

868/915MHz PFC ANTENNA

SWA4359



Features & Applications:

-  Flexible PCB Antenna
-  I-PEX MHF 4L connector with 100mm cable
-  Cable and connector can be customized
-  Devices with ISM 868MHz / 915MHz radios
-  M2M, IoT
-  Metering, Industry automation

ELECTRICAL SPECIFICATIONS @ 25°C

General Specifications

Antenna type	Nominal Impedance	Polarization	Radiation pattern
Dipole	50Ω	Linear	Omni

Frequency (MHz)	860~930 MHz
Return Loss	<-5dB
VSWR	< 3.5
Efficiency (%) (pasted on 1.5mm thickness plastic plate)	860 - 870MHz band: 35% 900 - 930MHz band: 33%
Gain (dBi) (pasted on 1.5mm thickness plastic plate)	860 - 870MHz band: 2.3±0.3dBi 900 - 930MHz band: 2.2±0.2dBi

MECHANICAL SPECIFICATIONS

SWA4359

FPC Dimension (Length x Width)	Color	Cable OD	Connector Type	Cable length
37mm x 9mm	Black	1.13mm	IPEX MHF 4L	100mm

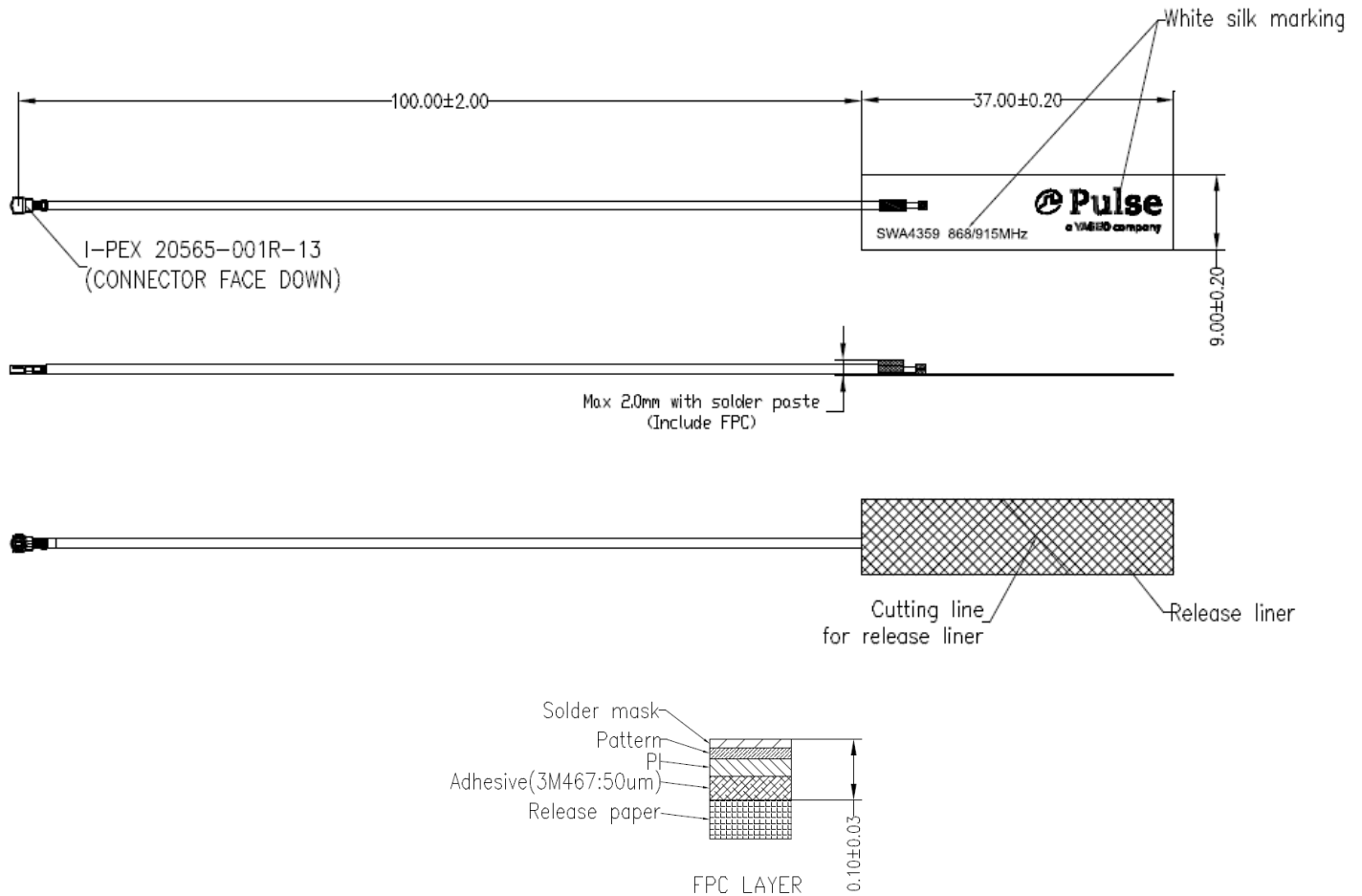
ENVIRONMENTAL SPECIFICATIONS

SWA4359

Storage Temperature	Operating Temperature	RoHS Compliant
-40/+85° C	-40/+85° C	Yes

Mechanical Drawing

SWA4359



Units: mm

Application Specification

SWA4359

During the assembly of the antenna in a device, the cable needs to be positioned away from the antenna flex to achieve the best performance. The cable must be away from the flex edge at least 5mm as shown in figure 1. If the cable bends into the antenna flex, the antenna performance will be degraded.



Figure 1 Cable Bending

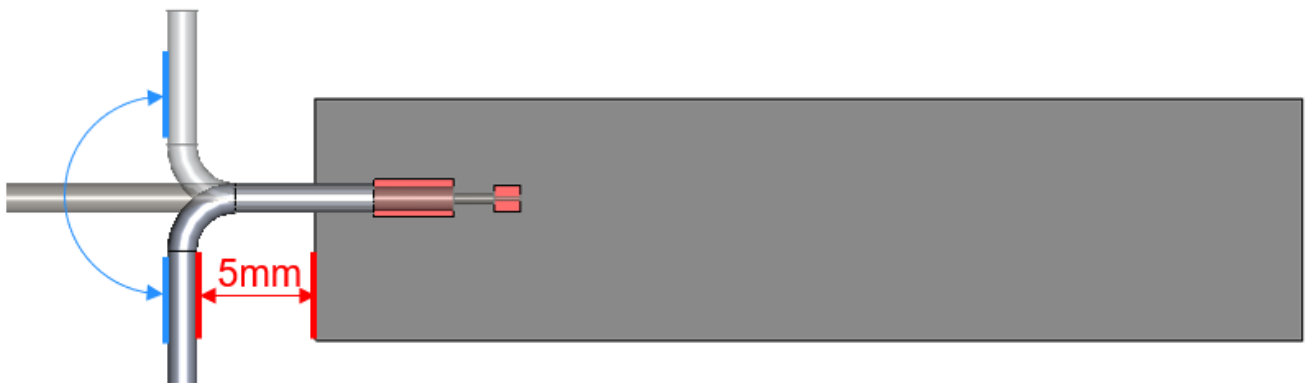
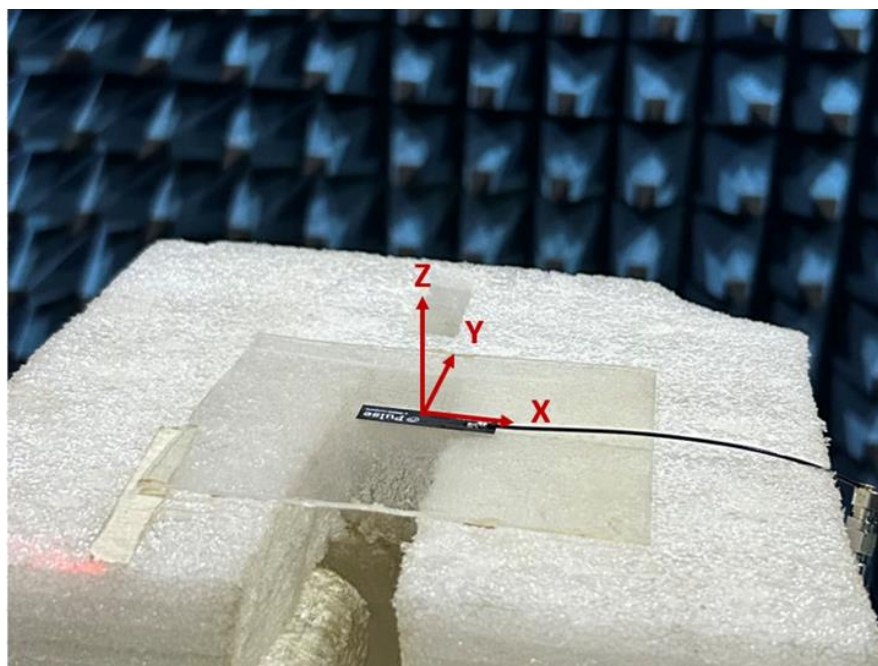


Figure 2 Cable Activity

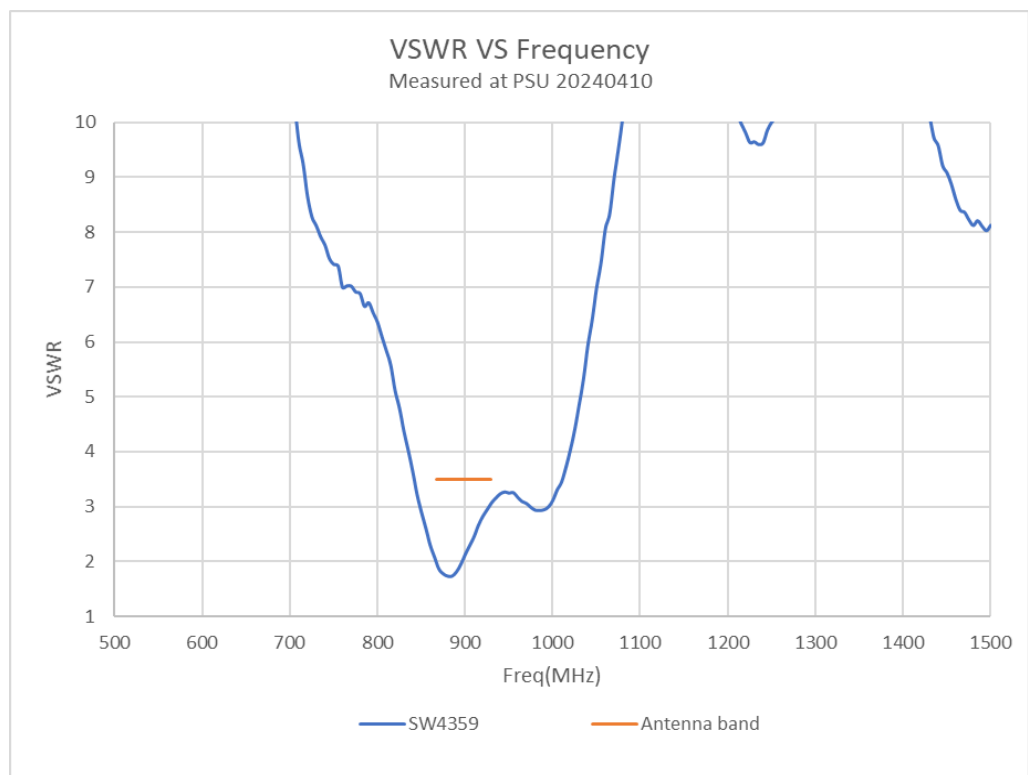
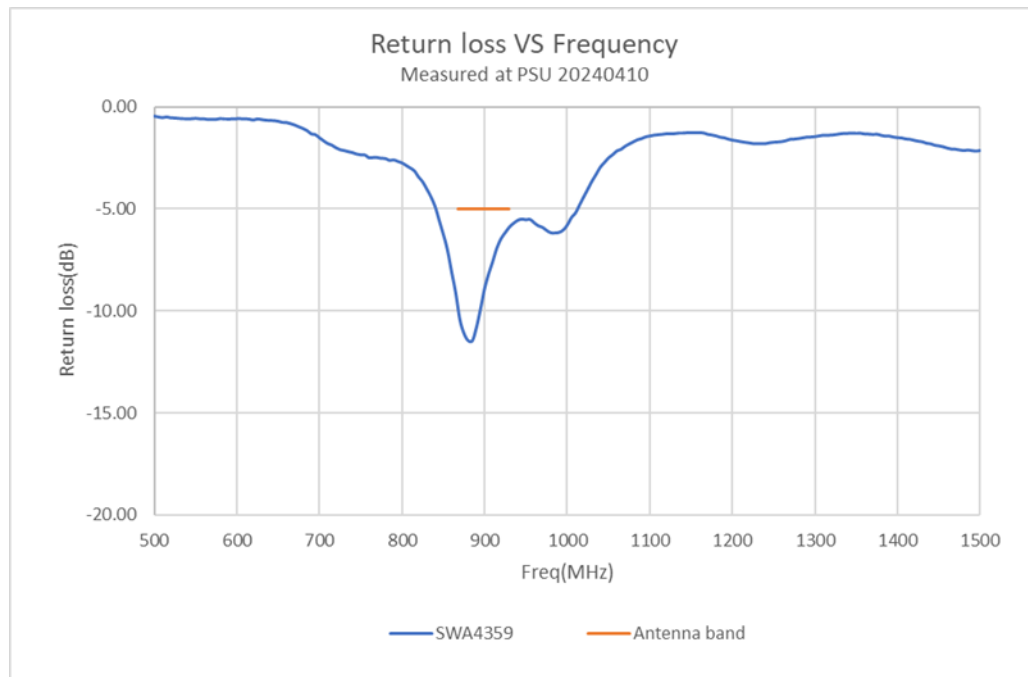
Test setup (pasted on 1.5mm thickness plastic plate)

SWA4359



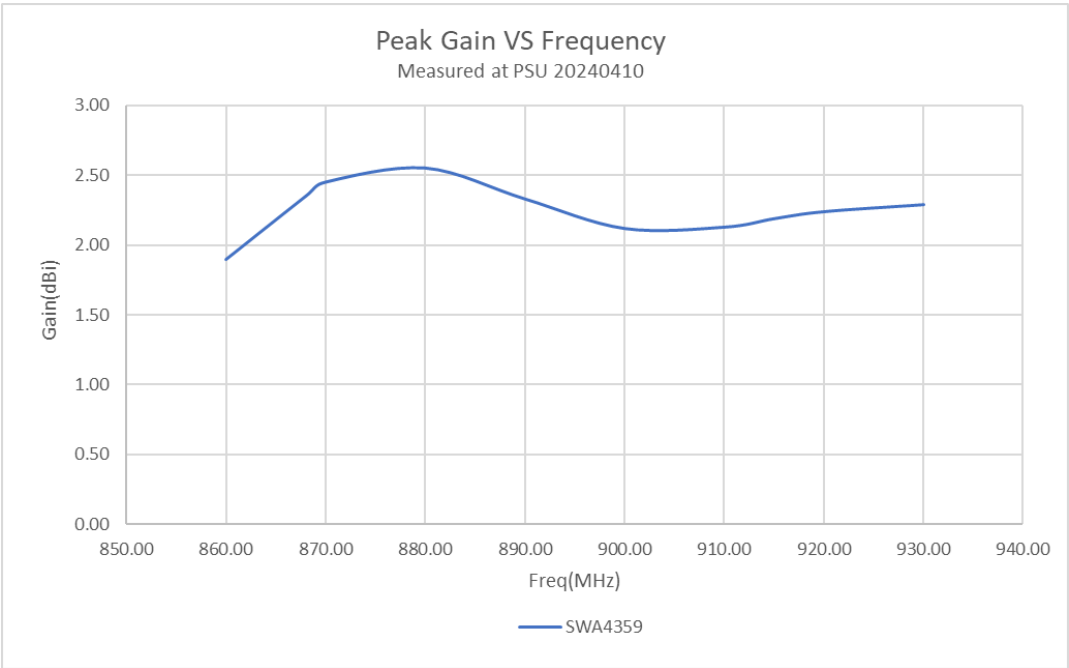
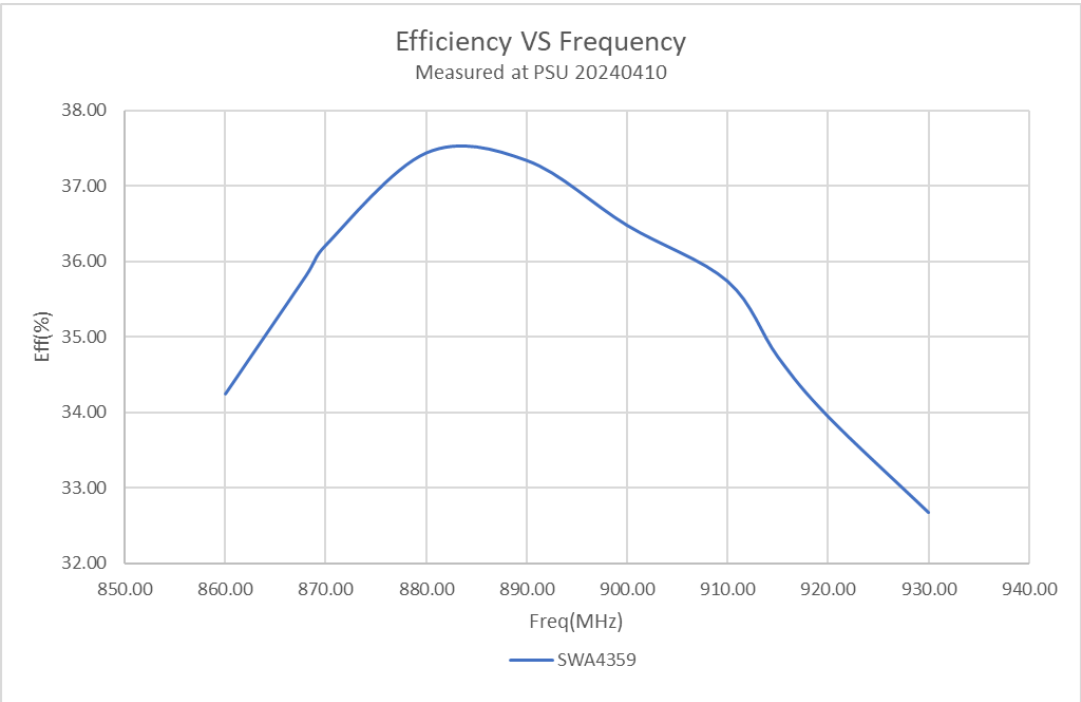
Charts- Antenna Return loss & VSWR

SWA4359



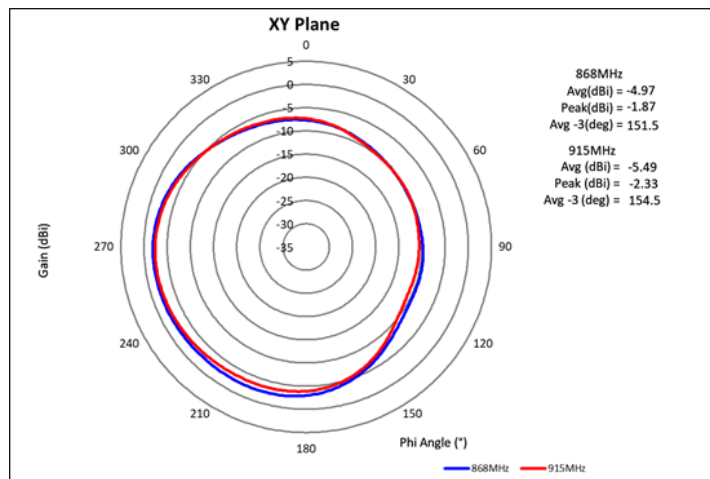
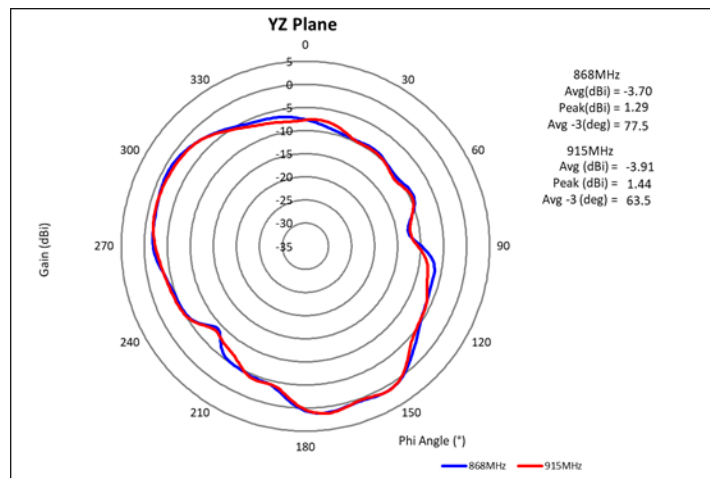
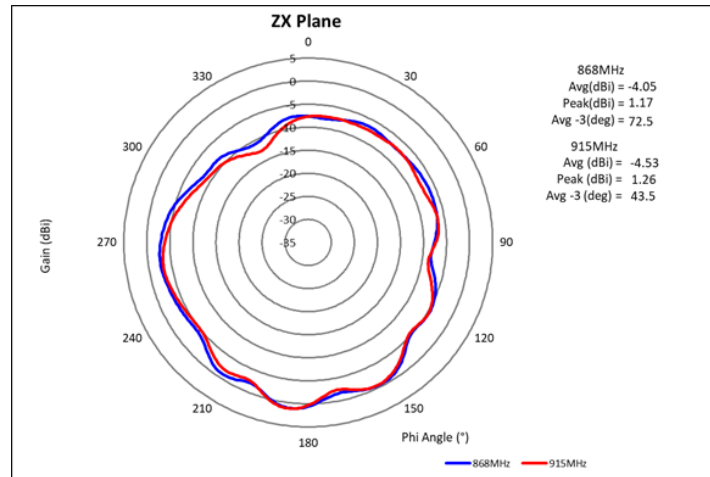
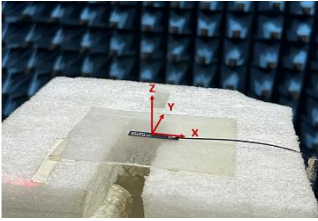
Charts – Efficiency & Peak Gain

SWA4359



Charts – Antenna Radiation Gain Pattern

SWA4359



868/915MHz PFC ANTENNA

SWA4359

PACKAGING

SWA4359

1. 10 Pcs/PE bag
 2. 10 PE bags in a group
 3. 60 groups in a box
 4. Total 6000 pcs/Carton box
- Carton box size: 460mm*235mm*140mm.



10 pcs/PE bag



10 PE bags in a group



60 groups in a box



Total 6000 pcs/Carton box
Carton box size:460mm*235mm*140mm

For More Information:

Americas - antennas.us@pulseelectronics.com | Europe - antennas.eu@pulseelectronics.com | Asia - antennas.as@pulseelectronics.com | Questions? +1-800-ANTENNA
Performance warranty of products offered on this data sheet is limited to the parameters specified. Data is subject to change without notice. Other brand and product names mentioned herein may be trademarks or registered trademarks of their respective owners. © Copyright , 2020. Pulse Electronics, Inc. All rights reserved.
Company address: Pulse Electronics, a YAGEO Company, 15255 Innovation Drive, Suite #100, San Diego, CA 92128

'YAGEO Corporation and its affiliates do not recommend the use of commercial, automotive, and/or COTS grade products for high reliability applications or manned space flight.'