

TECHNICAL DATA SHEET

Sodium Lignosulfonate Emulsifier Grade

Lignin-Based Industrial Emulsifier, Protective Colloid and Suspension Stabilizer

Product Code	GAC-NaLS-Emulsifier	Product Type	Lignosulfonate / Emulsifier / Protective Colloid
CAS No.	8061-51-6	Physical Form	Brown water-soluble powder
Version	V2.1 May 2026	Primary Markets	Industrial Emulsions - Suspensions - Chemical Formulations

Primary Role Emulsifier and stabilizer	Performance Focus Emulsion and suspension stability	Industrial Fit Oil-water systems and formulations	Supply Support TDS, SDS, COA and samples
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1. Product Overview

Sodium Lignosulfonate Emulsifier Grade is a naturally derived amphiphilic biopolymer used as an industrial emulsifier and colloidal stabilizer. Its anionic sulfonate groups and lignin backbone help reduce interfacial tension, stabilize droplets and suspend fine particles in complex formulations.

2. Key Performance Functions

- **Interfacial Activity:** helps reduce oil-water interfacial tension.
- **Steric Stabilization:** forms a protective layer around dispersed droplets.
- **Electrostatic Repulsion:** anionic groups help reduce flocculation and coalescence.
- **Rheology Support:** contributes to continuous-phase viscosity and suspension stability.
- **Metal Ion Complexation:** helps chelate selected ions that may destabilize formulations.

3. Main Specifications

Parameter	Specification
Appearance	Brown powder
Dry Matter	>= 95%
Water-Insoluble Matter	<= 0.5%
Calcium & Magnesium	<= 0.5%
Lignosulfonate Content	>= 70%
Moisture	<= 7.0%

Note: The above values are typical technical data for reference. Final agreed specification and COA shall prevail.

4. Recommended Application Areas

Application Area	Typical Use	Customer Value
Industrial Emulsions	Emulsifier and protective colloid for oil-water formulations.	Improves droplet stability and reduces phase separation.
Chemical Formulations	Surface-active component in water-based systems.	Supports formulation consistency and storage stability.
Pigments & Solids	Suspension aid for fine particles and insoluble solids.	Reduces aggregation and settling.
Agrochemical Systems	Dispersing/emulsifying aid in selected formulations.	Improves uniform distribution after compatibility testing.
Process Additives	Auxiliary stabilizer in industrial processing systems.	Improves handling and formulation robustness.

5. Suggested Usage Guidance

Application	Typical Starting Dosage / Use	Technical Note
Emulsion systems	Trial dosage recommended	Optimize by oil phase, emulsifier package and pH.
Suspension systems	0.5% - 3.0% starting range	Adjust by solids content and particle size.
Chemical blends	Compatibility test required	Check salts, surfactants and multivalent ions.
Process scale-up	Pilot test recommended	Verify stability under temperature and shear conditions.

Dosage and application method should be verified by laboratory or pilot testing. Performance depends on formulation type, raw materials, process conditions, temperature, moisture, mixing time and target technical results.

6. Packaging, Storage & Handling

Packaging	Storage & Handling
<ul style="list-style-type: none"> 25 kg woven bags / kraft bags with inner PE liner. 500 kg, 600 kg or 1,000 kg jumbo bags available on request. Palletized, neutral or customized packing can be discussed. 	<ul style="list-style-type: none"> Store in a cool, dry and ventilated warehouse. Keep away from moisture, rain, direct sunlight and strong oxidizing materials. Recommended shelf life: 12 months under original sealed packaging.

Please refer to the corresponding Safety Data Sheet before use. Product suitability for regulated applications must be confirmed separately according to local laws and customer requirements.

7. Documents & Technical Support

- TDS, SDS/MSDS, COA and agreed specification support.
- Sample arrangement and product grade recommendation.
- Packing photos, loading information and export document support.
- Application discussion and grade selection support for industrial buyers.

8. Inquiry Information

For quotation, sample request or technical document support

Please provide application, required quantity, destination port, packaging preference and target technical requirement.

Website: www.lignincorp.com | **Email:** info@greenagrochem.com

Disclaimer

The information in this Technical Data Sheet is provided for reference and general guidance only. It does not constitute a legally binding specification or warranty. Customers should conduct their own tests to determine product suitability for their intended application. Final commercial specification shall be subject to agreed contract, product grade and COA.