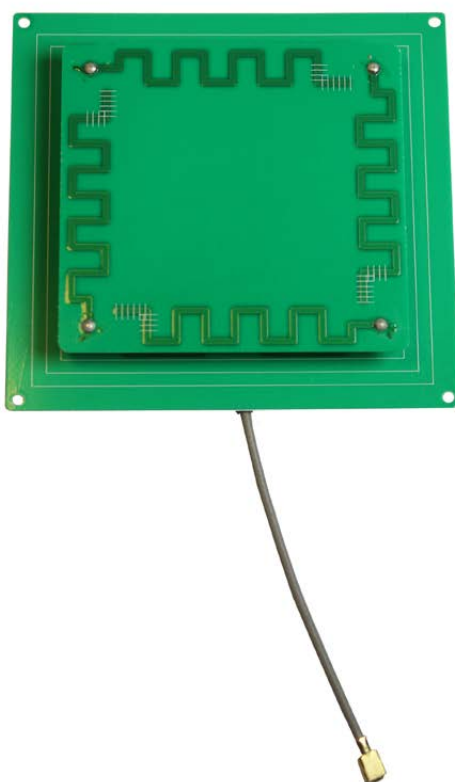


# MQMA 4510 866MHz Quadrifilar Antenna



## MQMA 4510 866MHz UHF RFID quadrifilar antenna Specification



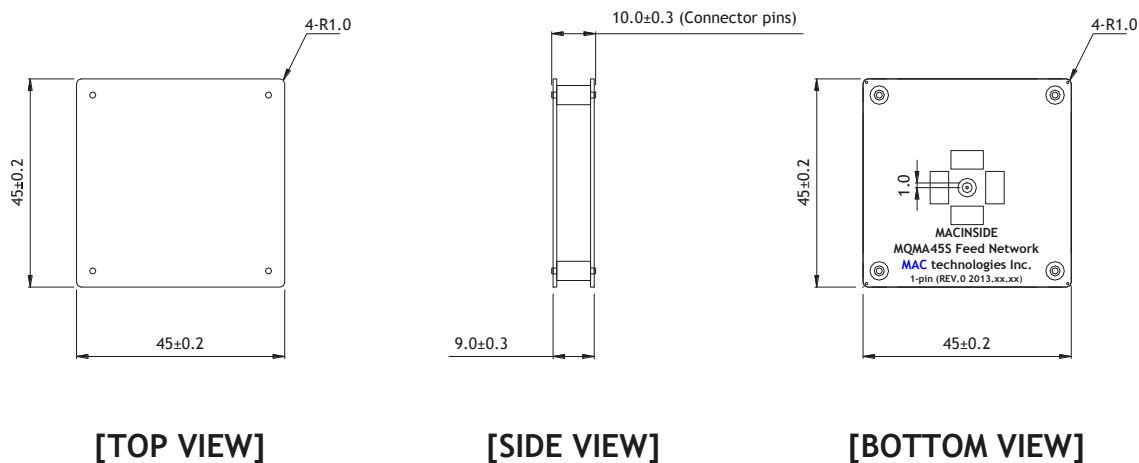
# MQMA 4510 866MHz Quadrifilar Antenna

## Electrical Specifications

NO.	Parameter	Spec.		Unit	Remark
		Cable Ass'y	Set Ass'y		
1	Center Frequency	866.0 ± 3		MHz	
2	Band Width	12 typ.	typ.	MHz	@ -10 dB R.L
3	VSWR	2.0 : 1 max.	max.	Ratio	
4	Impedance	50		Ohms	
5	Peak Gain	-2.0 typ.	typ.	dBiL	@ 866 MHz.
6	Polarization	RHCP			
7	Beam Width	130 typ.	typ.	Deg.	

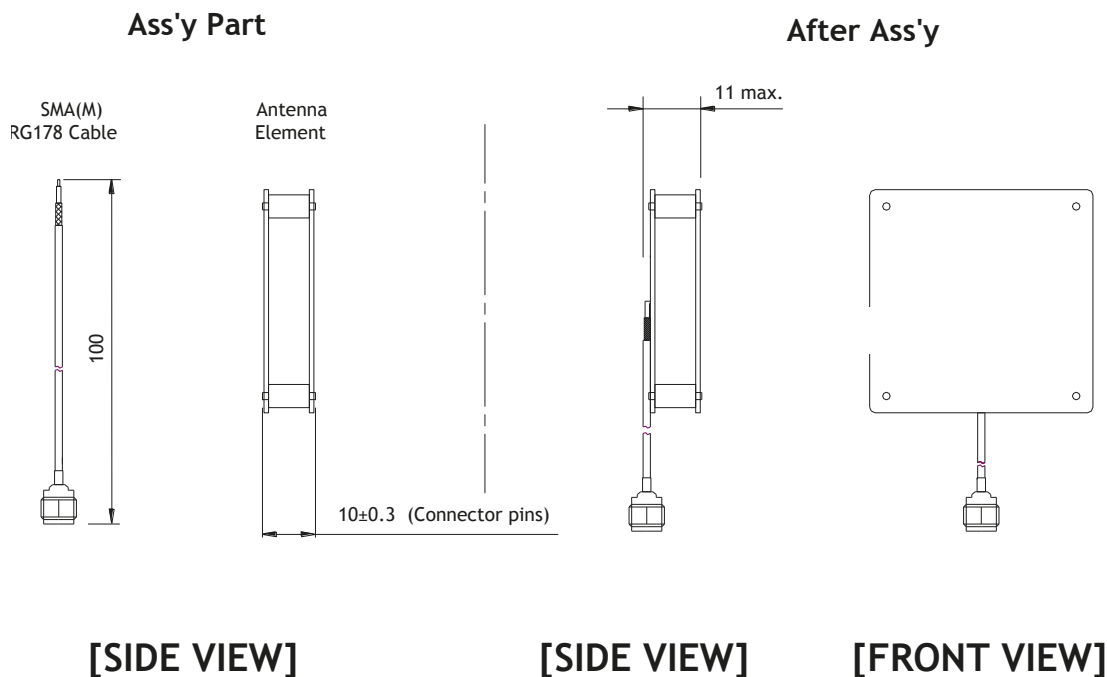
## Mechanical dimensions (unit: mm)

### Antenna element



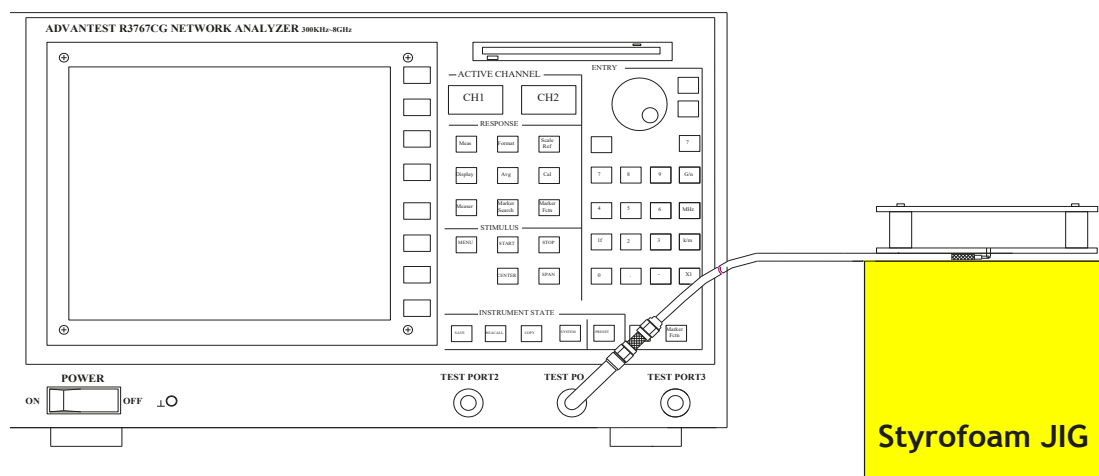
# MQMA 4510 866MHz Quadrifilar Antenna

## Cable Ass'y



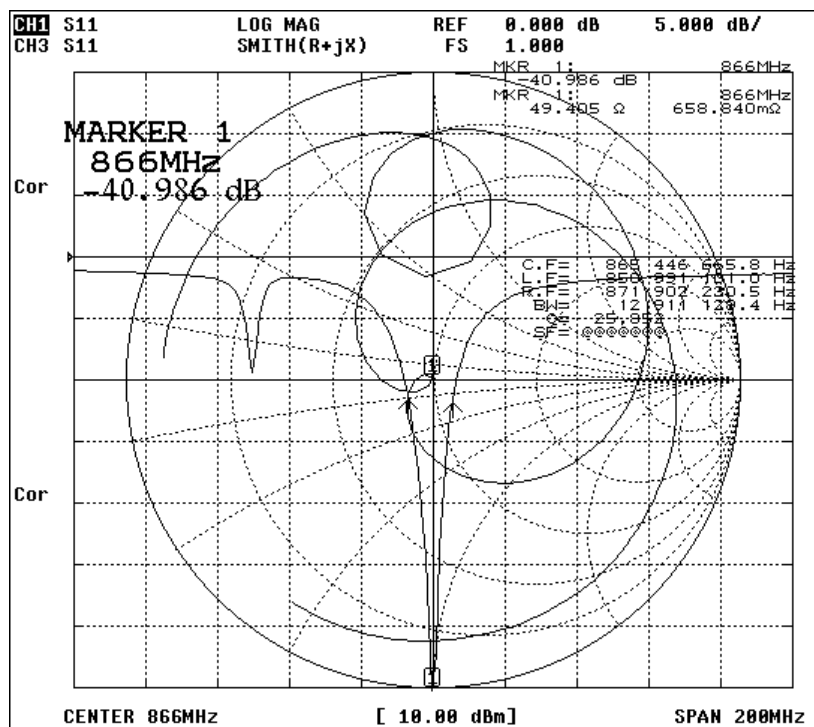
Uni

## Test Fixture



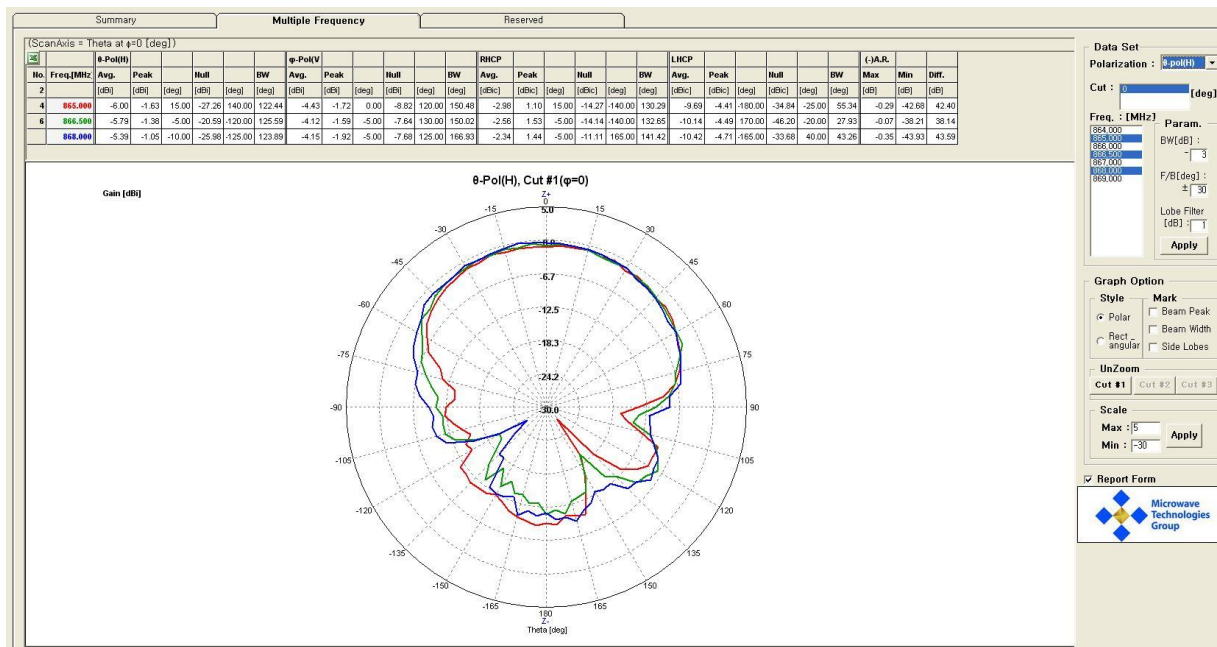
# MQMA 4510 866MHz Quadrifilar Antenna

## Measurement data Cable Ass'y

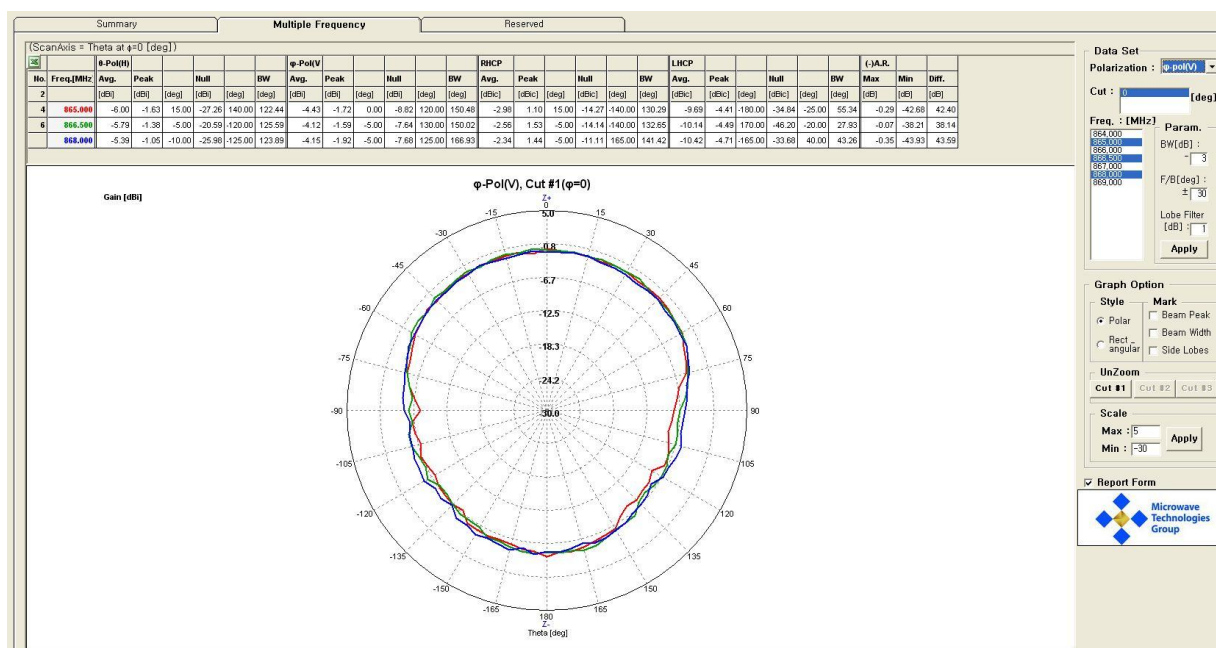


# MQMA 4510 866MHz Quadrifilar Antenna

## Radiation Patterns after Cable Ass'y H-pol (Frequency 865, 868 MHz)



## V-pol (Frequency 865, 868 MHz)



# MQMA 4510 866MHz Quadrifilar Antenna

## Gain Test Data

Source Antenna Polarization	Frequency ( MHz)		
	865.0 MHz	866.5 MHz	868 MHz
H-Pol.(dBiL)	-1.63	-1.38	-1.05
V-Pol.(dBiL)	-1.72	-1.59	-1.92
RHCP(dBic)	1.10	1.53	1.44

## List of utilized test equipment

NO	Kind of Equipment and Precision	Manufacturer	Model No.	Serial Number	Calibration Date	Specification	Note
1	Anechoic Chamber	MTG	Mobile Chamber	-	N/A	4.0 m X 2.5 m X 2.5 m (0.4 - 3 GHz)	
2	Network Analyzer	Agilent	8753ES	US39173213	12/08/22	30 KHz - 6 GHz	
3	Dual-Polarization Horn Antenna with RF Switch	MTG	QRH-004060/ RSW-001060		-	0.4 MHz - 6 GHz	Source
4	Calibration Antenna	Schwarzbeck Mess - Elektronik	BBHA 9120 A	1201	13/07/16	0.7 MHz - 3 GHz	Reference
5	Absorber Installation	EMERSON & CUMING	SABS-003 18"			Reflectivity : -25 dB @ 0.8 GHz -20 dB @ 1.0 GHz	