

FEATURES

- Transformer isolation
- Selectable voltage outputs
- Thermal overload protected
- Fused outputs
- SnapTrack mounted

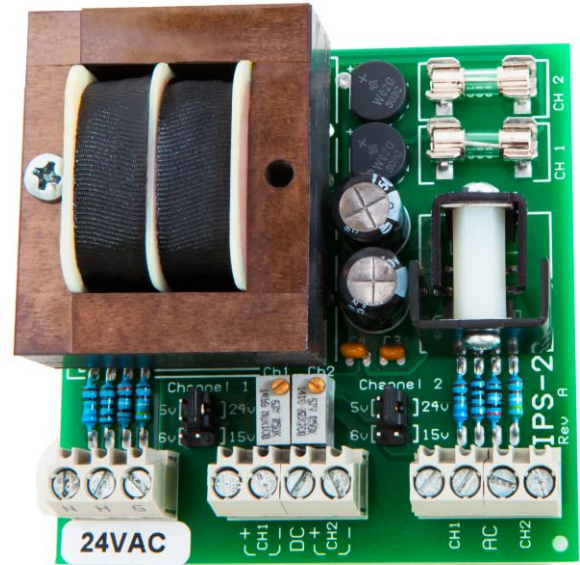
APPLICATIONS

- AC power isolation
- Isolated DC power supply
- 2, 3 & 4 wire transmitter supply
- ± DC power supply

DESCRIPTION & OPERATION

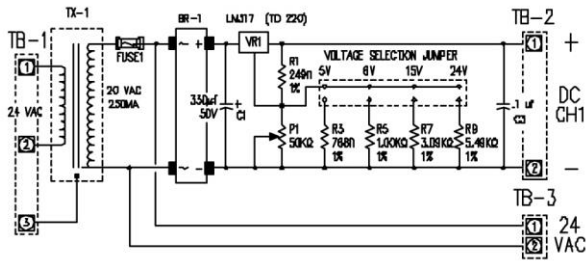
The IPS-2, or IPS-4 provides the isolation needed for position reference 4-20mA transmitters. It can also be used for AC isolation or ± voltage power supply. The IPS-2 uses a 24VAC/20VAC transformer. The 250mA outputs are sufficient for most isolation and transmitter needs. The IPS comes mounted in 3" wide SnapTrack.

IPS-2/24



SPECIFICATIONS

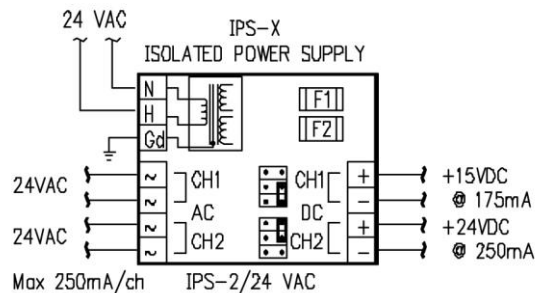
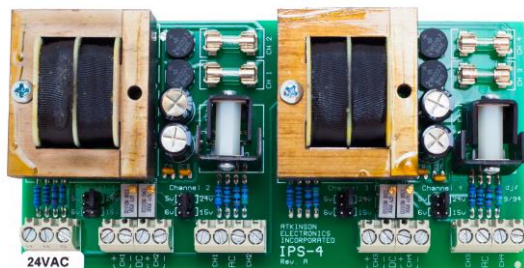
SIZE:	IPS-2	3"W x 3"L x 1.5"H
	IPS-4	3"W x 6"L x 1.5"H
MOUNTING:	IPS-2	3" RDI SnapTrack (supplied)
	IPS-4	6" RDI SnapTrack (supplied)
POWER:		24VAC ± 10%, 50/60Hz
	IPS-2	20VA @ full load
	IPS-4	40VA @ full load
		120VAC is available also
FUSE REQ:		2AG .25 Amp (1 per channel)
		Littlefuse #229.250
OUTPUT SIGNALS:		Jumper selectable ranges
		5VDC–100mA
		6VDC–100mA
		15VDC–175mA
		24VDC–250mA
REGULATION:		± 15m VDC
AMBIENT TEMP:		0-50°C



IPS-2/4 SINGLE CHANNEL SCHEMATIC

Power is applied to the isolation transformer's primary. The secondary voltage is fused and provides a 20VAC at 250Ma AC output. The fused secondary voltage is then rectified and filtered. Voltage regulator (LM317T) is biased by resistors R1 and jumpers selected R3, R5, R7, or R9 for output voltages 5, 6, 15, or 24VDC respectively. The trim potentiometer (P1) allows for a fine output voltage adjustment (clockwise to increase). The LM317T employs internal current-limiting and thermal-shutdown protection to protect from short circuits.

IPS-4/24



OUTPUT CODE OPTIONS

IPS/XX/XXX



OUTPUT WATTAGE CODE OPTIONS

- 2 Two isolated outputs, AC or DC
- 2C Two custom isolated outputs
- One AC output and one AC or DC output.
- 2AC Two isolated AC outputs only
- 4 Four isolated outputs, AC or DC
- 4C Four custom isolated outputs,
- Two AC outputs and two AC or DC outputs.
- 4AC Four isolated AC outputs only

PRIMARY AC VOLTAGE OPTION CODES

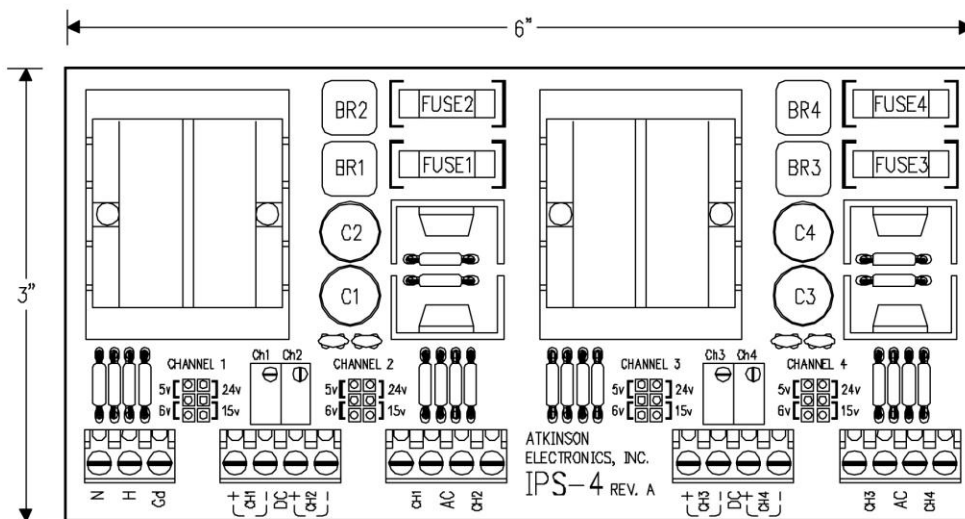
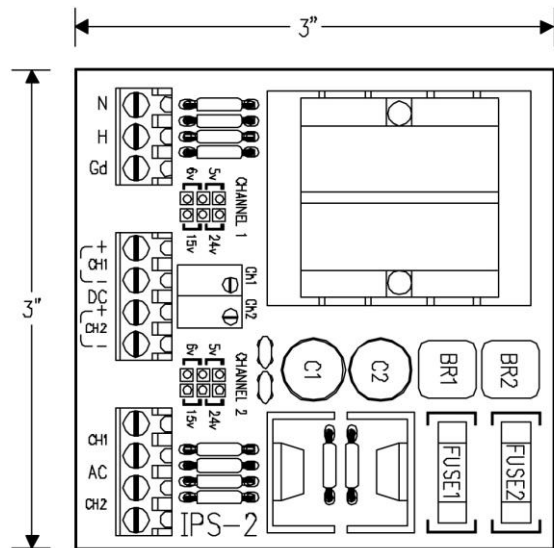
- 120 110-120VAC Primary Voltage
- 24 24VAC Primary Voltage

ORDERING CODE EXAMPLES

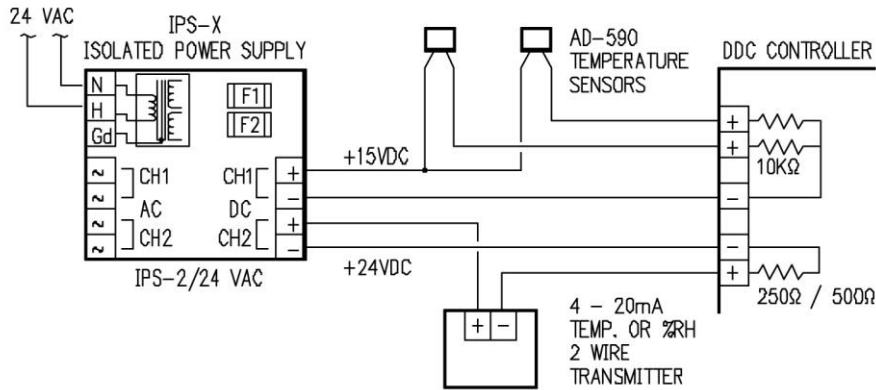
- IPS-2/120 110-120VAC Primary voltage with two selectable DC outputs
- IPS-4/24 24VAC Primary voltage with four selectable DC outputs
- IPS-2C/24 24VAC Primary voltage with one AC output and one selectable DC output
- IPS-2AC/120 110-120VAC Primary voltage with two 24VAC outputs only

PHYSICAL CONFIGURATION IPS-4

PHYSICAL CONFIGURATION

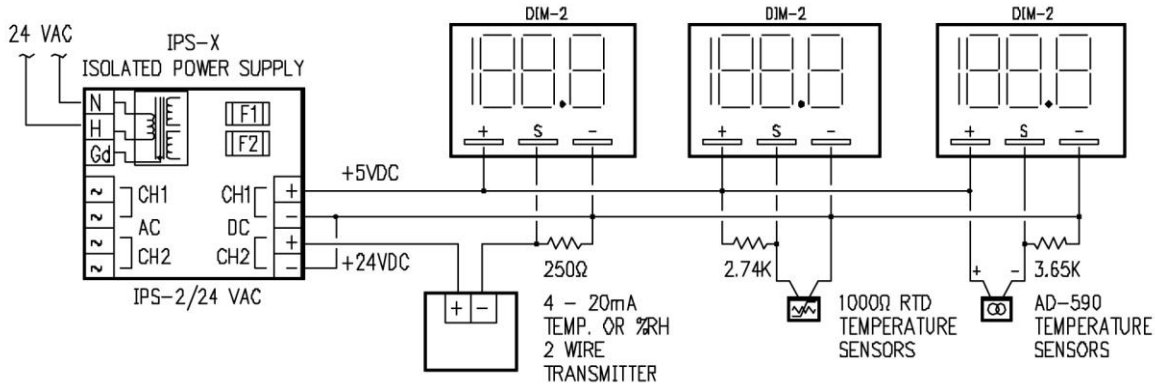


APPLICATION 1 – ISOLATED POWER FOR NARROW RANGE SENSORS



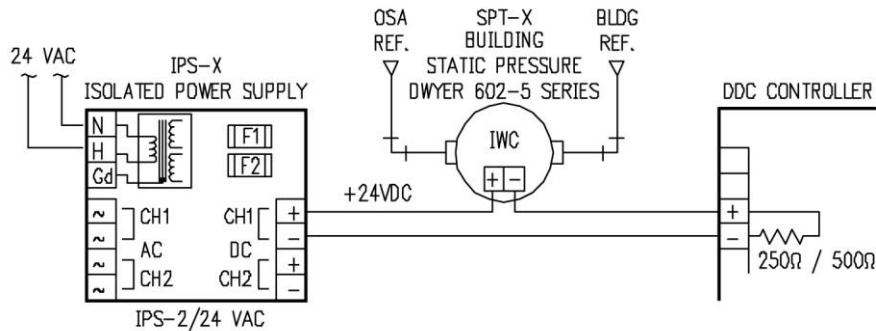
The IPS-2 isolated DC power supply is used to maintain the input isolation from the 24VAC line and provide 4 selectable voltage ranges to power various temperature sensors and 4-20mA transmitters.

APPLICATION 2 – ISOLATED + 5V POWER SUPPLY FOR DIM-2 INDICATORS



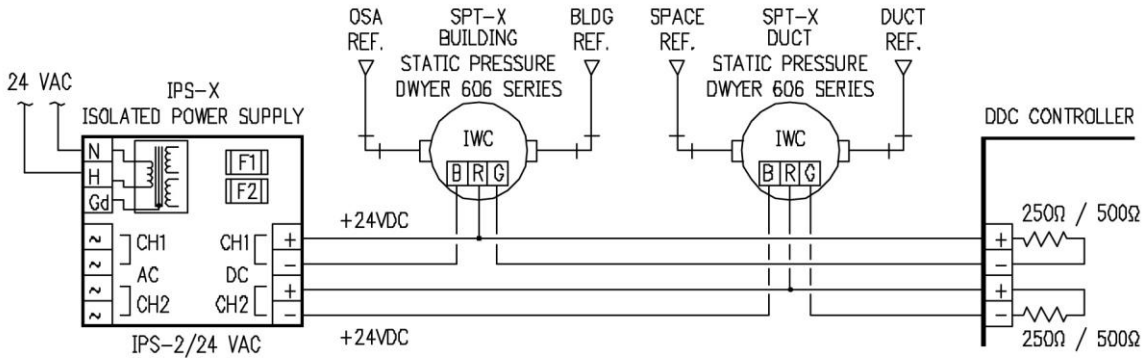
It is often required to provide multiple panel indication meters for various signal ranges. The IPS-2 has 4 selectable voltage ranges and a fine adjust trimmer per output channel to power multiple DIM-2 indicators and other DC devices.

APPLICATION 3 – POWERING 2 WIRE DWYER PRESSURE TRANSMITTERS



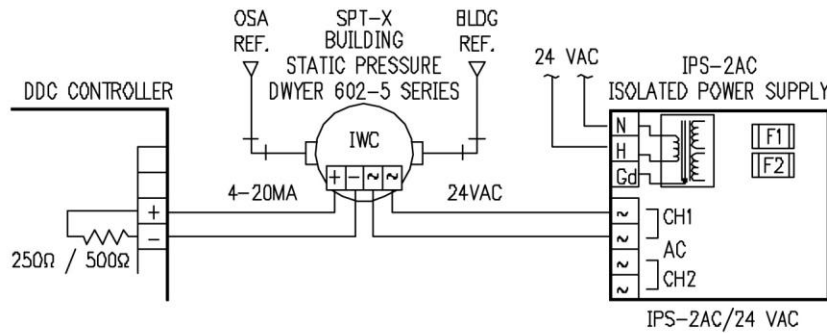
Often a 24VDC supply is required to power a number of 4-20mA transmitters such as the Dwyer 600 series. The IPS-2 eliminates the need for a separate 24VAC transformer and can provide 24VDC @ 250mA to power up to 8 current loop transmitters simultaneously.

APPLICATION 4 – POWERING 3 WIRE DWYER PRESSURE TRANSMITTERS



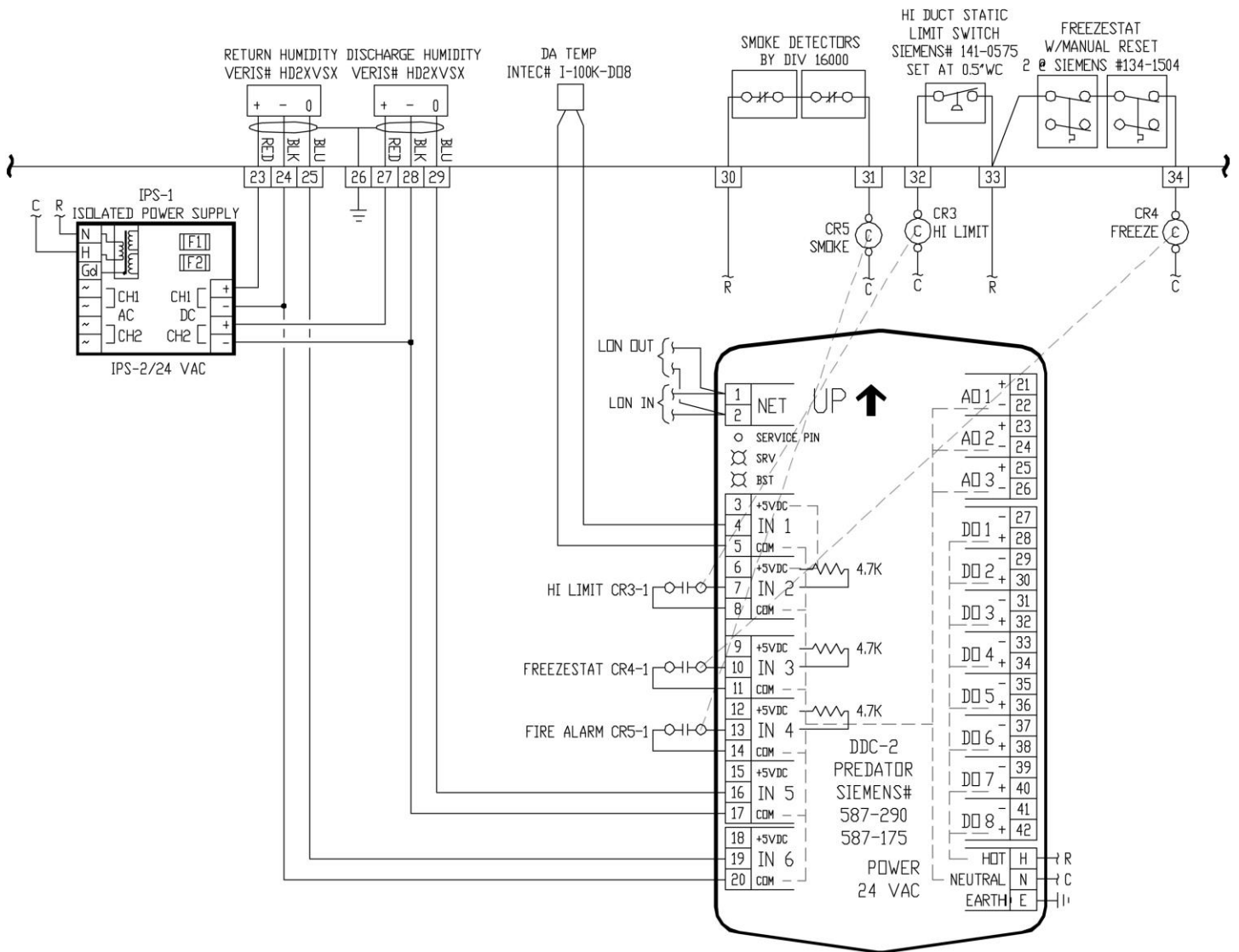
When using Dwyer’s 606 3 wire 4-20mA transmitter, a separate 24VDC supply is needed for each transmitter. This is because the 606 is a positive referenced device, with +24VDC supply connecting to controller signal input and 606 red wire. The 24VDC supply common connects to 606 black wire, and the 606 signal common (green wire) connects to input common with a 250V load resistor connected between signal input and signal common.

APPLICATION 5 – POWERING 4 WIRE 24VAC DWYER PRESSURE TRANSMITTER



Often when powering a Dwyer 4 wire pressure transmitter, a 24VAC isolated AC supply is required to avoid ground loops with different pieces of equipment. The IPS-2AC provides two isolated 24VAC outputs rated for loads up to 250mA AC

APPLICATION 6 – POWERING 3 WIRE VERIS HD2XV SX HUMIDITY TRANSMITTERS



When using Veris humidity 3 wire 4-20mA transmitters & the Siemens Predator controller, a separate 24VDC supply is needed for each transmitter. This is because the input commons on the controller are not common to each other and thus one signal can effect to other.