TCW-19 TORQUE CONTROLLER

Features:

1) Fully Solid State Design - no moving parts - no wear and tear of parts - no noise - consequently long life.
2) Uses one main circuit board for easy maintenance.
3) Uses the latest micro-controller chip for control functions.
4) Accurately calibrated digital torque settings with a resolution of 1 watt makes torque settings accurate and can be easily reproduced for identical results.
5) Soft start has been provided for all drives. This feature reduces starting currents in the drive. As a result, life of carbon brushes and drive increases.
6) Connected drive is automatically recognised & indicated by means of LED on the torque controller.
7) Torque setting arranged in four different ranges to suit four different drives. Appropriate wattage range is automatically selected for the connected drive, hence drives can not be abused or overused.
8) Actual drive wattage (torque) is displayed. Set wattage (torque), drive current and line voltage can be seen by press of a button.
9) Trip time adjustable from (0.1 sec to 10 secs.)
10) Adjustable reverse time from (1 sec to 90 secs.)
11) TRIP time cannot be set if the SET value is below 'no load wattage'. In this case the TRIP time will be automatically set to 7 secs.
12) The panel enables the operator to select “Speed change % wattage” between 50 % and 100% of the SET wattage.
13) This effectively reduces the variation between TRIP value & SET value.
14) Pause time (time interval between cycles) adjustable from (1 sec to 90 secs.)
15) Manual reverse by push button, in case of emergency.
16) Drive Speed adjustable in reverse rotation.
17) Hand (trigger) mode or foot switch mode, both are available.
18) Expansions can be carried out either in single cycle mode or auto repeat mode.
19) LED indicators provided for forward, reverse & trip conditions of drive.
20) MCB has been provided to protect the controller and drives against over current by short circuits.
21) Plug in type of PCBs reduce down time to minimum during trouble shooting.
22) All the spares inside the panel viz : PCBs, Transformers, CT, Relays DPM etc. can be replaced by use of only a screw driver.
23) Superior SCR technology has been incorporated rather than triacs. SCRS have much better voltage, current & dv/dt ratings than triacs. This leads to greater reliability & the power circuit becomes almost failsafe.

Microprocessor used	:	89C55WD (8 bit)
Clock Frequency	:	12 Mhz
Programme Memory	:	built in
Real Power Measurement upto	:	2 KW
Voltage, Current sampling rate	:	50 times/sec.

Model No.	Voltage Single Phase 50/60 Hz	Weight (kg)
TCW-19-110	110 V	7.5
TCW-19-230	230 V	7.5

Note : All TCW torque controllers are supplied with operation manuals.