



The ARP Series is used in systems where equal run time for two motors is desirable. The selector switch allows selection of alternation of either load for continuous operation. LED's indicate the status of the output relay. This versatile series may be front panel mounted (BZ1 accessory required) or 35 mm DIN rail mounted with an accessory socket.

For more information see:
Appendix B, page 167, Figure 31 for dimensional drawing.
Appendix C, 170, Figure 29 for connection diagram.

Operation

Alternating: When the rotary switch is in the "alternate" position, alternating operation of Load A and Load B occurs upon the opening of the control switch S1. To terminate alternating operation and cause only the selected load to operate, rotate the switch to position "A" to lock Load A or position "B" to lock Load B. The LEDs indicate the status of the internal relay and which load is selected to operate.

Note: Input voltage must be applied at all times for proper alternation. The use of a solid-state control switch for S1 may not initiate alternation correctly. S1 voltage must be from the same supply as the unit's input voltage (see connection diagrams). Loss of input voltage resets the unit; Load A becomes the lead load for the next operation.

Duplexing (Cross Wired): Duplexing models operate the same as alternating relays and when both the Control (S1) and Lag Load (S2) Switches are closed, Load A and Load B energize simultaneously.

The DPDT 8-pin, cross-wired option, allows extra system load capacity through simultaneous operation of both motors when needed. Relay contacts are not isolated.

Features:

- Provides equal run time for two motors
- Alternating or electrically locked operation
- Low profile selection switch
- 10A output contacts
- LED status indication
- Industry standard base connection

Approvals:   

Auxiliary Products:

- **Hold-down clips (sold in pairs):**
P/N: PSC8 (NDS-8)
P/N: PSC11 (NDS-11)
- **Panel mount kit:** P/N: BZ1
- **11-pin socket:** P/N: NDS-11
- **8-pin socket:** P/N: NDS-8
- **DIN rail:** P/N: C103PM

Available Models:

| | |
|--------|--------|
| ARP23S | ARP43S |
| ARP41 | ARP61S |
| ARP41S | ARP63 |
| ARP42S | ARP63S |
| ARP43 | |

If desired part number is not listed, please call us to see if it is technically possible to build.

Order Table:

| | | | |
|------------|--------------|---------------------------------|-------------------------|
| <u>ARP</u> | <u>X</u> | <u>X</u> | <u>X</u> |
| | Input | Output Form | Switch Operation |
| | -2 - 24VAC | -1 - SPDT, 8-pin | -Blank - No Switch |
| | -4 - 120VAC | -2 - DPDT, 11-pin | -S - Rotary Switch |
| | -6 - 230VAC | -3 - DPDT, 8-pin cross wired | |

Specifications

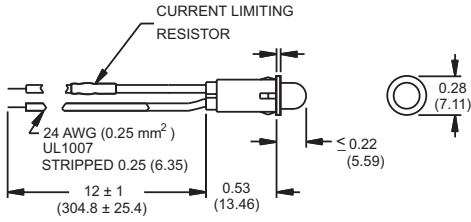
| | |
|-------------------|---|
| Input | |
| Voltage | 24, 120, or 230VAC |
| Tolerance | 24VAC -15% - 20% |
| | 120 & 230VAC -20% - 10% |
| AC Line Frequency | 50/60Hz |
| Output | |
| Type | Electromechanical relay |
| Form | SPDT, DPDT, or cross wired DPDT |
| Rating | 10A resistive @ 120/240VAC & 28 VDC; 1/3 hp @ 120/240VAC |
| Maximum Voltage | 250VAC |
| Life | Mechanical - 1 x 10 ⁷ ; Electrical - 1 x 10 ⁶ |

| | |
|---------------------------------|---|
| Protection | |
| Isolation Voltage | ≥ 1500V RMS input to output |
| Mechanical | |
| Mounting | Plug-in socket |
| Dimensions | 3.2 x 2.39 x 1.78 in. (81.3 x 60.7 x 45.2 mm) |
| Termination | Octal 8-pin or magnal 11-pin |
| Environmental | |
| Operating / Storage Temperature | -20° to 60°C / -30° to 85°C |
| Weight | ≅ 5.6 oz (159 g) |

NOTE: Unit does not have debounce time delay.

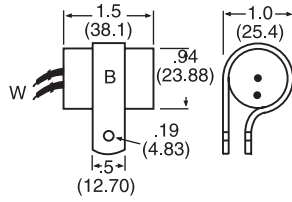
Appendix B - Dimensional Drawings

FIGURE 24



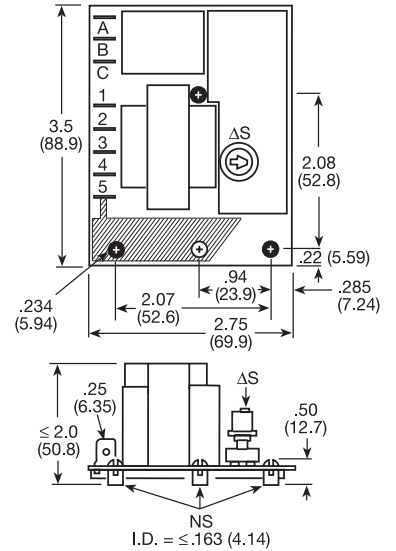
LPM

FIGURE 25



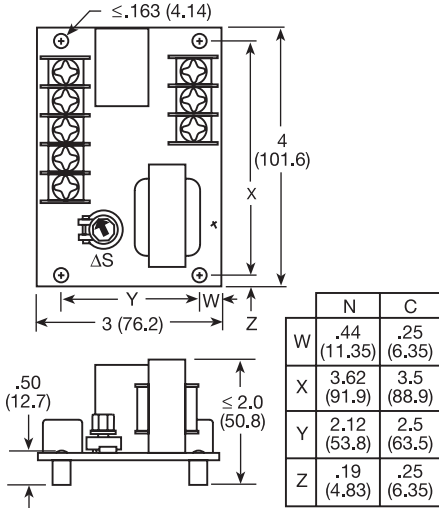
MSM

FIGURE 26



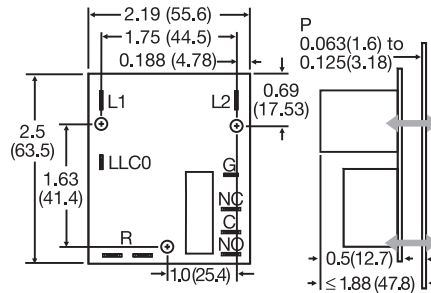
LLC1

FIGURE 27



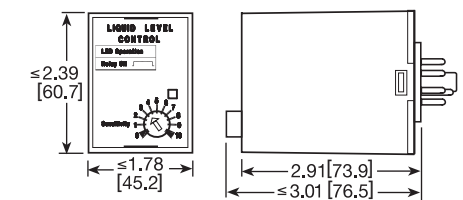
LLC2

FIGURE 28



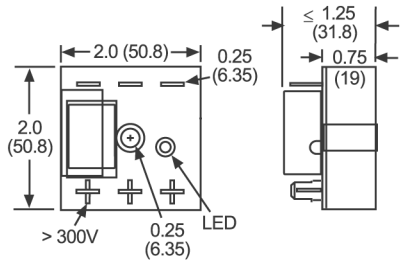
LLC8

FIGURE 29



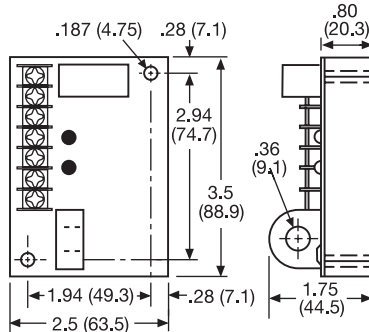
LLC5

FIGURE 30



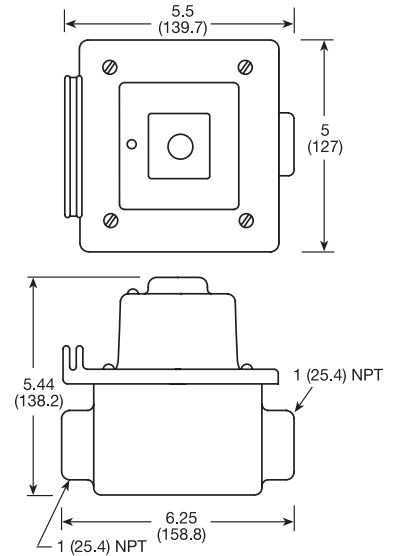
TVM; TVW

FIGURE 32



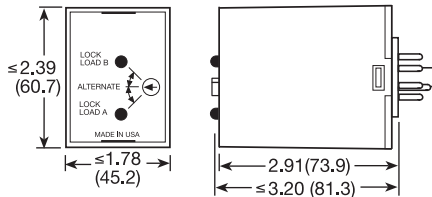
FB; SCR

FIGURE 33



PCR

FIGURE 31

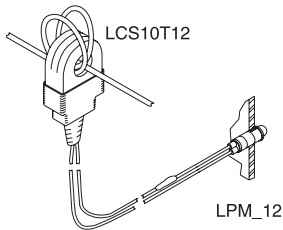


ARP

inches (millimeters)

Appendix C - Connection Diagrams

FIGURE 22 - LCS10T12



Wire Length: 500 ft. (152.4m) max. (Customer Supplied)
CAUTION: The LCS10T12 must be connected to the LPM12 or LPMG12 before current flows to prevent damage or shock hazard. Monitored wires must be properly insulated.

FIGURE 23 - LLC1 Series

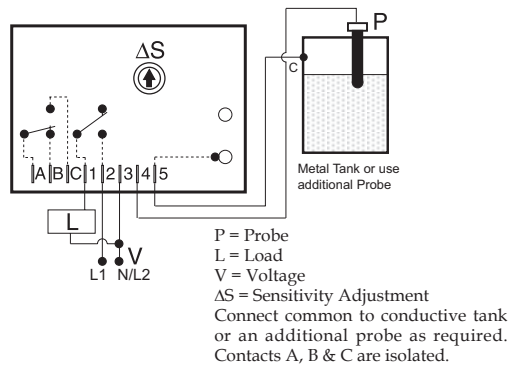


FIGURE 24 - LLC4 Series

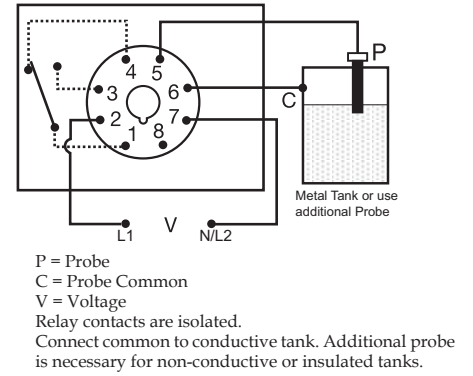


FIGURE 25 - LLC8 Series

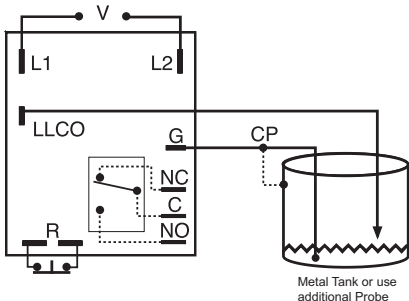


FIGURE 26 - LLC6 Series

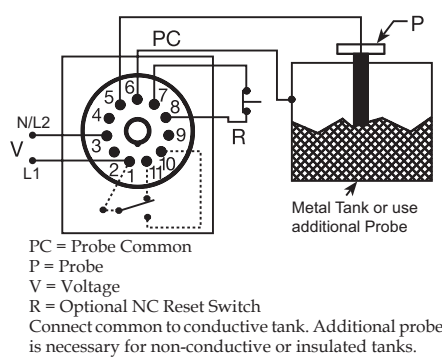


FIGURE 27 - LLC2 Series

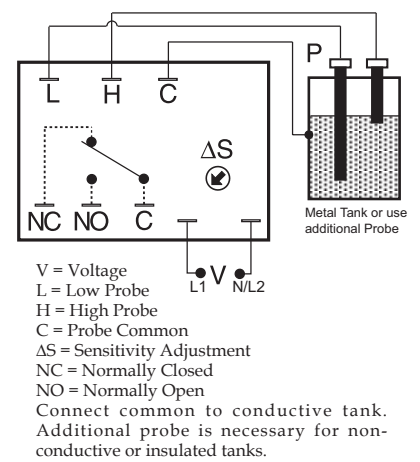


FIGURE 28 - LLC5 Series

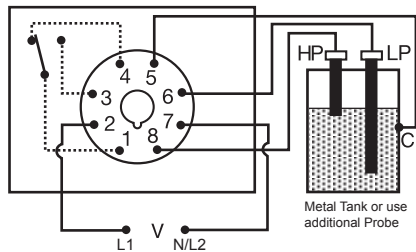
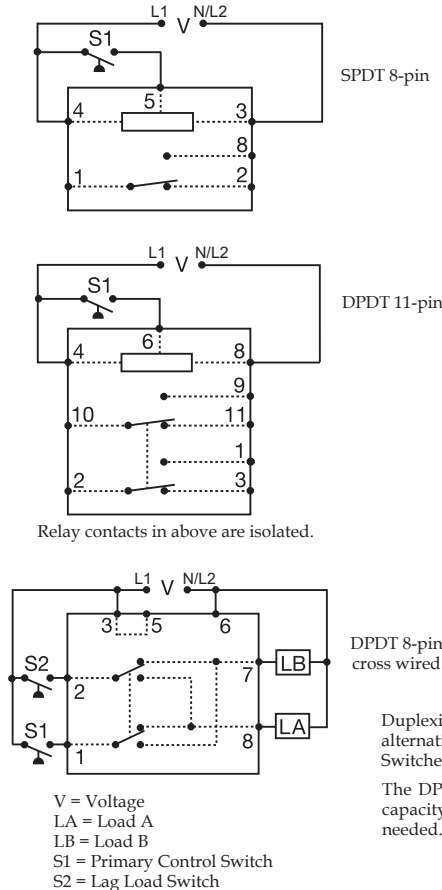


FIGURE 29 - ARP Series



Duplexing (Cross Wired): Duplexing models operate the same as alternating relays and when both the Control (S1) and Lag Load (S2) Switches are closed, Load A and Load B energize simultaneously.

The DPDT 8-pin, cross wired option, allows extra system load capacity through simultaneous operation of both motors when needed. Relay contacts are not isolated.