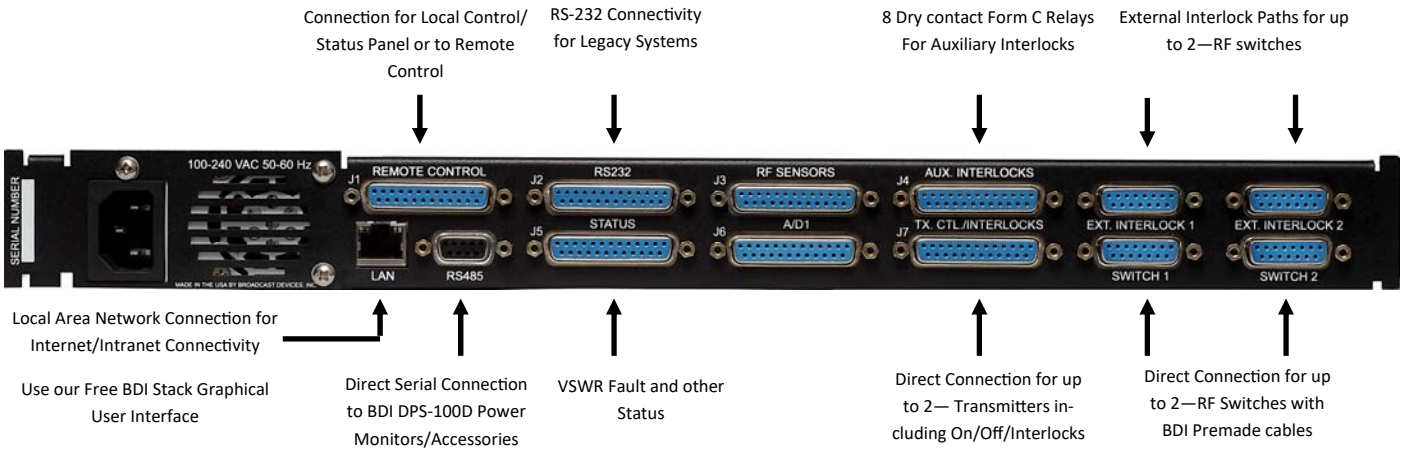
SWP-200 RF Switch Controller

Single and Dual Motorized RF Switch Controllers with SNMP

The SWP-200 is a stand alone 1RU RF switch controller which can control most brands of motorized RF switches. In addition the SWP-200 manages transmitter interlocks and simplifies the connection of interlock paths. When installed as a system together with a BDI DPS-100D power meter, The SWP-200 provides complete *Hot Switch protection* by preventing the movement of a switch if RF is present. The SWP-200 also doubles as a rack mounted RF power display for up to 2 - DPS-100D Sensors. Acts as an *SNMPv2* agent for quick interface to SNMP based remote control systems and software.

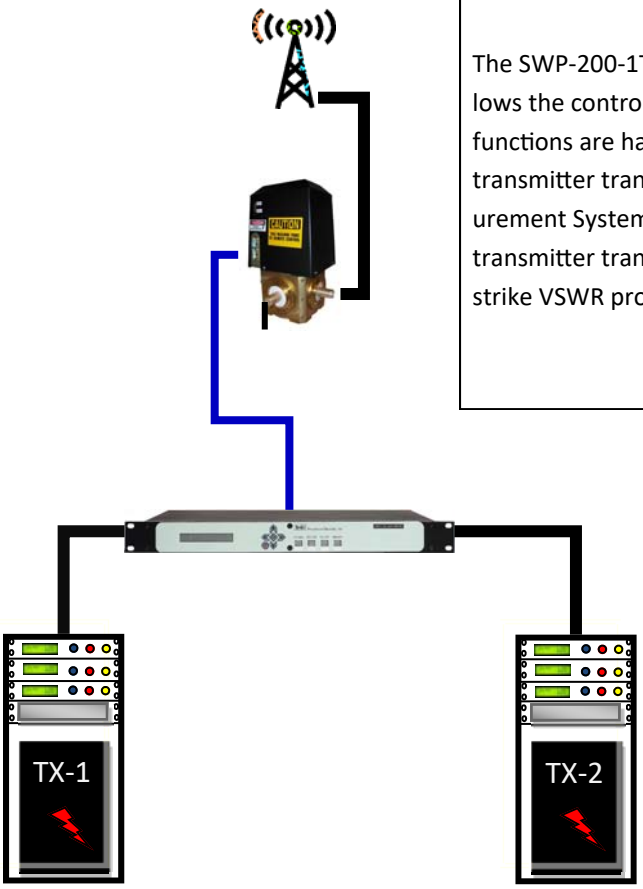


- **A modern approach to RF switch control in a compact 1 RU chassis form factor**
- **Easily integrates with up to 2 - BDI DPS-100D RF power meters using Ethernet cable for a complete intelligent RF switch controller with proprietary 3 strike counter**
- **Management/Control of up to 2 — four port switches and interlocks**
- **Automatic transmitter changeover sensing loss of RF power**
- **1 switch and 2 switch controller models available**
- **Compatible with all major manufacturers RF transfer switches**
- **RF power display for up to 2 DPS-100D RF power meters**
- **Built in LAN Port Provides Remote Control Via Free BDI GUI Software SNMPv2 Agent**
- **Optional RF Switch Cables available for most manufacturers RF switches**

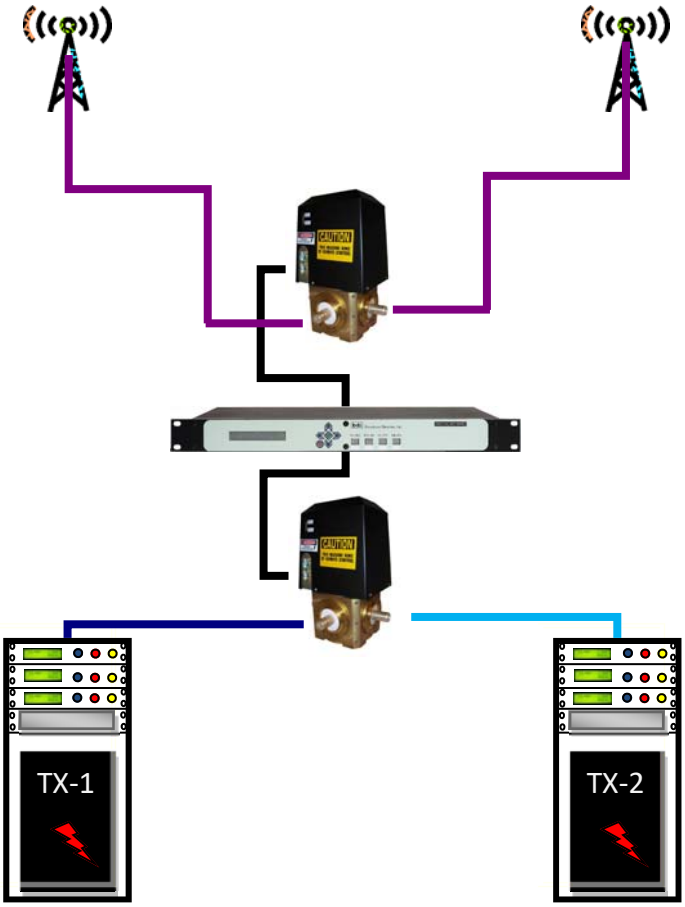
SWP-200-1/2T Technical Specifications

Modes Supported:	TX1/TX2 select to Air—SWP-200-1T, ANT1/ANT2 select, TX1/TX2 select to Air—SWP-200-2T
Number of Switches Supported:	SWP-200-1T—1, SWP-200-2T—2
Switch Control Voltage:	12 or 24 VDC
Switch Manufactures supported:	Dasto, Delta, Dielectric, DowKey, ERI, MCI, Myat, Spinner
Transmitter and Interlock Control:	Both models control up to two transmitters providing TX ON/OFF and Interlock Management
Transmitter Interface:	Form C dry contact relays
Remote Control interface SWP-200-1T:	General Purpose I/O Control of Air Selected transmitter ON/OFF, Motorized Switch Position, Switch position of second switch—SWP-200-2T Model, Fault Reset*
Additional Remote Control interface functions for SWP-200-2T:	Antenna 1/2 Command/Status, Antenna Auto/Manual Command/Status,
Status Available:	Motorized Switch position, Fault Status, TX1,2 Interlock, Air Transmitter ON/OFF
AC Power Loss Monitor:	Monitors for presence of AC Power loss to transmitter(s) to prevent switch operation in auto mode if AC power is lost to transmitters—Logic input requires external circuitry
Power Measurement Range:	10 Watt to 100 KW Full Scale Indication*
Power Measurement Accuracy:	+/-5% of Reading—Dynamic Range 40 below Full Scale Indication*
Communications Interface:	RS232/485, TCP/IP— Ethernet TCP/IP, SNMPv2 Agent and BDI Graphical User Interface Compatible with Windows XP, 7 , 8 ,10, Android
Physical Dimensions:	19” W X 10”D X 1.75” H—EIA Standard 1 Rack Unit
Electrical Requirements:	100-240 VAC 50/60 Hertz @ 0.5 ampere
Environmental:	0-60 degrees C, non condensing atmosphere

* - SWP-2001/2R1-1T/2T versions which include DPS-100D Power Meter/Line Section. Maximum Power Measurement is line size dependent. See ordering information for models available.



The SWP-200-1T is a simple and easy to use single motorized switch controller that allows the control of two transmitters and one RF switch. Interlock and transmitter on/off functions are handled by the SWP chassis providing simple one button operation of transmitter transfer operations. Interfaced with the optional DPS-100D Power Measurement System the SWP series chassis provides complete automatic operation of transmitter transfer in the event of an RF failure while at the same time offering 3—strike VSWR protection of the transmission system and “hot switch” protection.



The SWP-200-2T series allows for a single rack unit solution to dual motorized switch control. This configuration allows for Main/Aux antenna selection and Main/Aux transmitter selection

When furnished with optional DPS-100D Power Sensors the SWP-200-2T becomes a completely automatic system for antenna and transmitter changeover in the event of a VSWR Fault and/or transmitter failure. User configurable thresholds allows for fault detection and corrective action within seconds of a failure. BDI’s exclusive 3-strike VSWR protection algorithm along with our other exclusive feature hot switch protection keeps you on the air and your investment in equipment protected.

SWP-200 Series Ordering Information:

SWP Series Motorized Switch Controllers can be ordered in single and dual switch versions. In addition they can be ordered with or without RF power measurement capability. All SWP series controllers can be interfaced to BDI DPS-100D Power Measurement systems at time of order or at a later date which makes the SWP series a flexible solution for transmitter site management. Refer to the chart below for ordering information.

Without RF Power Measurement

Model	*Description*	*Sensor Supplied*
SWP-200-1T	Single Switch Controller	None*
SWP-200-2T	Dual Switch Controller	None*

With Power Measurement

Model	*Description*	
SWP-200-1R1- N	RF+CTL 1-4 PORT SWITCH + TYPE N COUPLER	1-DPS-100D
SWP-200-1R1- 7/8	RF+CTL 1-4 PORT SWITCH + 7/8 COUPLER	1-DPS-100D
SWP-200-1R1-7/16	RF+ CTL 1-4 Port SWITCH + 7/16 DIN COUPLER	1-DPS-100D
SWP-200-1R1-1 5/8	RF+CTL 1-4 PORT SWITCH + 1-5/8 COUPLER	1-DPS-100D
SWP-200-1R1-3 1/8	RF+CTL 1-4 PORT SWITCH + 3-1/8 COUPLER	1-DPS-100D
SWP-200-1R1-4 1/16	RF+CTL 1-4 PORT SWITCH + 4-1/16 COUPLER	1-DPS-100D
SWP-200-1R1-6 1/8	RF+CTL 1-4 PORT SWITCH + 6-1/8 COUPLER	1-DPS-100D
SWP-200-2R1- N	RF+CTL 2-4 PORT SWITCH + TYPE N COUPLER	1-DPS-100D
SWP-200-2R1- 7/8	RF+CTL 2-4 PORT SWITCH + 7/8 COUPLER	1-DPS-100D
SWP-200-2R1-7/16	RF+ CTL 2-4 Port SWITCH + 7/16 DIN COUPLER	1-DPS-100D
SWP-200-2R1-1 5/8	RF+CTL 2-4 PORT SWITCH + 1-5/8 COUPLER	1-DPS-100D
SWP-200-2R1-3 1/8	RF+CTL 2-4 PORT SWITCH + 3-1/8 COUPLER	1-DPS-100D
SWP-200-2R1-4 1/16	RF+CTL 2-4 PORT SWITCH + 4-1/16 COUPLER	1-DPS-100D
SWP-200-2R1-6 1/8	RF+CTL 2-4 PORT SWITCH + 6-1/8 COUPLER	1-DPS-100D

*Can be ordered at a later date

The DPS-100D Series True RMS Power Monitor available from BDI can be interfaced to any SWP-200 series motorized switch controller. This powerful combination provides automatic failover operation and RF switch protection against “Hot” switching. Order as a package or later on. The DPS-100D simply plugs in and is powered from the SWP-200 chassis. Up to 2—DPS-100D power meters can be interfaced to any SWP-200 chassis. See our DPS-100D True RMS Power Meter data sheet on our website for complete specifications.