed the exposure limit requirements or guidelines. If there are no applicable exposure limit requirements or guidelines, wear respiratory protection when adverse effects, such as respiratory irritation or discomfort have been experienced, or where indicated by your risk assessment process.
For emergency conditions, use an approved positive-pressure self-contained breathing apparatus.
The following should be effective types of air-purifying respirators:

Filter type : Combined particulates and organic vapor type

Hand protection

Remarks : Use gloves chemically resistant to this material. Use gloves with insulation for thermal protection, when needed. Examples of preferred glove barrier materials include: Neoprene Polyvinyl chloride - PVC Nitrile/butadiene rubber ("nitrile" or "NBR"). NOTICE: The selection of a specific glove for a particular application and duration of use in a workplace should also take into account all relevant workplace factors such as, but not limited to: Other chemicals which may be handled, physical requirements (cut/puncture protection, dexterity, thermal protection), potential body reactions to glove materials, as well as the instructions/specifications provided by the glove supplier.

Eye protection : Tightly fitting safety goggles

Wear a face-shield which allows use of chemical goggles, or wear a full-face respirator, to protect face and eyes when there is any likelihood of splashes.

Skin and body protection : Use protective clothing chemically resistant to this material. Selection of specific items such as face shield, boots, apron, or full body suit will depend on the task.

Hygiene measures : Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period.
Appropriate techniques should be used to remove potentially contaminated clothing.
Wash contaminated clothing before reusing.
Ensure that eyewash stations and safety showers are close to the workstation location.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance	:	flakes
Physical state	:	solid
Color	:	White to off-white
Odor	:	mild
Odor Threshold	:	No data available
pH	:	11.1 - 11.8 Concentration: 2 % Aqueous solution
Melting point/ range	:	117 - 266 °F / 47 - 130 °C Method: Literature Data
Freezing point		Not applicable
Boiling point/boiling range	:	Not applicable
Flash point	:	> 239 °F / 115 °C Method: Literature Data, closed cup
Flammability (solid, gas)	:	No data available
Self-ignition	:	No data available

Upper explosion limit / Upper flammability limit	:	No data available
Lower explosion limit / Lower flammability limit	:	No data available
Vapor pressure	:	Not applicable
Relative vapor density	:	Not applicable
Relative density	:	No data available
Density	:	1.3 g/cm3 (68 °F / 20 °C)
Solubility(ies)		
Water solubility	:	537 g/l (77 °F / 25 °C) Method: Literature Data
Solubility in other solvents	:	No data available
Partition coefficient: n-octanol/water	:	No data available
Ignition temperature	:	750 °F / 399 °C Method: Literature Data
Decomposition temperature	:	No data available
Viscosity		
Viscosity, dynamic	:	No data available
Viscosity, kinematic	:	Not applicable
Explosive properties	:	No
Oxidizing properties	:	No test data available
Self-heating substances	:	Self-heating; may catch fire.
Surface tension	:	No data available
Molecular weight	:	No data available
Particle size	:	No data available

SECTION 10. STABILITY AND REACTIVITY

Reactivity	:	Self-heating in large quantities; may catch fire.
Chemical stability	:	Chemically unstable at elevated conditions (temperature and

pressure)

Possibility of hazardous reactions	:	Self-heating; may catch fire.
Conditions to avoid	:	Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Exposure to elevated temperatures can cause product to decompose.
Incompatible materials	:	Avoid contact with: Oxidizing agents Strong acids Strong reducing agents
Hazardous decomposition products	:	Decomposition products depend upon temperature, air supply and the presence of other materials.

SECTION 11. TOXICOLOGICAL INFORMATION

Acute toxicity

Harmful if swallowed.

Product:

Acute oral toxicity	:	Remarks: Low toxicity if swallowed. Swallowing may result in burns of the mouth and throat. LD50 (Rat, male): 846 mg/kg LD50 (Rat, female): 591 mg/kg
Acute inhalation toxicity	:	Remarks: Excessive exposure may cause severe irritation to the upper respiratory tract (nose and throat). Vapor from heated material may cause respiratory irritation. For narcotic effects: No specific, relevant data available for assessment. Remarks: Product The LC50 has not been determined. LC50 (Rat): > 0.036 mg/l Exposure time: 4 h Test atmosphere: Aerosol Symptoms: No deaths occurred at this concentration. Remarks: For similar material(s): Remarks: Maximum attainable concentration.
Acute dermal toxicity	:	Remarks: Prolonged skin contact is unlikely to result in absorption of harmful amounts. Remarks: Product

The dermal LD50 has not been determined.

LD50 (Rabbit): > 5,000 mg/kg
Symptoms: No deaths occurred at this concentration.
Assessment: The substance or mixture has no acute dermal toxicity
Remarks: For similar material(s):

Components:

sodium 2-biphenylate:

Acute oral toxicity	:	LD50 (Rat, female): 591 mg/kg Method: OECD Test Guideline 401
Acute dermal toxicity	:	LD50 (Rat, male and female): > 5,000 mg/kg Method: OECD Test Guideline 402 Remarks: Extrapolation according to Regulation (EC) No. 440/2008 Test results on an analogous substance/product.

Skin corrosion/irritation

Causes severe burns.

Components:

sodium 2-biphenylate:

Species	:	Rabbit
Method	:	OECD Test Guideline 404
Result	:	Causes severe burns.

sodium hydroxide:

Species	:	Rabbit
Method	:	OECD Test Guideline 435
Result	:	Causes severe burns.
GLP	:	No

Serious eye damage/eye irritation

Causes serious eye damage.

Product:

Result	:	Corrosive
Remarks	:	May cause severe irritation with corneal injury which may result in permanent impairment of vision, even blindness. Chemical burns may occur. Material may be handled at elevated temperatures; contact with heated material may cause thermal burns. For the molten form: May cause irreversible eye damage.

Components:

sodium 2-biphenylate:

Species	:	Rabbit
Result	:	Risk of serious damage to eyes.
Method	:	OECD Test Guideline 405

sodium hydroxide:

Species	:	Rabbit
Result	:	Risk of serious damage to eyes.
Method	:	OECD Test Guideline 405

Respiratory or skin sensitization

Skin sensitization

Not classified due to lack of data.

Respiratory sensitization

Not classified due to lack of data.

Product:

Remarks	:	Did not cause allergic skin reactions when tested in guinea pigs.
Remarks	:	For respiratory sensitization: No relevant information found.

Components:

sodium 2-biphenylate:

Routes of exposure	:	Skin contact
Species	:	Guinea pig
Method	:	OECD Test Guideline 406
Result	:	Did not cause sensitization on laboratory animals.

sodium hydroxide:

Species	:	Human
Assessment	:	Does not cause skin sensitization.
GLP	:	No

Germ cell mutagenicity

Not classified due to lack of data.

Components:

sodium 2-biphenylate:

Genotoxicity in vitro	:	Test system: Bacteria Metabolic activation: with and without metabolic activation Method: OECD Test Guideline 471 Result: negative Remarks: Test results on an analogous substance/product.

Test system: Mammalian-Animal
Metabolic activation: with and without metabolic activation
Method: OECD Test Guideline 476
Result: negative
Remarks: Test results on an analogous substance/product.

Genotoxicity in vivo : Species: Mouse (male)
Application Route: Oral
Method: OECD 489
Result: negative
Remarks: Test results on an analogous substance/product.

Test Type: Micronucleus test
Species: Rat (male)
Application Route: Oral
Method: OECD Test Guideline 474
Result: negative
Remarks: Test results on an analogous substance/product.

sodium hydroxide:

Genotoxicity in vitro : Test Type: Ames test
Test system: Salmonella typhimurium
Metabolic activation: with and without metabolic activation
Method: OECD Test Guideline 471
Result: negative

Genotoxicity in vivo : Test Type: Micronucleus test
Species: Mouse
Application Route: Intraperitoneal
Method: OECD Test Guideline 474
Result: negative

Carcinogenicity

Suspected of causing cancer.

Components:

sodium 2-biphenylate:

Species	:	Rat, male
Application Route	:	Oral
Exposure time	:	2 Years
Dose	:	200 mg/kg body weight
Method	:	OECD Test Guideline 453
Result	:	negative
Remarks	:	Test results on an analogous substance/product.

Species	:	Rat, female
Application Route	:	Oral
Exposure time	:	2 Years
Dose	:	>= 647 mg/kg body weight
Method	:	OECD Test Guideline 453
Result	:	negative

Remarks : Test results on an analogous substance/product.

IARC Group 2B: Possibly carcinogenic to humans
sodium 2-biphenylate 132-27-4

OSHA No component of this product present at levels greater than or equal to 0.1% is on OSHA's list of regulated carcinogens.

NTP No ingredient of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

Reproductive toxicity

Not classified due to lack of data.

Components:

sodium 2-biphenylate:

Effects on fertility : Species: Rat, male and female
Application Route: Oral
Duration of Single Treatment: 25 Weeks
Fertility: NOAEL: >= 500 mg/kg body weight
Method: OECD Test Guideline 416
Result: No effects on fertility and early embryonic development were detected.
GLP: Yes
Remarks: Test results on an analogous substance/product.

Effects on fetal development : Species: Rat
Application Route: Oral
Duration of Single Treatment: 28 Days
Developmental Toxicity: NOAEL: 250 mg/kg body weight
Method: OECD Test Guideline 414
Remarks: Test results on an analogous substance/product.

STOT-single exposure

May cause respiratory irritation.
Corrosive to the respiratory tract.

Product:

Assessment : May cause respiratory irritation.

STOT-repeated exposure

Not classified due to lack of data.

Repeated dose toxicity

Product:

Remarks : In animals, effects have been reported on the following organs:
For the major component(s):
Kidney
Bladder

Liver
The data presented are for the following material:
Ortho phenyl phenol (OPP).
Orthophenyl phenol may be released if product is heated.

Components:

sodium 2-biphenylate:

Species	:	Rat, male and female
NOAEL	:	>= 300 mg/kg
Application Route	:	Oral
Exposure time	:	2 yr
Number of exposures	:	daily
Method	:	OECD Test Guideline 453
Remarks	:	Test results on an analogous substance/product.

Species	:	Rat, male and female
	:	>= 1000 mg/kg
Application Route	:	Dermal
Exposure time	:	21 Days
Number of exposures	:	5 days/week
Method	:	OECD Test Guideline 410
Remarks	:	Test results on an analogous substance/product.

Aspiration toxicity

Not classified due to lack of data.

Product:

Based on physical properties, not likely to be an aspiration hazard.

Further information

Product:

Remarks	:	No data available

SECTION 12. ECOLOGICAL INFORMATION

Ecotoxicity

Product:

Toxicity to fish	:	Remarks: Material is highly toxic to aquatic organisms on an acute basis (LC50/EC50 between 0.1 and 1 mg/L in the most sensitive species tested). LC50 (Oncorhynchus mykiss (rainbow trout)): 2.6 mg/l Exposure time: 96 h Test Type: flow-through test
Toxicity to daphnia and other aquatic invertebrates	:	LC50 (Daphnia magna (Water flea)): 3.8 mg/l

LC50 (Mysidopsis bahia (opossum shrimp)): 0.32 mg/l
Exposure time: 96 h
Test Type: flow-through test

Toxicity to algae/aquatic plants : EC50 (diatom Navicula sp.): 1.9 mg/l
End point: Growth inhibition (cell density reduction)
Exposure time: 96 h
Test Type: Static

EC50 (Skeletonema costatum (marine diatom)): 6.4 mg/l
End point: Growth inhibition (cell density reduction)
Exposure time: 96 h
Test Type: Static

EC50 (Green algae (Scenedesmus subspicatus)): 0.85 mg/l
End point: Biomass
Exposure time: 72 h
Test Type: Static
Remarks: Based on information for a similar material:
Ortho phenyl phenol (OPP).

Toxicity to terrestrial organisms : Remarks: Material is slightly toxic to birds on an acute basis (LD50 between 501 and 2000 mg/kg).
Material is practically non-toxic to birds on a dietary basis (LC50 > 5000 ppm).

LD50 Oral (Colinus virginianus (Bobwhite quail)): 1,000 mg/kg

LC50 (Colinus virginianus (Bobwhite quail)): > 5,620 mg/kg

LC50 (Anas platyrhynchos (Mallard duck)): > 5,620 mg/kg

Components:

sodium 2-biphenylate:

Toxicity to fish : LC50 (Oncorhynchus mykiss (rainbow trout)): 2.6 mg/l
Exposure time: 96 h
Method: OPPTS 850.1075
Remarks: Fresh water

Toxicity to daphnia and other aquatic invertebrates : EC50 (Daphnia magna (Water flea)): 2.7 mg/l
Exposure time: 48 h
Method: ASTM E729
Remarks: Fresh water
Test results on an analogous substance/product.

Toxicity to algae/aquatic plants : ErC50 (Pseudokirchneriella subcapitata (microalgae)): 3.57 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
Remarks: Fresh water
Test results on an analogous substance/product.

NOEC (Pseudokirchneriella subcapitata (microalgae)): 0.468 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
Remarks: Fresh water
Test results on an analogous substance/product.

Toxicity to fish (Chronic toxicity) : NOEC (Pimephales promelas (fathead minnow)): 0.036 mg/l
Exposure time: 21 Days
Remarks: Fresh water
Test results on an analogous substance/product.

Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity) : NOEC (Daphnia magna (Water flea)): 0.006 mg/l
Exposure time: 21 Days
Method: OECD Test Guideline 211
Remarks: Fresh water
Test results on an analogous substance/product.

Toxicity to microorganisms : EC10 (activated sludge): 31 mg/l
Exposure time: 3 h
Method: ISO 8192
Remarks: Test results on an analogous substance/product.

sodium hydroxide:

Toxicity to fish : LC50 (Trout): 45.4 mg/l
Exposure time: 96 h

Toxicity to daphnia and other aquatic invertebrates : EC50 (Daphnia magna (Water flea)): > 100 mg/l
Exposure time: 48 h

Ecotoxicology Assessment

Acute aquatic toxicity : This product has no known ecotoxicological effects.

Chronic aquatic toxicity : This product has no known ecotoxicological effects.

Persistence and degradability

Product:

Biodegradability : Result: Readily biodegradable.
Remarks: Material is readily biodegradable. Passes OECD test(s) for ready biodegradability.

Biodegradation: 88 %
Exposure time: 28 d
Method: OECD Test Guideline 301B
Remarks: 10-day Window: Pass

Biodegradation: 47 - 86 %
Exposure time: 14 d
Method: OECD Test Guideline 302C
Remarks: 10-day Window: Not applicable

Components:

sodium 2-biphenylate:

Biodegradability : aerobic
Result: Readily biodegradable.
Biodegradation: 70.8 - 75.7 %
Exposure time: 28 d
Method: OECD Test Guideline 301B
Remarks: Test results on an analogous substance/product.

sodium hydroxide:

Biodegradability : Remarks: The methods for determining biodegradability are not applicable to inorganic substances.

Bioaccumulative potential

Components:

sodium 2-biphenylate:

Partition coefficient: n-octanol/water : log Pow: 3.18
Method: OECD Test Guideline 107
Remarks: Test results on an analogous substance/product.

Mobility in soil

Product:

Distribution among environmental compartments : Remarks: No test data available

Other adverse effects

Product:

Additional ecological information : An environmental hazard cannot be excluded in the event of unprofessional handling or disposal.
Very toxic to aquatic life with long lasting effects.

SECTION 13. DISPOSAL CONSIDERATIONS

Disposal methods

RCRA - Resource Conservation and Recovery Authorization Act : When discarded in its purchased form, this product meets the criteria of ignitability, and should be managed as a hazardous waste (EPA Hazardous Waste Number D001). (40 CFR 261.20-24)

Waste from residues : The generation of waste should be avoided or minimized wherever possible.
This material and its container must be disposed of in a safe way.
Empty containers retain product residue; observe all precautions for product.

Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.
Waste disposal should be in accordance with existing federal, state, provincial and/or local environmental controls.

SECTION 14. TRANSPORT INFORMATION

International Regulations

IATA-DGR

UN/ID No.	:	UN 3126
Proper shipping name	:	Self-heating solid, corrosive, organic, n.o.s. (2-HYDROXYBIPHENYL SODIUM SALT)
Class	:	4.2
Subsidiary risk	:	8
Packing group	:	II
Labels	:	4.2 8

Packing instruction (cargo aircraft)	:	470: 50.00 KG
Packing instruction (passenger aircraft)	:	466: 15.00 KG
Environmentally hazardous	:	yes

IMDG-Code

UN number	:	UN 3126
UN proper shipping name	:	SELF-HEATING SOLID, CORROSIVE, ORGANIC, N.O.S. (2-HYDROXYBIPHENYL SODIUM SALT)
Class	:	4.2
Subsidiary risk	:	8
Packing group	:	II
Labels	:	4.2 8

EmS Code	:	F-A, S-J
Marine pollutant	:	yes

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

Not applicable for product as supplied.

Domestic regulation

49 CFR

UN/ID/NA number	:	UN 3126
Proper shipping name	:	Self-heating solid, corrosive, organic, n.o.s. (2-HYDROXYBIPHENYL SODIUM SALT)
Class	:	4.2
Subsidiary risk	:	8
Packing group	:	II
Labels	:	4.2 8

ERG Code	:	136
Marine pollutant	:	yes(2-HYDROXYBIPHENYL SODIUM SALT)

Hazard and Handling Notes
Spontaneously combustible.
Corrosive.
Environmentally hazardous substance.
Keep dry.
Keep away from acids and oxidizing agents
Keep separated from foodstuffs
The U.S. DOT regulations in Appendix B to 49 CFR § 172.101, paragraph 4 permit this material to ship as marine pollutant.

Special precautions for user

The transport classification(s) provided herein are for informational purposes only, and solely based upon the properties of the unpackaged material as it is described within this Safety Data Sheet. Transportation classifications may vary by mode of transportation, package sizes, and variations in regional or country regulations.

SECTION 15. REGULATORY INFORMATION

CERCLA Reportable Quantity

Listed substances in the product are at low enough levels to not be expected to exceed the RQ

SARA 302 Extremely Hazardous Substances Threshold Planning Quantity

This material does not contain any components with a section 302 EHS TPQ.

SARA 311/312 Hazards : Acute toxicity (any route of exposure)

Carcinogenicity
Skin corrosion or irritation
Serious eye damage or eye irritation

SARA 313 : The following components are subject to reporting levels established by SARA Title III, Section 313:

sodium 2-biphenylate	132-27-4	>= 70 - < 90 %

US State Regulations

Massachusetts Right To Know

sodium 2-biphenylate	132-27-4

Pennsylvania Right To Know

sodium 2-biphenylate	132-27-4
water	7732-18-5
sodium hydroxide	1310-73-2

California Prop. 65

WARNING: This product can expose you to chemicals including sodium 2-biphenylate, which is/are known to the State of California to cause cancer. For more information go to www.P65Warnings.ca.gov.

TSCA inventory

TSCA : This product is regulated under the United States Federal Insecticide, Fungicide and Rodenticide Act (FIFRA).

TSCA list

No substances are subject to a Significant New Use Rule.

No substances are subject to TSCA 12(b) export notification requirements.

FIFRA information

EPA registration number : 464-78

This chemical is a pesticide product registered by the Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets, and for workplace labels of non-pesticide chemicals. Following is the hazard information as required on the pesticide label:

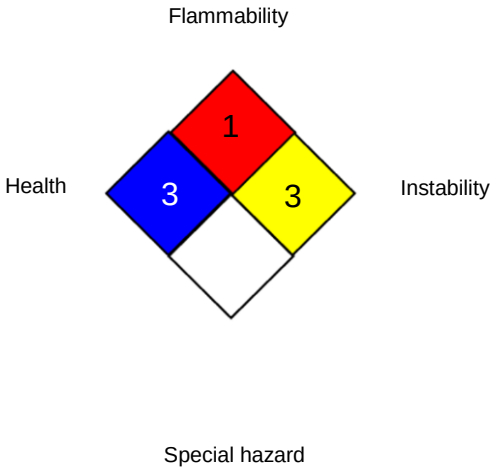
Signal Word : DANGER

Hazard Statements : Corrosive to skin eye damage Harmful if swallowed.

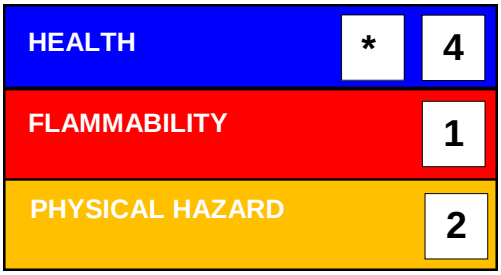
SECTION 16. OTHER INFORMATION

Further information

NFPA 704:



HMIS® IV:



HMIS® ratings are based on a 0-4 rating scale, with 0 representing minimal hazards or risks, and 4 representing significant hazards or risks. The "*" represents a chronic hazard, while the "/" represents the absence of a chronic hazard.

Full text of other abbreviations

ACGIH	:	USA. ACGIH Threshold Limit Values (TLV)
OSHA Z-1	:	USA. Occupational Exposure Limits (OSHA) - Table Z-1 Limits for Air Contaminants
ACGIH / C	:	Ceiling limit
OSHA Z-1 / TWA	:	8-hour time weighted average

AIIC - Australian Inventory of Industrial Chemicals; ASTM - American Society for the Testing of Materials; bw - Body weight; CERCLA - Comprehensive Environmental Response, Compensation, and Liability Act; CMR - Carcinogen, Mutagen or Reproductive Toxicant; DIN - Standard of the German Institute for Standardization; DOT - Department of Transportation; DSL - Domestic Substances List (Canada); ECx - Concentration associated with x% response; EHS - Extremely Hazardous Substance; ELx - Loading rate associated with x% response; EmS - Emergency Schedule; ENCS - Existing and New Chemical Substances (Japan); ErCx - Concentration associated with x% growth rate response; ERG - Emergency Response Guide; GHS - Globally Harmonized System; GLP - Good Laboratory Practice; HMIS - Hazardous Materials Identification System; IARC - International Agency for Research on Cancer; IATA - International Air Transport Association; IBC - International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk; IC50 - Half maximal inhibitory concentration; ICAO - International Civil Aviation Organization; IECSC - Inventory of Existing Chemical Substances in China; IMDG - International Maritime Dangerous Goods; IMO - International Maritime Organization; ISHL - Industrial Safety and Health Law (Japan); ISO - International Organization for Standardization; KECI - Korea Existing Chemicals Inventory; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); MARPOL - International Convention for the Prevention of Pollution from Ships; MSHA - Mine Safety and Health Administration; n.o.s. - Not Otherwise Specified; NFPA - National Fire Protection Association; NO(A)EC - No Observed (Adverse) Effect Concentration; NO(A)EL - No Observed (Adverse) Effect Level; NOELR - No Observable Effect Loading Rate; NTP - National Toxicology Program; NZIoC - New Zealand Inventory of Chemicals; OECD - Organization for Economic Co-operation and Develop-

ment; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, Bioaccumulative and Toxic substance; PICCS - Philippines Inventory of Chemicals and Chemical Substances; (Q)SAR - (Quantitative) Structure Activity Relationship; RCRA - Resource Conservation and Recovery Act; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorization and Restriction of Chemicals; RQ - Reportable Quantity; SADT - Self-Accelerating Decomposition Temperature; SARA - Superfund Amendments and Reauthorization Act; SDS - Safety Data Sheet; TCSI - Taiwan Chemical Substance Inventory; TECI - Thailand Existing Chemicals Inventory; TSCA - Toxic Substances Control Act (United States); UN - United Nations; UNRTDG - United Nations Recommendations on the Transport of Dangerous Goods; vPvB - Very Persistent and Very Bioaccumulative

Revision Date : 09/05/2025

The data contained in this Safety Data Sheet are based on our current knowledge and experience and describe the product only with regard to safety requirements. 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 to be a guidance for processing and does not contain any 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. It is the responsibility of the recipient of the product to ensure that any proprietary rights and existing laws and legislation are observed.

Relevant changes from the previous version are marked on the left side of the Safety Data Sheet with a black double bar in appropriate places.

US / EN