

SPECIFICATION SHEET

JFW MODEL 50PA-1002-XX

PROGRAMMABLE ATTENUATOR ASSEMBLY

JFW Industries, Inc.
Phone: 317-887-1340
sales@jfwindustries.com
www.jfwindustries.com

Frequency Range	100 MHz-40 GHz
Attenuation Range	0-31 dB in 1 dB steps
Configuration	Individually controlled solid-state programmable attenuators. Number of attenuators can be selected from 1 to 16 attenuators.
Enclosure Type	19 inch rack mount 2RU high (for 1-16 attenuators)
Impedance	50 Ohms nominal
Startup/Default States (configurable)	Attenuators to 31dB at startup (see ATTEN command) DHCP enabled (see NET command) 4 Ethernet users (see NET command) Prompts off (see PROMPT command) All of these default settings can be changed by user. Unit can be configured for up to 12 Ethernet users.
VSWR	1.6:1 typical 100 MHz-18 GHz 1.8:1 typical 18-26.5 GHz 2.0:1 typical 26.5-40 GHz 2.8:1 maximum 100MHz-40 GHz
Attenuation Accuracy (Referenced to Insertion loss)	± 1.0 dB typical 100 MHz-18 GHz ± 1.5 dB typical 18-26.5 GHz ± 2.0 dB typical 26.5-40 GHz ± 3.5 dB maximum 100 MHz-40 GHz
Insertion Loss	1.8 dB typical @ 100 MHz 3.0 dB typical @ 3 GHz 4.5 dB typical @ 8 GHz 6.5 dB typical @ 18 GHz 8.5 dB typical @ 26.5 GHz 9.5 dB typical @ 40 GHz
RF Input Power	+20 dBm average +25 dBm (0.1dB compression)
Switching Speed	1 microsecond typical (after command is received and processed) (3 milliseconds typical processing time)
Manual Control	20-Button Keypad and LCD display (IP Address configurable via keypad) (Net mask configurable via keypad) (Gateway configurable via keypad) (Baud rate configurable via keypad)
Remote Control	Ethernet (DHCP, TCP/IP, 10/100, up to 12 users) RS-232 (up to 115200 Baud)

--CONTINUED--

SPECIFICATION SHEET
JFW MODEL 50PA-1002-XX
PROGRAMMABLE ATTENUATOR ASSEMBLY

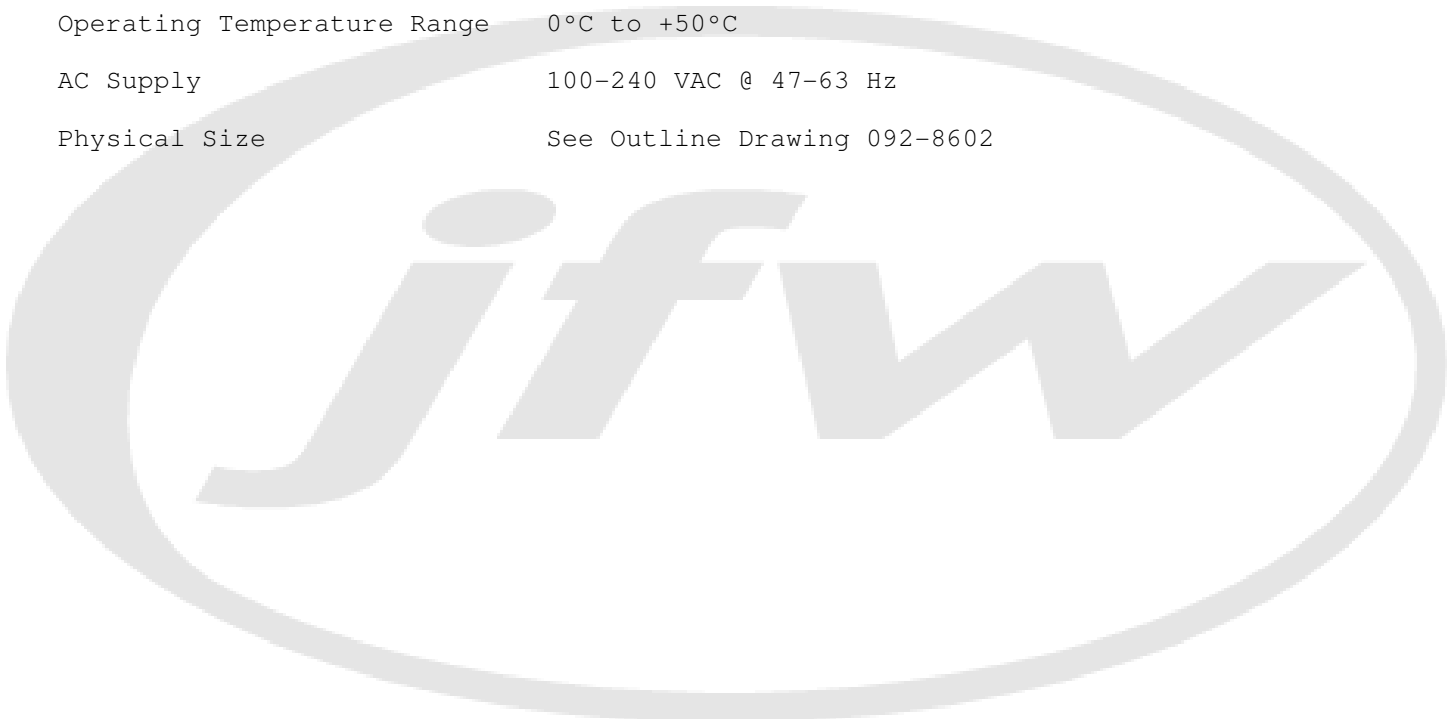
JFW Industries, Inc.
 Phone: 317-887-1340
 sales@jfwindustries.com
 www.jfwindustries.com

Remote Commands

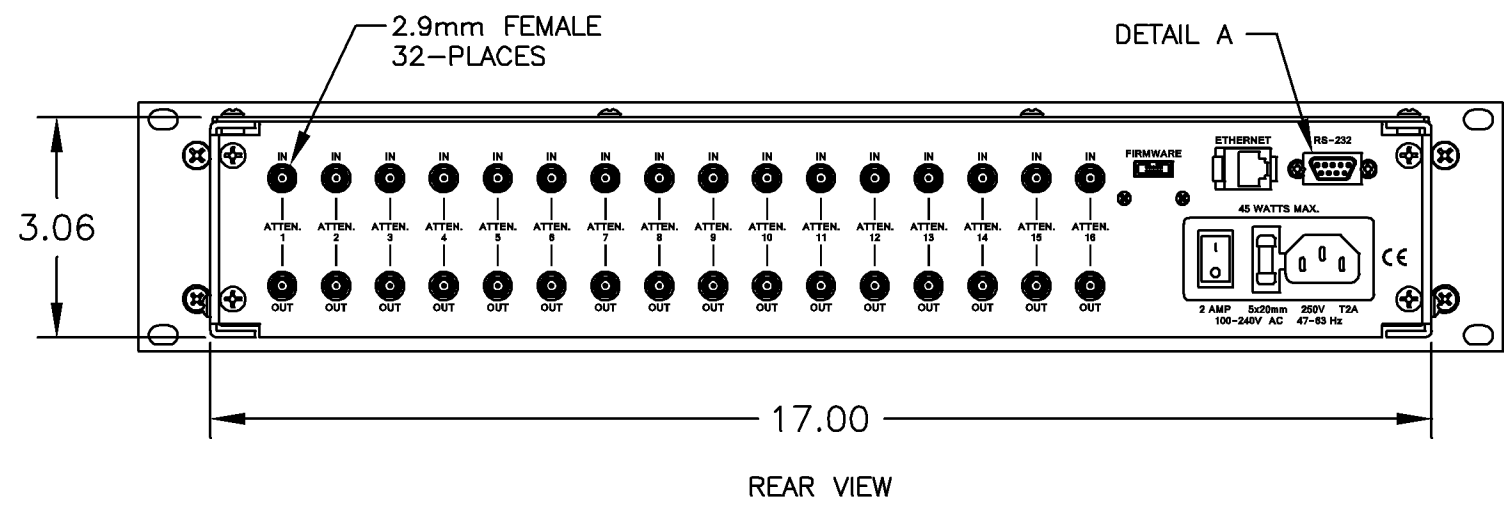
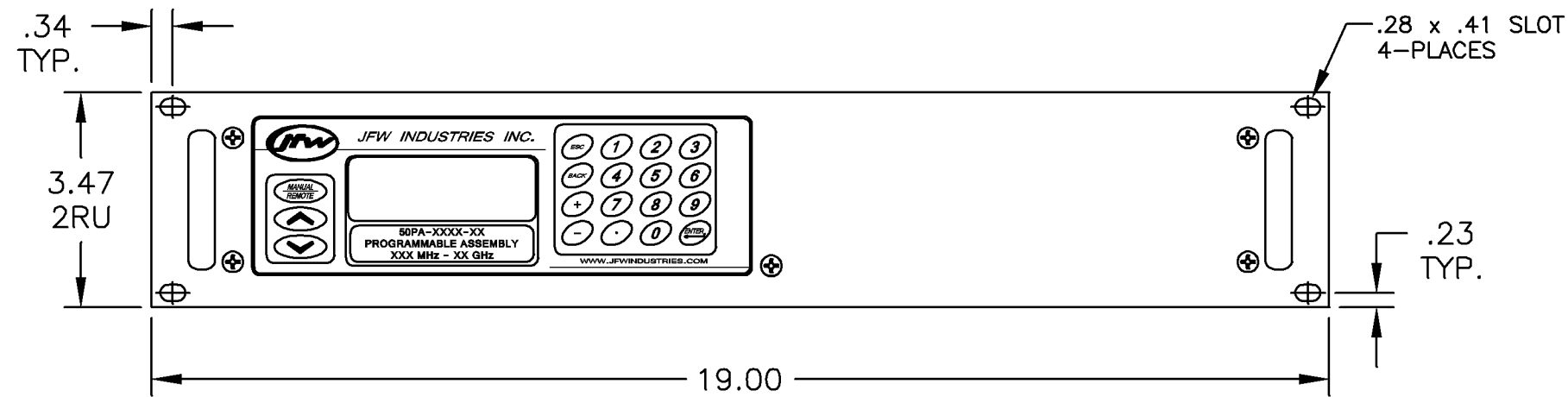
Attenuator Control Commands:
 Atten, Set Attenuator, Read Attenuator, Set All Attenuators, Read All Attenuators, Read All Extended, Fade Attenuator, Variable Attenuator Handover, Block, Set Block, Read Block, Read All Blocks, Fade Block, Variable Block Handover

System Commands:
 Help, Identification, Store, Recall, Pause, Net, Serial, Close, Disconnect, MOTD, Date, Message, Restrict, IDENT, Name, Show Users, Reboot, Uptime, Prompt

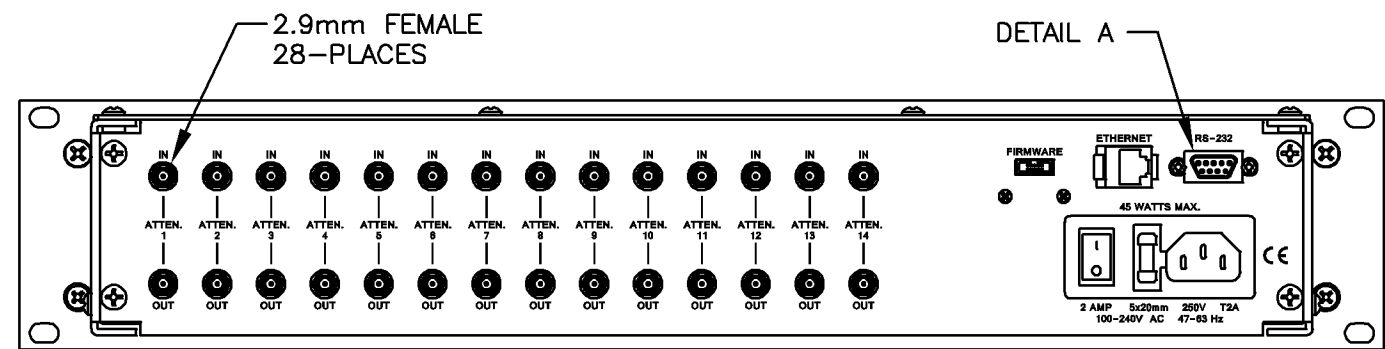
RF Connector 2.92mm female
 Operating Temperature Range 0°C to +50°C
 AC Supply 100-240 VAC @ 47-63 Hz
 Physical Size See Outline Drawing 092-8602



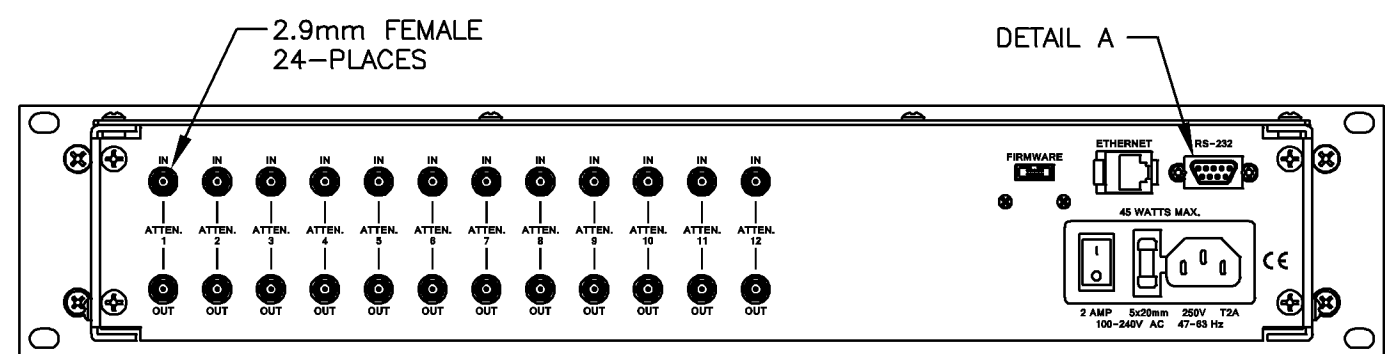
ECR/ECN #	DATE	REV	APPR / DATE	ECR/ECN #	DATE	REV	APPR / DATE
	04/01/2016		TRS 04/01/2016				
26884	07/28/2016	A	BAC 07/28/2016				



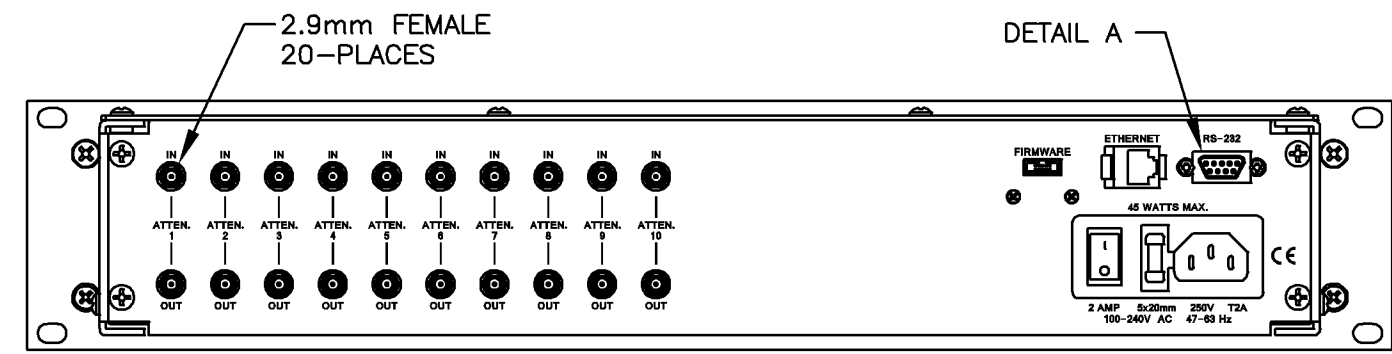
-16
(i.e. 16 ATTENUATORS)



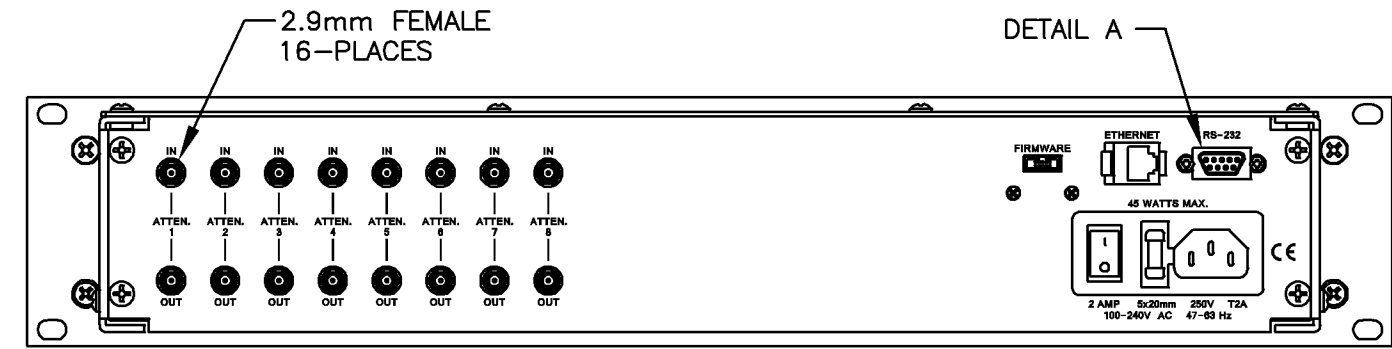
-14
(i.e. 14 ATTENUATORS)



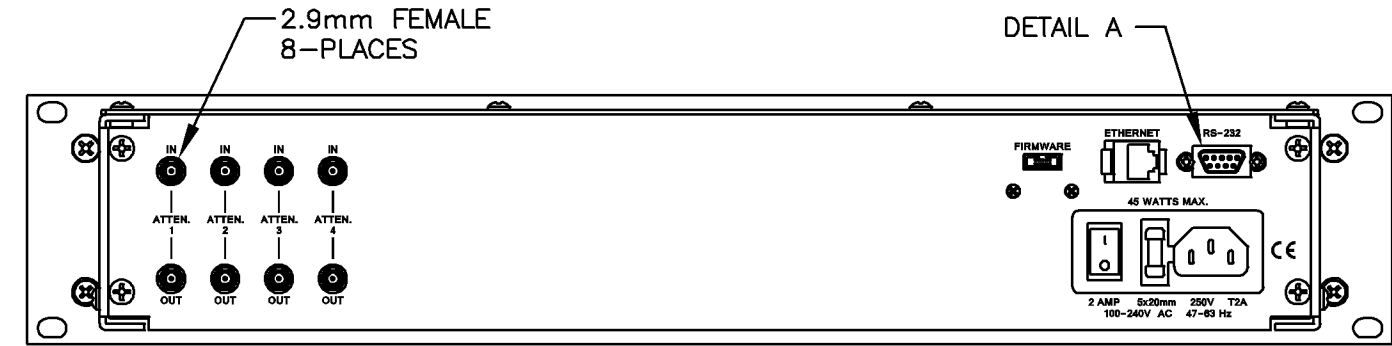
-12
(i.e. 12 ATTENUATORS)



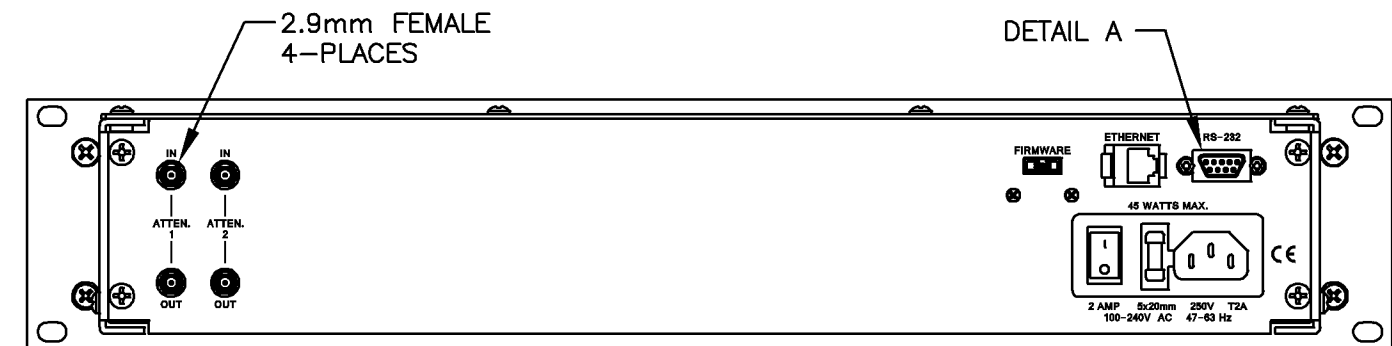
-10
(i.e. 10 ATTENUATORS)



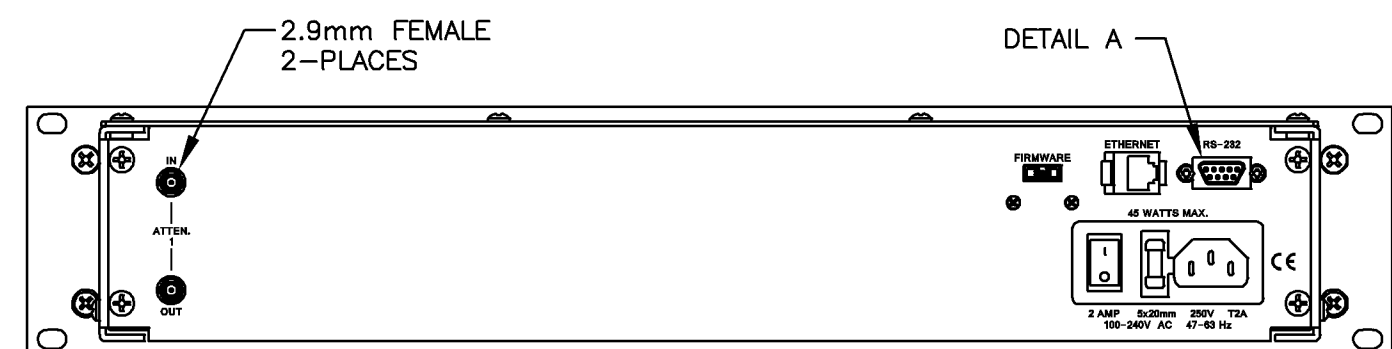
-08
(i.e. 8 ATTENUATORS)



-04
(i.e. 4 ATTENUATORS)



-02
(i.e. 2 ATTENUATORS)



-01
(i.e. 1 ATTENUATORS)

CHASSIS DEPTH = 17.22 INCHES

PIN	FUNCTION
1	CHASSIS GROUND
2	RECEIVED DATA
3	TRANSMITTED DATA
4	NO CONNECTION
5	SIGNAL GROUND
6	NO CONNECTION
7	RTS
8	CTS
9	NO CONNECTION



NOTE:
ALL REAR PANELS ARE SCREENED FOR SIXTEEN ATTENUATORS TO ALLOW FOR FUTURE EXPANSION. ONLY USED SECTIONS ARE SHOWN FOR CLARITY.

REV	ECN	DATE	BY	APPR	JFW INDUSTRIES, INC.	
-	ISSUED	4-1-16	DTS	TRS	www.jfwindustries.com PH: 317-887-1340	
A	27610	11-17-17	JZ	TEZ	PROPRIETARY INFORMATION	
MATERIAL					ALUMINUM ALLOY	ALL SURFACES ARE TO BE FREE OF BURRS, PITS, & SCRATCHES
FINISH					CHEMFILM TCP / FRONT: BLACK	TOLERANCES
MODEL					50PA-XXXX-XX	SCALE 3/8
DESCRIPTION					PROGRAMMABLE ASSEMBLY	.XX±.010 .XXX±.005 .XX±.5° DWG # 092-8602