

STORAGE OF WEG ELECTRIC MOTORS

When a motor is not required immediately or the unit is a spare or backup motor, the following points should be adhered to:

- The motor should be stored upright in its normal position, free of dust, dirt, gasses and corrosive atmospheres
- Motors should be stored under a roof on a concrete base, normally in a sheltered store environment. Do not remove the motor from the wooden pallet
- For larger units which cannot be housed in a store or relevant building, a shed must be built with a proper concrete floor. Do not remove the motor from the wooden pallet
- Store the larger units close to the actual application under an existing overhead crane or in a position that has easy access to a mobile crane where applicable
- Do not stack any objects on top of or against the motor
- Motors must be stored in places free from vibrations in order to avoid damage to the bearings
- For motors with space heaters/anti-condensation heaters, these accessories must be energised at all times to avoid condensation and corrosion within the enclosure
- If the paint has been damaged during transport, it must be repainted to prevent rusting
- Ensure all machined surfaces and shaft extensions are covered with grease or a rust inhibiting product
- For Slipring motors, the brushes must be lifted to avoid condensation between contact surfaces and sliprings

Please note: before operation, all brushes and contact surfaces have to be inspected and brush seating confirmed.

/Bearing Maintenance.....

Bearing Maintenance

- When any motor is kept in stock for an extended period, the shaft must be manually rotated at monthly intervals
- For motors with sleeve bearings, one should install a hydrostatic shaft lifting device in order to achieve shaft rotation
- Before turning the shaft of motors with standard sleeve bearings and no facility to connect hydrostatic shaft lifting devices, lift the shaft 0,1mm with a jack (make use of the dial indicator at the top of the shaft). Then put oil through the top sight glass of the bearing shell, on **both** bearings. Lower the shaft and turn the shaft immediately. This procedure will reduce the friction between the shaft and bearing shell
- For large machines with frames $\geq 400\text{mm}$, the shaft should be rotated monthly at any number of turns and then put to rest at 180° angle different to the previous stationary position

Insulation Resistance Maintenance

- When a motor is not immediately required, it should be protected against moisture, high temperatures and contamination in order to avoid damage to the insulation system
- If the ambient contains high humidity, a periodical insulation resistance inspection is recommended during storage
- The following guidelines show the approximate insulation resistance values that can be expected from a clean and dry motor at 40°C ambient:

Minimum Insulation Resistance = Rated Voltage in kV + 1

Example: 11 000 Volt Stator = 11 + 1 = 12 M Ω @ 2 x Rated Voltage
 2 800 Volt Rotor = 2.8 + 1 = 3.8 M Ω @ 2 x Rated Voltage

These periodical measurements should be recorded and be available prior to installation.

For any additional information regarding storage and or installation instructions, please consult the WEG Installation and Maintenance Manual or contact the Zest Customer Service Department on 011 723 6000.