

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

SECTION 1. IDENTIFICATION

Product name : LAPONITE-XLS XR

Manufacturer or supplier's details

Company : BYK USA LLC
524 South Cherry Street
Wallingford CT 06492

Telephone : (203) 265-2086

Visit our web site : www.byk.com

E-mail address : BRIEF.BYK.NAFTA@altana.com

Emergency telephone number : 203-265-2086; CHEMTREC 1-800-424-9300 / +1 703-527-3887

Recommended use of the chemical and restrictions on use

Recommended use : Rheology Additive

Restrictions on use : Refer to Section 15 for any restrictions that may apply

SECTION 2. HAZARDS IDENTIFICATION

GHS Classification

Not a hazardous substance or mixture.

GHS label elements

Not a hazardous substance or mixture.

Other hazards

None known.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance / Mixture : Mixture

Chemical nature : Synthetic (modified) phyllosilicate

Hazardous components

Component	CAS-No.	Concentration (%)
Tetrasodium pyrophosphate	7722-88-5	>= 5 - < 10

SECTION 4. FIRST AID MEASURES

General advice : Do not leave the victim unattended.

If inhaled : If breathed in, move person into fresh air.
If unconscious, place in recovery position and seek medical advice.

If symptoms persist, call a physician.

In case of skin contact : Remove contaminated clothing. Wash thoroughly with soap

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

In case of eye contact	: and water. Flush eyes with water as a precaution. Remove contact lenses. Protect unharmed eye. If eye irritation persists, consult a specialist.
If swallowed	: Keep respiratory tract clear. Do not give milk or alcoholic beverages. Never give anything by mouth to an unconscious person. If symptoms persist, call a physician.
Most important symptoms and effects, both acute and delayed	: No information available.

SECTION 5. FIREFIGHTING MEASURES

Suitable extinguishing media	: Alcohol-resistant foam Carbon dioxide (CO ₂) Dry chemical
Unsuitable extinguishing media	: High volume water jet
Specific hazards during firefighting	: Handle as an industrial chemical. Will not explode on mechanical impact. Do not allow run-off from fire fighting to enter drains or water courses.
Hazardous combustion products	: Oxides of phosphorus
Further information	: Standard procedure for chemical fires. Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.
Special protective equipment for firefighters	: Wear self-contained breathing apparatus for firefighting if necessary.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures	: Use personal protective equipment. Avoid breathing dust. : Avoid dust formation. : Keep people away from and upwind of spill/leak. Material can create slippery conditions. Only qualified personnel equipped with suitable protective equipment may intervene.
Environmental precautions	: Prevent further leakage or spillage if safe to do so. Try to prevent the material from entering drains or water courses. Local authorities should be advised if significant spillages

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

cannot be contained.

Methods and materials for containment and cleaning up : Contain spillage, and then collect with an electrically protected vacuum cleaner or by wet-brushing and place in container for disposal according to local regulations (see section 13).

SECTION 7. HANDLING AND STORAGE

Advice on safe handling : For personal protection see section 8.
Smoking, eating and drinking should be prohibited in the application area.

Conditions for safe storage : Avoid dust formation.
Keep container tightly closed.
Electrical installations / working materials must comply with the technological safety standards.

Materials to avoid : No special restrictions on storage with other products.

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Components with workplace control parameters

Components	CAS-No.	Value type (Form of exposure)	Control parameters / Permissible concentration	Basis
Tetrasodium pyrophosphate	7722-88-5	TWA	5 mg/m ³	NIOSH REL
Tetrasodium pyrophosphate		TWA	5 mg/m ³	OSHA P0

Further occupational exposure limits

Description	Value type	Control parameters	Basis
inert or nuisance dust	TWA	50 Million particles per cubic foot total dust	OSHA Z-3
	TWA	15 mg/m ³ total dust	OSHA Z-3
	TWA	5 mg/m ³ respirable fraction	OSHA Z-3
	TWA	15 Million particles per cubic foot respirable fraction	OSHA Z-3

Engineering measures : Use with local exhaust ventilation.

Personal protective equipment

Respiratory protection : If handling heated or misted product in a poorly ventilated area, wear a properly fitted respirator (NIOSH) during exposure.

Hand protection

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

Material	: Impervious gloves
Remarks	: The suitability for a specific workplace should be discussed with the producers of the protective gloves.
Eye protection	: Safety glasses Wear safety glasses with side shields or goggles. If the work environment or activity involves dusty conditions, mists or aerosols, wear the appropriate goggles.
Skin and body protection	: Work uniform or laboratory coat. Protective suit
Hygiene measures	: General industrial hygiene practice.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Physical state	: powder
Colour	: white
Odour	: odourless
Odour Threshold	: Not applicable
pH	: 9.7, Concentration: 20 g/l(as a dispersion)
Melting point/ range	: Not applicable
Boiling point/boiling range	: Not applicable
Vapour pressure	: Not applicable
Flash point	: Not applicable
Upper explosion limit	: Not applicable
Lower explosion limit	: Not applicable
Evaporation rate	: Not applicable
Flammability (solid, gas)	: Will not burn
Relative vapour density	: Not applicable
Relative Density/Specific Gravity	: No data available
Particle size	: No data available
Density	: No data available
Bulk density	: 1,000 kg/m ³
Solubility(ies) Water solubility	: partly soluble

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

Solubility in other solvents : No data available

Partition coefficient: n-octanol/water : No data available

Ignition temperature : Not applicable

Auto-ignition temperature : Not applicable

Thermal decomposition : No data available

Viscosity
Viscosity, dynamic : Not applicable

SECTION 10. STABILITY AND REACTIVITY

Reactivity : Not classified as a reactivity hazard.

Chemical stability : Stable; polymerization will not occur
Stable under normal conditions.

Possibility of hazardous reactions : No data available

Incompatible materials : Strong acids and oxidizing agents

Hazardous decomposition products : No data available

SECTION 11. TOXICOLOGICAL INFORMATION**Information on likely routes of exposure****Acute toxicity****Product:**

Acute oral toxicity : Acute toxicity estimate : > 5,000 mg/kg
Method: Calculation method

Components:**7722-88-5 Tetrasodium pyrophosphate:**

Acute oral toxicity : LD50 (Rat): > 300 - < 2,000 mg/kg
Method: OECD Test Guideline 420
GLP: yes

Skin corrosion/irritation**Product:**

Remarks: No data available

Components:**7722-88-5 Tetrasodium pyrophosphate:**

Result: No skin irritation

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

Species: Rabbit
Method: OECD Test Guideline 404
Result: No skin irritation
GLP: yes

Serious eye damage/eye irritation**Product:**

Species: Bovine corneal opacity and permeability assay (BCOP)
Result: No eye irritation
Method: OECD Test Guideline 437
GLP: yes

Components:**7722-88-5 Tetrasodium pyrophosphate:**

Result: Severe eye irritation
Assessment: Risk of serious damage to eyes.

Species: Rabbit
Result: Corrosive to eyes
Method: OECD Test Guideline 405
GLP: yes

Respiratory or skin sensitisation**Product:**

Remarks: No data available

Components:**7722-88-5 Tetrasodium pyrophosphate:**

Test Type: Mouse Local Lymph Node assay (LLNA)
Exposure routes: Skin contact
Species: Mouse
Method: OECD Test Guideline 429
Result: Not a skin sensitizer.
GLP: yes

Germ cell mutagenicity**Product:**

Genotoxicity in vitro : Remarks: No data available

Genotoxicity in vivo : Remarks: No data available

Carcinogenicity

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

Product:

Remarks: No data available

IARC

No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

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 component 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**Product:**

Effects on fertility : Remarks: No data available

Effects on foetal development : Remarks: No data available

STOT - single exposure**Product:**

Remarks: No data available

STOT - repeated exposure**Product:**

Remarks: No data available

Repeated dose toxicity**Product:**

Remarks: No known chronic health effects.

Aspiration toxicity**Product:**

No data available

Experience with human exposure**Product:**

Inhalation:

Symptoms:

Dust particles may cause irritation of the respiratory tract.

Skin contact:

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

	Symptoms:	Contact may cause irritation.
Eye contact:	Symptoms:	Contact may cause irritation.
Ingestion:	Symptoms:	Ingestion will probably cause irritation of the digestive tract.

Further information

Product:

Remarks: No data available

SECTION 12. ECOLOGICAL INFORMATION

Ecotoxicity

Product:

Toxicity to fish :
Remarks: No data available

Toxicity to daphnia and other aquatic invertebrates :
Remarks: No data available

Persistence and degradability

Product:

Biodegradability : Remarks: No data available

Bioaccumulative potential

Product:

Bioaccumulation : Remarks: No data available

Mobility in soil

No data available

Other adverse effects

No data available

Product:

Regulation 40 CFR Protection of Environment; Part 82 Protection of Stratospheric Ozone - CAA Section 602 Class I Substances

Remarks This product neither contains, nor was manufactured with a

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

Class I or Class II ODS as defined by the U.S. Clean Air Act Section 602 (40 CFR 82, Subpt. A, App.A + B).

Additional ecological information : No data available

SECTION 13. DISPOSAL CONSIDERATIONS**Disposal methods**

EPA Hazardous Waste Code(s) : Not applicable.

Contaminated packaging : Empty containers should be taken to an approved waste handling site for recycling or disposal.

SECTION 14. TRANSPORT INFORMATION**International Regulations****IATA-DGR**

Not regulated as a dangerous good

IMDG-Code

Not regulated as a dangerous good

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

Not applicable for product as supplied.

National Regulations**49 CFR**

Not regulated as a dangerous good

SECTION 15. REGULATORY INFORMATION**EPCRA - Emergency Planning and Community Right-to-Know Act****US. EPA CERCLA Hazardous Substances (40 CFR 302)**

This material does not contain any components with a CERCLA RQ.

SARA 304 - Emergency Release Notification

This material does not contain any components with a section 304 EHS RQ.

US. EPA Emergency Planning and Community Right-To-Know Act (EPCRA) SARA Title III Section 302 Extremely Hazardous Substance (40 CFR 355, Appendix A)

This material does not contain any components with a SARA 302 RQ.

SARA 311/312 Hazards : Per the June 13, 2016 Federal Register notice, EPA harmonized the EPCRA 311/312 hazard categories with the 2012 OSHA hazard communication standard for classifying and labeling of chemicals (i.e. GHS). Please refer to Section 2

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

of the SDS to identify the appropriate hazard categories for reporting purposes.

SARA 302 : No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 : This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

Clean Air Act

This product does not contain any hazardous air pollutants (HAP), as defined by the U.S. Clean Air Act Section 112 (40 CFR 61).

This product does not contain any chemicals listed under the U.S. Clean Air Act Section 112(r) for Accidental Release Prevention (40 CFR 68.130, Subpart F).

Non-volatile (Wt) : No data available

Massachusetts Right To Know

Tetrasodium pyrophosphate 7722-88-5

Pennsylvania Right To Know

Synthetic phyllosilicate 53320-86-8

Tetrasodium pyrophosphate 7722-88-5

New Jersey Right To Know

New Jersey Trade Secret Registry Number for the product (NJ TSRN) : 800963-1099

California Prop. 65

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

The components of this product are reported in the following inventories:

TSCA : All substances listed as active on the TSCA inventory

Section 5a : No substances are subject to a Significant New Use Rule.

Section 4 / 12(b) : No substances are subject to TSCA 12(b) export notification requirements.

DSL : We certify that all of the components of this product are listed on the DSL.

LAPONITE-XLS XR

Version 3

Revision Date 05/17/2026

Print Date 06/18/2026

SECTION 16. OTHER INFORMATION

Revision Date : 05/17/2026

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