Product Features

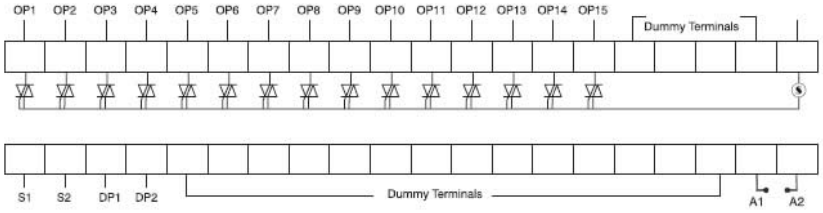
- Suitable for screw mounting(except ST4-M1).
- 7 segment display indication for channel and timing operation (except ST-4M1).
- User friendly programming for ON/OFF time selection independently (except ST-4M1).
- Hold /Restart feature is available during power failure, Over voltage protection(except ST-4M1).
- ST-6M1 / ST-10M2 / ST-10M1 : pulse start signal.
- ST-15M2 / ST-4M1 : continuous start signal.
- S1D-C8M3 : Comprises of 8 Relays and each relay can be programmed for maximum of 8 switchings in a cycle.
- Application: Bag filters, Dust collectors, Water treatment plants etc.

Specifications

Function	ST4-M1	ST-15M2
Rated supply voltage	240V AC	85Vto 270V AC
Operating voltage range	21.6V DC to 26.4V DC	85Vto 270V AC
Differential pressure signal (DP1, DP2)	N.A	85Vto 270V AC
Rated frequency	50Hz ±5%	
Power consumption	AC approx.20VA / 4W,	AC approx.10VA / 2W
No. of output	4 – Rly1 to Rly4,	15 – OP1 to OP15
Control relay output	NO relay contacts rated for 5A @ 250V AC / 28V DC resistive load	Triac outputs rated for 500mA@250V AC resistive load
Start signal (S1, S2)	Potential free closure signal – continuous	Potential free closure signal – continuous
Differential pressure signal (DP1, DP2)	N.A	Potential free closure signal - continuous
Time range	On timec 0.1sec to 1hrc00min Off timec 0.1sec to 1hrc00min	On timec 0.01secs to 99hrs 59min. Off timec 0.01secs to 99hrs 59min
Range selection	Range Minimum Maximum S/S nn 0.1s 1secc M/S nn 0.1m 1min H/M n 0.1hr 1hr	Range Minimum Maximum S/S nn 00s c 01ms 59s c 99ms M/S nn 00m c 01s 59m c 59s H/M n 00h c 01m 99h c 59m
Setting accuracy	±10% max w.r.t full scale ±100msec	±0.2% max w.r.t setting ± 20msec
Repeat accuracy	±1% max. ±100msec	±0.3% max w.r.t ±20msec
Recovery time	1sec minimum	2sec minimum
Variation due to voltage change	±2% max ±100msec	±1% max ±50msec
Variation due to temp. change	±5% max ±100msec	±2% max ±50msec
Variation due to frequency change	±2% max ±100msec	±1% max ±50msec
Ambient temperature	Operation: -10^{0}C to +55^{0}C, Storagec -25^{0}C to 80^{0}C	
Humidity	Max. 85% RH @ 400C	
Service life (under no load)	10^6 operation minimum	N.A
Electrical life (under full load)	10^5 operation minimum	
Rated frequency of operation	1800 ±5% operations per hour maximum	
Insulation resistance	>100Mohms @ 500V DC	
Di-electrical strength	2.5KV AC, 50Hz for 1minute. (Between current carrying and non-current carrying parts). 1.5KV AC, 50Hz for 1minute. (Between contacts and control circuit). 750VAC, 50Hz for 1minute. (Between non-continuous contacts of the relay).	N.A
Electrical connection	Screw type terminals with self lifting clamps	
Dimension (over-all)	110 x 86 x 68mm (L x W x D)	200 x 130 x 45mm (W x H x D)

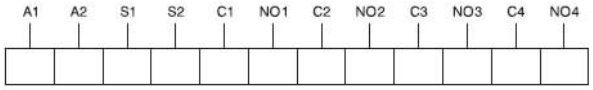
Connections

ST15-M2 Sequential Timer



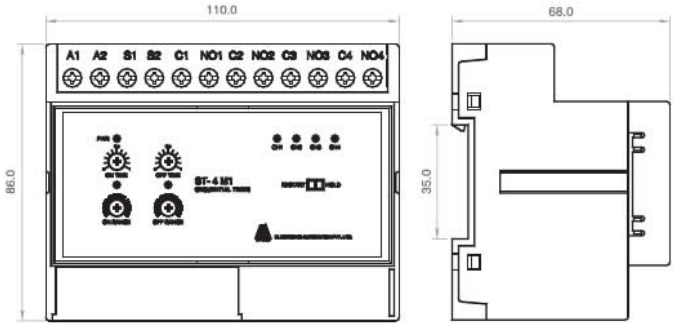
A1 & A2 : Source
S1 & S2 : Start signal - continuous (Potential free)
DP1 & DP2 : Differential pressure Signal - continuous (Potential free) for ST15-M2
OP1 to OP15 : Control Output for ST15-M2
⊛ : Common input terminal for all triacs (for ST15-M2)
C1, NO1
C2, NO2
C3, NO3
C4, NO4
: Relay terminals (for ST4-M1)

ST4-M1 Sequential Timer



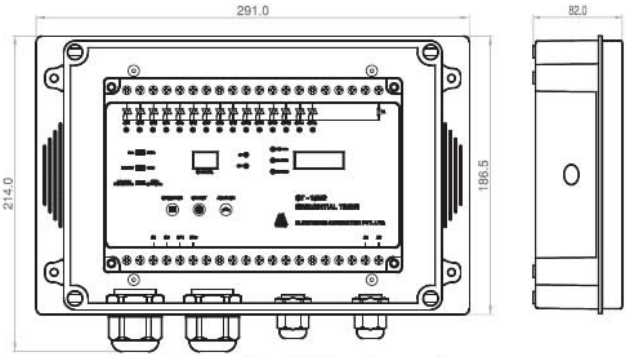
Dimensions

ST4-M1



Note: Please refer page no.18 for ST15-M2 dimension

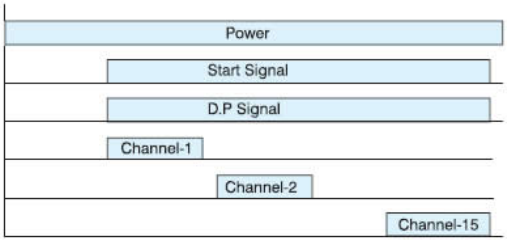
ST15-M2 (IP)



Note: All Dimensions are in mm.

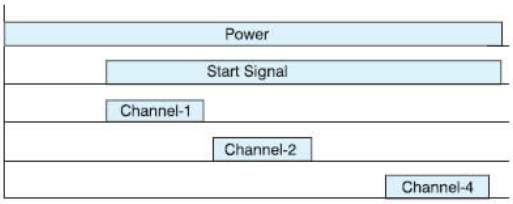
Timing Diagram

ST15-M2



After last channel the cycle repeats till the start / D.P signal is present.

ST4-M1



After last channel the cycle will come back to first channel.

Hints On Correct Use

- **Output from triac is possible only for AC supply.**

Caution

- Do not apply any voltage across S1 & S2, DP1 & DP2.
- Do not shift HOLD / RESTART slide switch when the timer is in operation.
- Application of voltage other than the specified one, will permanently damage the timer.
- Use 2.5mm2 U-type lugs with sleeve.