

RA-3100 Series Remote Power Controller, Rated up to 60 Amps, 115/208 VAC

Product Facts

- 3PST NO
- **■** Gasket sealed



Performance Data

Electrical Characteristics

Contact Arrangement — 3PST NO **Rated Operating Voltage -**

115/208 VAC, 400-610 Hz, 3 phase

Resistive Rating — 50 Amp

Motor Rating — 30 Amp

Rupture Rating — 1000 Amp

Closing Time, Max., Override at

28 Vdc — 35 msec

Opening Time, Max., Override at **28 Vdc** — 25 msec

Contact Bounce, Max. — 3 msec

Coil Characteristics

Duty Cycle — Continuous, economizing

Operating Voltage, Max. — 32 Vdc Operating Voltage @ 85°C, Min. — 18 Vdc

Trip Time @ 60 Amp Current

+10% - 2.0 to 3.0 sec

Trip Time @ 75 Amp Current +10% - 1.0 to 1.9 sec

Trip Time @ 95 Amp Current +10% - .2 to .9 sec

Trip Time @ 200+ Amp Current +10% — 0.01 to 0.1 sec

General Characteristics

Temperature Range —

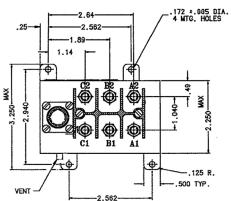
-55°C to +85°C

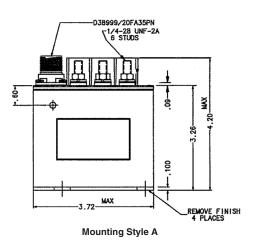
Operating Cycles (Life)

Mechanical, Min. — 100,000 cycles

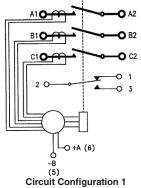
Altitude — 50,000 ft

Weight, Max. — 1.55 lbs





Circuit Configurations (Consult factory for other available circuit configurations)



For factory-direct application assistance, phone 419-521-9500 or fax 419-526-2749.

HARTMAN	Construction	Mounting	Coil	Circuit	TE
Part Number	Type	Style	Type	Config.	Part Number
RA-3100H	Gasket/Vented	Α	Continuous, Economizing	1	1616539-3

Catalog 5-1773450-5



RA-3100 Series Remote Power Controller, Rated up to 70 Amps, 115/208 VAC

Product Facts

- 3PST NO
- **■** Gasket sealed



Performance Data

Electrical Characteristics

Rated Operating Voltage —

115/208 VAC, 400-610 Hz, 3 phase

Resistive Rating — 70 Amp **Motor Rating** — 70 Amp

Rupture Rating — 1,000 Amp

Coil Characteristics

Duty Cycle — Continuous, economizing

Operating Voltage, Max. — 32 Vdc Operating Voltage @ 85°C, Min. — 18 Vdc

Trip Time @ 70 Amp Current

+10% — 3.0 to 5.0 sec

Trip Time @ 87 Amp Current +10% — 2.0 to 2.9sec

Trip Time @ 111 Amp Current

+10% — 1.0 to 1.8 sec Trip Time @ 200 Amp Current

Trip Time @ 200 Amp Current +10% — 0.25 to 0.5 sec

General Characteristics

Operating Temperature Range — -55°C to $+85^{\circ}\text{C}$

Altitude — 50,000 ft max.

Weight, Max. — 1.55 lb

Sinusoidal Vibration —

.038 DA from 10 to 50 Hz

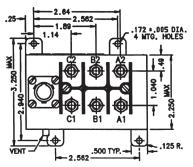
 $10g\ \text{from}\ 55\ \text{to}\ 2000\ \text{Hz}$

Shock, Max. — 9 G max for 10-12 ms

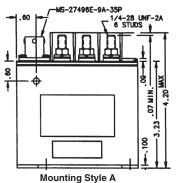
Load, Min. — 50,000 cycles

Operating Cycles (Life)

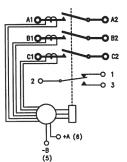
Mechanical, Min. — 100,000 cycles



OTE: FOR PROPER OPERATION, PIN A REQUIRES 18 TO 28 VDC



Circuit Configurations (Consult factory for other available circuit configurations)



Circuit Configuration 1

For factory-direct application assistance, phone 419-521-9500 or fax 419-526-2749.

HARTMAN	Construction	Mounting	Coil	Circuit	TE
Part Number	Type	Style	Type	Config.	Part Number
RA-3100F	Gasket/Vented	Α	Continuous, Economizing	1	1616133-2



RA-3100 Series Remote Power Controller, Rated up to 100 Amps, 115/208 VAC

Product Facts

- 3PST NO
- **■** Gasket sealed
- Auxiliary contacts available
- Meets many requirements of MIL-PRF-6106



Performance Data

Electrical Characteristics

Contact Arrangement — 3PST NO

Rated Operating Voltage -

115/208 VAC, 400-610 Hz, 3 phase

Resistive Rating — 100 Amp

Motor Rating — 100 Amp

Rupture Rating — 1,000 Amp

Closing Time, Max., at 28 Vdc — 35 msec

Opening Time, Max., at 28 Vdc — 25 msec

Contact Bounce, Max. — 3 msec

Coil Characteristics

Duty Cycle — Continuous, economizing

Operating Voltage, Max. — 32 Vdc Operating Voltage @ 85°C, Min. —

Coil Current, Inrush Max.@ 25°C — 6.0 Amps

Coil Current, Hold Max.@ 25°C — 0.5 Amps

Trip Time @ 28 Amp Current +10% —

RA-3100M - 1.0 to 1.50 sec

Trip Time @ 151 Amp Current +10% —RA-3100D - 3.0 to 5.0 Sec.

Trip Time @ 185 Amp Current +10% —RA-3100D - 2 to 2.9 Sec.

Trip Time @ 237 Amp Current +10% —RA-3100D - 1 to 2.5 Sec.

General Characteristics

Temperature Range — -55°C to +85°C

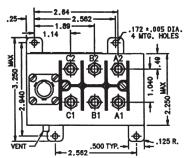
Operating Cycles (Life) at Rated Load, Min. — 50,000 cycles

Operating Cycles (Life)

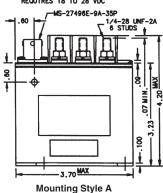
Mechanical, Min. — 100,000 cycles

Altitude — 50,000 ft

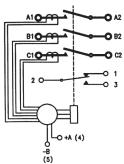
Weight, Max. — 1.55 lbs



OTE: FOR PROPER OPERATION, PIN A



Circuit Configurations (Consult factory for other available circuit configurations)



Circuit Configuration 1

HARTMAN Construction Mounting Coil Circuit ΤE Part Number Config Part Number Type Style Type Continuous, RA-3100D Gasket/Vented Α 1616133-1 Economizing Continuous, Economizing RA-3100M Gasket/Vented 1616133-5 Α

For factory-direct application assistance, phone 419-521-9500 or fax 419-526-2749.

to change.



RA-3100 Series Remote Power Controller, Rated up to 110 Amps, 115/208 VAC

Product Facts

- 3PST NO
- **■** Gasket sealed
- Auxiliary contacts available
- Meets many requirements of MIL-PRF-6106



Performance Data

Electrical Characteristics

Contact Arrangement — 3PST NO

Rated Operating Voltage -115/208 VAC, 400-610 Hz, 3 phase

Resistive Rating -

RA-3100J-1 - 110 Amp RA-3100L - 50 Amp

Motor Rating —

RA-3100J01 - 110 Amp RA-3100L - 50 Amp

Rupture Rating -

RA-3100J-1 - 1,100 Amp RA-3100L 500 Amp

Shock for 10-12 msec — 50 G Closing Time, Max., Override at

28 Vdc — 35 msec

Opening Time, Max., Override at

28 Vdc — 25 msec Contact Bounce, Max. — 3 msec

Coil Characteristics

Duty Cycle — Continuous, economizing

Operating Voltage, Max. — 32 Vdc Operating Voltage @ 85°C, Min. —

Coil Current, Inrush Max.@ 25°C -

6.0 Amps Coil Current, Hold Max.@ 25°C -

Trip Time @ 165 Amp Current **+10%** — 8.0 to 10.0 sec

Trip Time @ 330 Amp Current +10%

RA-3100J-1 - 1.2 to 2.0 sec

Trip Time @ 550 Amp Current +10%

RA-3100J-1 -0.34 to 0.65 sec

Trip Time @ 1100 Amp Current +10%

RA-3100J-1 -0.07 to 0.20 sec

For factory-direct application assistance, phone 419-521-9500 or fax 419-526-2749.

Trip Time @ 60 Amp Current

RA-3100L - 8.0 to 10.0 sec

Trip Time @ 150 Amp Current +10%

RA-3100L - 4.0 to 6.0 sec

Trip Time @ 300 Amp Current +10%

RA-3100L - 2.0 to 3.0 sec

Trip Time @ 500 Amp Current

+10% -

RA-3100L - 0.07 to 0.20 sec

General Characteristics

Temperature Range —

-55°C to +85°C

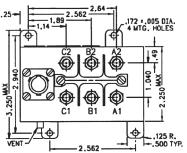
Operating Cycles (Life) at Rated Load, Min. — 50,000 cycles

Operating Cycles (Life)

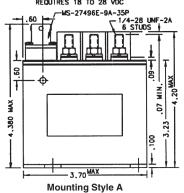
Mechanical, Min. — 100,000 cycles

Altitude — 60,000 ft

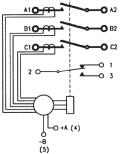
Weight, Max. — 1.55 lbs



FOR PROPER OPERATION, PIN A REQUIRES 18 TO 28 VDC



Circuit Configurations (Consult factory for other available circuit configurations)



Circuit Configuration 1

HARTMAN Part Number	Construction Type	Mounting Style	Coil Type	Circuit Config.	TE Part Number
RA-3100J-1	Gasket/Vented	Α	Continuous, Economizing	1	1616133-3
RA-3100L	Gasket/Vented	A	Continuous, Economizing	1	1616133-4