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With the principle of "Quality Parts,Customers Priority,Honest Operation,and Considerate Service",our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip,ALPS,ROHM,Xilinx,Pulse,ON,Everlight and Freescale. Main products comprise IC,Modules,Potentiometer,IC Socket,Relay,Connector.Our parts cover such applications as commercial,industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



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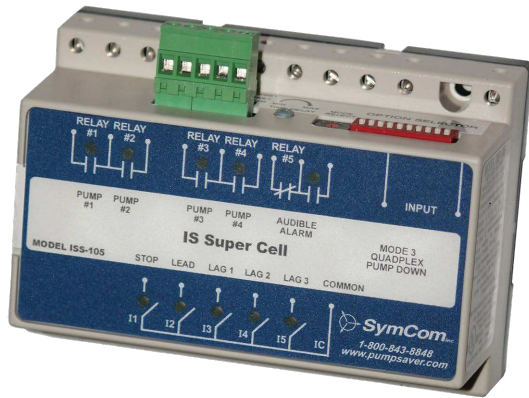
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ISS-105 SERIES

Five-Channel Intrinsically Safe Switch



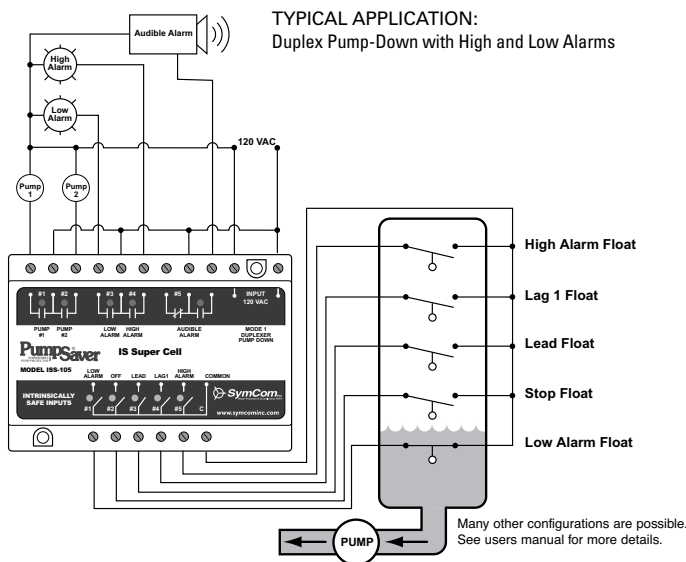
Description

The ISS-105 is a “smart” five-channel intrinsically safe relay and pump controller. The ISS-105 can be configured for pump-up or pump-down applications or as a five-channel relay covering a wide variety of applications.

The ISS-105 has a long list of features that are needed for multiple pump applications and can indicate low, high and out-of-sequence alarms. If an out-of-sequence alarm occurs, the skipped pump(s) will be started as intended.

The Model ISS-105 can be set-up to do non-alternating control, alternating control and alternating control with one non-alternating pump. The non-alternating pump is intended for use with an emergency or jockey pump. The ISS-105 can start an emergency pump once every 50 cycles to keep it working freely. Using the built-in DIP switches, individual pumps can be disabled when taken out of service for repair or maintenance.

Wiring Diagram



Features & Benefits

- 5 intrinsically-safe input channels meeting UL913 Sixth Edition
- 4 normally open output relays and 1 SPDT output relay
- Field selectable pump control options
- Monitors float sequencing and sends signal to alarm if out-of-sequence condition occurs
- High and/or low alarm options depending on the number of pumps and settings
- Output contacts for audible alarm
- Meets IEC EMC standards for Electrical Fast Transients (EFT), Electrostatic Discharge (ESD) and Radio Frequency Immunity (RFI)
- DIN rail or surface mountable allows flexibility in panel installation
- User-selectable alternator/non-alternator option
- Non-alternating pump option for emergency or jockey applications
- Pump disable switches make it easy to disable individual pumps when they are out for service or repair
- Adjustable lag pump delay for all pumping modes
- Adjustable delay-on-make/break timer in five-channel relay mode
- Finger-safe terminals meet IEC 61000 safety requirements

Ordering Information

MODEL	LINE VOLTAGE	DESCRIPTION
ISS-105	120VAC	Intrinsically-Safe & Pump Controller
ISS-105-ISO	120VAC	Intrinsically-Safe Only
ISS-105-ISO-3	120VAC	3-Channel Intrinsically-Safe Only
ISS-105-ISO-4	120VAC	4-Channel Intrinsically-Safe Only
ISS-105-ISO-F	120VAC	ISO with Fast Trip Relays

ISS-105

Specifications

Input Characteristics

Supply Voltage 120VAC
Frequency 50*/60Hz

Functional Characteristics

Probe Sense Voltage 5vdc continuous

Output Characteristics

Relay Output Rating
Pilot Duty 480VA @ 240VAC, B300
General Purpose 7A @ 240VAC
Relay Contact Life (Electrical) 100,000 cycles min. @ rated load
Relay Contact Life (Mechanical) 10,000,000 cycles

General Characteristics

Temperature Range -40° to 55°C (-40° to 131°F)
Maximum Input Power 5 W
Wire range 12 to 20 AWG
Recommended Terminal Torque 3.5 to 4.5 in.-lbs. (max. 4.5 in.-lbs.)

Provides Intrinsically-Safe Circuits in the following locations:

Division 1 and 2
Class I, Groups A,B,C,D;
Class II, Groups E,F,G;
and Class III

Entity Parameters

$V_{oc} = 16.8V$ $\frac{P_o = V_{oc} * I_{sc}}{4}$
 $I_{sc} = 1.2mA$
 $L_a = 100mH$
 $C_a = 0.39\mu F$

Standards Passed

Electrostatic Discharge (ESD) IEC 61000-4-2, Level 3, 6kV contact, 8kV air.
Radio Frequency Immunity (RFI) IEC 61000-4-3, Level 3, 10V/m
Fast Transients IEC 61000-4-4, Level 3, 4kV input power
2kV inputs/outputs

Safety Marks

UL

UL913 Sixth Edition (File #E233355)

Dimensions

H 94.06 mm (3.703"); **W** 127.64 mm (5.025");
D 59.69 mm (2.350")

Weight

1.2 lbs. (19.2 oz., 544.31 g)

Mounting Method

35 mm DIN rail or Surface Mount
(#6 or #8 screws)

*Note: 50Hz will increase all delay timers by 20%.