Duff-Norton offers constant speed AC Motor Control Systems for machine and ball screw actuators. These new control systems provide the option of jogging-inching, or maintained operation, when specified as part of a Duff-Norton Linear Positioning System. Numerous options are available including short circuit protection, pilot lamps, illuminated push buttons, and loose limit switches, as well as single and three phase power up to 575 VAC. Contact Duff-Norton for all your special control applications needs. Duff-Norton can be your single source for complete linear positioning systems.
For application analysis form, see front of guide. Assembled with UL and CE listed components.

Jogging-Inching Operation with Constant Speed AC Motor

Duff-Norton Jogging-Inching AC Motor Controls provide simple operation and reliable service. The operator must hold the push button down to activate motion in a direction, and release the push button to stop motion. If the end of travel limit switch is activated while in operation, the system stops automatically.

Features

Jogging-Inching Controls Feature

- NEMA 12 Enclosure
- Full Voltage Reversing Motor Starter
- Horsepower Rated Overload Relay
- Fused Control Voltage Transformer
- Extend and Retract Push Buttons
- Customer Connection Terminal Strips
- With Fused Short Circuit Disconnects

AC Motor Control unit for Jogging-Inching Operation

Optional fused short circuit protection.

Additional Feature Options

- End of travel limit switches are available through Duff-Norton.
- Motor short circuit protection is available through Duff-Norton.

Maintained Operation with Constant Speed AC Motor

Duff-Norton Maintained Operation AC Motor Controls are designed for systems that do not require monitoring while in operation. To activate the system the operator must engage the pushbutton in a direction. The operation will continue until the end of travel limit switch is tripped, at which time the operation will stop. The operation can be stopped at any time by activating the stop push button.

Features

Maintained Operation Controls Feature

- NEMA 12 Enclosure
- Full Voltage Reversing Motor Starter
- Horsepower Rated Overload Relay
- Fused Control Voltage Transformer
- Extend and Retract Push Buttons
- Stop Push Button
- Customer Connection Terminal Strips

Optional circuit breaker and disconnect

Additional Feature Options

- End of travel limit switches are available through Duff-Norton.
- Motor short circuit protection is available through Duff-Norton.

Standard Features for all Control Boxes

- All starters meet or exceed IEC, UL, CSA, CE, V DE, BS and other international standards.
- All starters are built in the USA
- Full rated IEC Full Voltage Motor Starter
- 115 VAC Control Voltage Transformer with Fused Primary and Secondary on all 3-Phase Units
- Single Phase Protection of Three Phase Circuits
- Overload Trip Indication on Starter
- Interchangeable Overload Relays to Accommodate Motor Full Load Ratings
- Adjustable Overload Relays to Accommodate Full Load and Service Factor Variables
- Designed for 1.5 Million Cycles
- Compact Design -20" H x 10" W x 8" D
- Door Mounted Reset Push Button to Reset Overload Relay if Tripped without Opening the Enclosure

Optional Features for AC Motor Controls

- **Power On pilot Lamp**

The pilot lamp is mounted to the enclosure door and wired to indicate the presence of control power in the enclosure.

- **Overload Tripped Pilot Lamp**

The pilot lamp is mounted to the enclosure door and wired to indicate that the motor overload relay has tripped.

- **Loose Limit Switches**

Limit switches (2) supplied loose. NEMA 4 rated, with adjustable rollers (not rotary) for customer mounting. (Rotary switches directly mounted by the factory to the actuator are also available.)

- **Fused Short Circuit Protection**

Provides fuses and fuse holders mounted and wired within the enclosure to provide motor and component protection.

- **Circuit Breaker Short Circuit Protection and Disconnect**

Provides motor and component protection and includes a door mounted and interlocked switch mechanism allowing access to panel with power off.

- **NEMA 4 Rated Enclosure and Operating Devices**

The NEMA 4 rated enclosure provides dust, dirt, and water protection in wash down duty situations such as food, drug, washing, and cleaning applications. Standard enclosure is NEMA 12 rated for dust, dirt and oil protection.

- **End of Travel Pilot Lamps**

Provides 2 pilot lamps mounted on the enclosure door and wired to indicate when the end of travel is reached. Limit switches are required for this and must be ordered separately.

- **Traveling Illuminated Push Buttons**

These provide illumination within the existing push buttons to indicate that a control in engaged.

Loose adjustable roller type limit switches.

AC Motor Control unit for maintained operation equipped with optional "Power On" pilot lamp, overload tripped pilot lamp, jog/maintain selector switch, end of travel pilot lamps and travelling illuminated push buttons.