



Anti-Seize and Lubricating Compound

1 Scope

1.1 Material Description. This specification defines mineral oil grease with lithium thickener.

1.2 Symbols. Not applicable.

1.3 Typical Applications. This grease is designed primarily to eliminate brake squeal by application to brake pad backing plates.

1.4 Remarks. This specification describes requirements for grease used by Customer Care and Aftersales.

2 References

Note: Only the latest approved standards are applicable unless otherwise specified.

2.1 External Standards/Specifications.

ASTM D217

ASTM D1264

ASTM D2265

ASTM D2596

2.2 GM Standards/Specifications.

GMW3059

2.3 Additional References.

- Bostik Never-Seez Regular Grade.
- TMC003 Material Safety Data Sheet guidance documents (available at www.gmsupplypower.com).

3 Requirements

3.1 General Requirements.

3.1.1 Base Oil. Mineral oil shall be the base oil.

3.1.2 Thickener. Lithium soap shall be the thickener.

3.1.3 Other ingredients. The grease shall contain copper and graphite particles.

3.2 Specific Requirements.

3.2.1 Dropping point (ASTM D2265): 180 °C minimum.

3.2.2 Four ball load wear index (ASTM D2596): 80 kgf minimum.

3.2.3 Four ball wear scar (ASTM D2596): 0.5 mm maximum.

3.2.4 Four ball weld load (ASTM D2596): 4800 N, minimum.

3.2.5 Penetration, worked 60 strokes at 25 °C (ASTM D217): 260 mm – 310 mm/10 (NLGI 1-2).

3.2.6 Water washout (ASTM D1264) at 38 °C: 0.5% maximum.

3.2.7 Water washout (ASTM D1264) at 79 °C: 2.5% maximum.

4 Manufacturing Process

Not applicable.

5 Rules and Regulations

5.1 Legal Regulations. All materials must satisfy applicable laws, rules, regulations and recommendations valid in the country of usage.

5.2 Language. In the event of conflict between the English and domestic language, the English language shall take precedence.

5.3 Inspection and Rejection. All shipments of material or parts under contract or purchase order manufactured to this specification shall be equivalent in every respect to the initial samples approved by Engineering. There shall be no changes in either formulation or manufacturing processes permitted without prior notification and approval by Engineering. Lack of notification by the supplier constitutes grounds for rejection of any shipment. While samples may be taken from incoming shipments and checked for conformance to this specification, the supplier shall accept the responsibility for incoming shipments meeting this specification without dependence upon purchaser's inspection.

The series of tests used to approve each batch of product along with acceptance limits will be agreed upon by the purchaser and seller. The laboratory providing the certificate of analysis must also participate in a proficiency testing program (round robin) that is approved by the Fuels, Fluids, and Lubricants Global Subsystem Leadership Team (GSSLT) or designate. The Fuels, Fluids, and Lubricants GSSLT or designate must receive copies of the proficiency testing reports directly from the test program administrator.

5.4 Initial Source Approval. No shipment shall be made by any supplier until representative initial production samples have been approved by the Fuels, Fluids, and Lubricants Global Subsystem Leadership Team or designees meeting the requirements of this specification.

5.5 Material Safety Data Sheets/Safety Data Sheets (MSDS/SDS). For new product submissions, or when a change in chemical composition of an existing product has occurred, a complete copy of the Material Safety Data Sheet/Safety Data Sheet must be submitted in compliance with the Globally Harmonized System of Classification and Labeling of Chemicals (GHS) requirements or other country-specific MSDS/SDS requirements. In addition, product MSDS/SDS submissions must be in compliance with specific country General Motors TMC003 Material Safety Data Sheet/Safety Data Sheet guidance documents where available.

5.6 All materials supplied to this standard must comply with the requirements of GMW3059, **Restricted and Reportable Substances for Parts.**

6 Approved Sources

Materials supplied to this specification must be approved by General Motors.

A list of approved materials can be found in MATSPC. This GM Material File is provided to third parties to reduce redundant testing of materials. If approved material already listed is used, the part supplier can use GM Material File reference for Production Part Approval Process (PPAP) material approval. If the decision is made to use a not yet approved material, contact the Fuels, Fluids, and Lubricants GSSLT for details on the approval process. The material approval process must be completed prior to PPAP start date of the part supplied to General Motors. A product meeting this specification is Bostik Never-Seez Regular Grade.

7 Notes

7.1 Glossary.

MATSPC: Global repository of GM Approved Materials for corresponding GM Engineering Standards.

7.2 Acronyms, Abbreviations, and Symbols.

ASTM	ASTM International
GHS	Globally Harmonized System of Classification and Labeling of Chemicals
GSSLT	Global Subsystem Leadership Team
MSDS	Material Safety Data Sheet
NLGI	National Lubricating Grease Institute
PPAP	Production Part Approval Process
SDS	Safety Data Sheet