

Seatrax Hoist Inspection Requirements

Gear Reducer Internal Inspections

Disassembly and internal inspection of the **gear reducer** components during annual inspections or other routine inspection intervals is NOT REQUIRED and is NOT RECOMMENDED.

Disassembly and internal inspection of the **gear reducer** components is only required if any of the following conditions are encountered during operation:

- Strange or unusual noises
- Unusual or sudden increase in the surface temperature of the **gear housing**
- Substantial leakage of **gear lubricant**
- Unusual amounts of metal or other contaminants in the **gear lubricant**

Please note that all **gearing** can be removed, inspected and replaced without removing the **wire rope** or the **hoist drum** or removing the **hoist** from its mount. All disassembly and reassembly must be done in accordance with the procedures contained in the crane's **operation and maintenance manual**.

Gear Reducer Lubricant Inspections

The **hoist** should be visually examined during each pre-use inspection for external leakage of the **gear reducer lubricant**. Appropriate action should be scheduled and remedy the cause of any observed leakage. **Lubricant** should be immediately returned to an acceptable level.

The **lubricant** should be checked on a regular basis for unusual amounts of metal or other contaminants. The result of these checks should be documented. The quality of the **hoist lubricant** is considered a primary indicator of the mechanical integrity of the **gear reducer** components.

Spring-Set Hoist Brake Component Inspections

Disassembly and internal inspection of the **brake actuator** components during annual inspections or other routine inspection intervals is NOT REQUIRED and NOT RECOMMENDED.

Disassembly and internal inspection of the **brake actuator** components is only required if any of the following conditions are encountered during operation:

- Failure to pass the **spring-set hoist brake** test, unless such failure is because of problems with external hydraulic system components

- “Creep” or unintentional payout of the **hoist cable**
- “Chatter” or rough operation unrelated to the **hydraulic counter balance valve** (a separate component mounted to the **hydraulic motor**)
- **Hydraulic fluid** leakage other than hose or fittings

Please note that all **spring-set hoist brake** components can be removed, inspected and replaced without removing the **wire rope** or the **hoist drum** or removing the **hoist** from its mount. All disassembly and reassembly must be done in accordance with the procedures contained in the crane’s **operation and maintenance manual**.

Hardware and Miscellaneous Component Inspections

The following components should be **visually inspected** on a regular basis. Any deficiency should be immediately corrected as applicable.

- Hoist mounting bolts (where applicable)
- Hammer nut drum retainer
- Hammer nut locking plate and bolts
- Brake band live end bushing and cotter key
- Brake lever and retaining bolt
- Brake linkage pins and cotter keys
- Brake band
- Brake end drum shaft bearing
- Wire rope dead end connection
- Ratchet and dog components (where applicable)