

## General Maintenance Manual

1. Scope: It is the purpose of this document to provide general storage and maintenance instructions for all DynaTorque quarter-turn and multi-turn products.
2. Instructions:
  - A. Storage: For best results, DynaTorque operators should be stored in a clean, dry area in their shipping containers. If operators are stored in high humidity areas, steps should be taken to reduce the amount of moisture the units will be exposed to. Operator input shafts are plated to prevent corrosion. If operators are being stored for a long period of time, operator mounting surfaces should be lightly greased to prevent corrosion.
  - B. Maintenance: DynaTorque manual operators do not require periodic maintenance. They are, for most applications, lubricated for life, with all components designed to have a life equal to or exceeding the wear life of the operator gearing.
  - C. Lubrication: If for any reason, lubrication replacement is necessary, DynaTorque recommends replacement of that lubrication with:

### DynaTorque Standard Grease Specification:

NLGI Grade: Grade 2 EP  
Grease Base: Polyurea Complex  
Color: Black  
Anti-Wear EP Additives: Yes  
Dropping Point: ASM D2265 280Deg(60Deg C)/350Deg(100 Deg C)  
4 Ball Wear KG Load ASTM 2596: 400(0.42)  
Timken OK Load Lbs. ASTM 2509: 60  
Base Oil Viscosity @100 Deg. F. Sus: 899  
Base Oil Viscosity @ 210 Deg. F. Sus: 80  
Base Oil Viscosity Index (min) ASTM D2270: 150  
Pour Point ASTM D97: 5 Deg. (-15 Deg C)

- D. Spare Parts: DynaTorque warranty's work performed by the factory or by factory trained personnel only. Please consult the factory or your local DynaTorque representative to arrange assistance. DynaTorque modifies a great percentage of its operators to meet specific customer requirements. Please refer to the operator part list number as supplied on the shipping document, acknowledgement, or invoice, when ordering spare parts.
- E. Spare Parts: For your records, please enter the operator part number from you shipping documents, acknowledgement, or invoice here:

Part Number: \_\_\_\_\_

Date Stamp: \_\_\_\_\_ (Located on the bottom of the operator housing.)

### **Please Note:**

When assembling DynaTorque products to a valve or to an automated valve package, standard engineering practices must be utilized to assure proper mounting orientation, configuration, and distribution of weights and forces. Failure to do so could cause product damage and/or malfunction, **and void warranty consideration**. If there are any questions please contact the factory at [info@dynatorque.com](mailto:info@dynatorque.com).