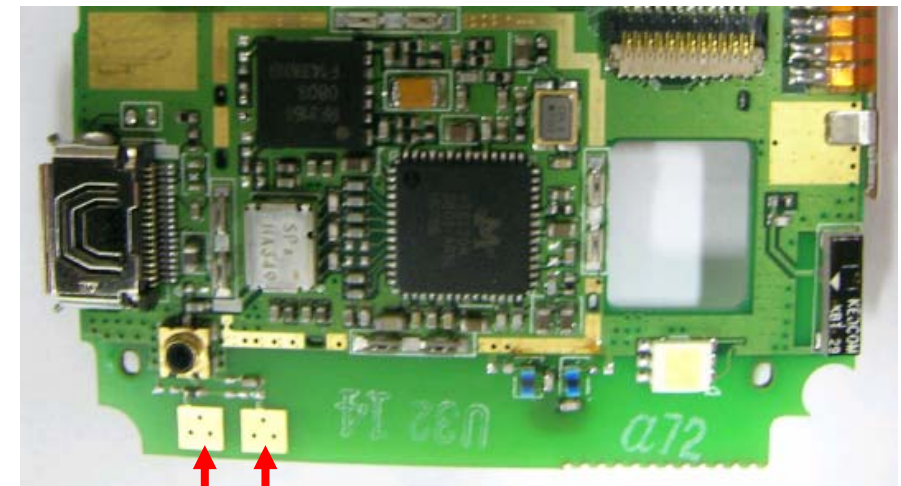
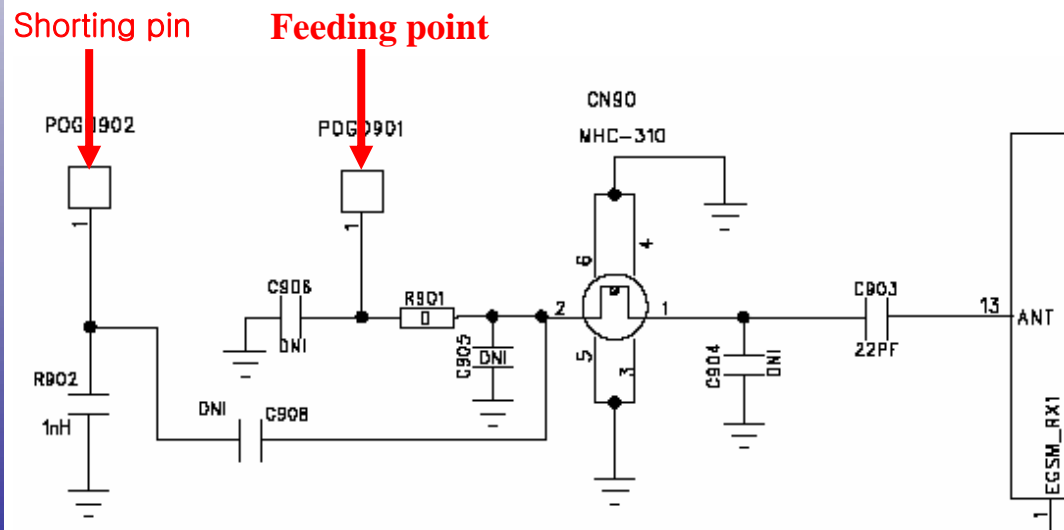


Description about function of Antenna

- ➔ Refer to attached file, Approval sheet of MEGA4.pdf
- ➔ MEGA4 designed the Antenna of PIFA type.

The Inverted F Antenna (IFA) typically consists of a rectangular planar element located above a ground plane, a short circuiting plate or pin, and a feeding mechanism for the planar element. The Inverted F antenna is a variant of the monopole where the top section has been folded down so as to be parallel with the ground plane. This is done to reduce the height of the antenna, while maintaining a resonant trace length. This parallel section introduces capacitance to the input impedance of the antenna, which is compensated by implementing a short-circuit stub. The stub's end is connected to the ground plane through a via.



Shorting pin
Feeding point

Directivity : Omni-directional (Horizontal)

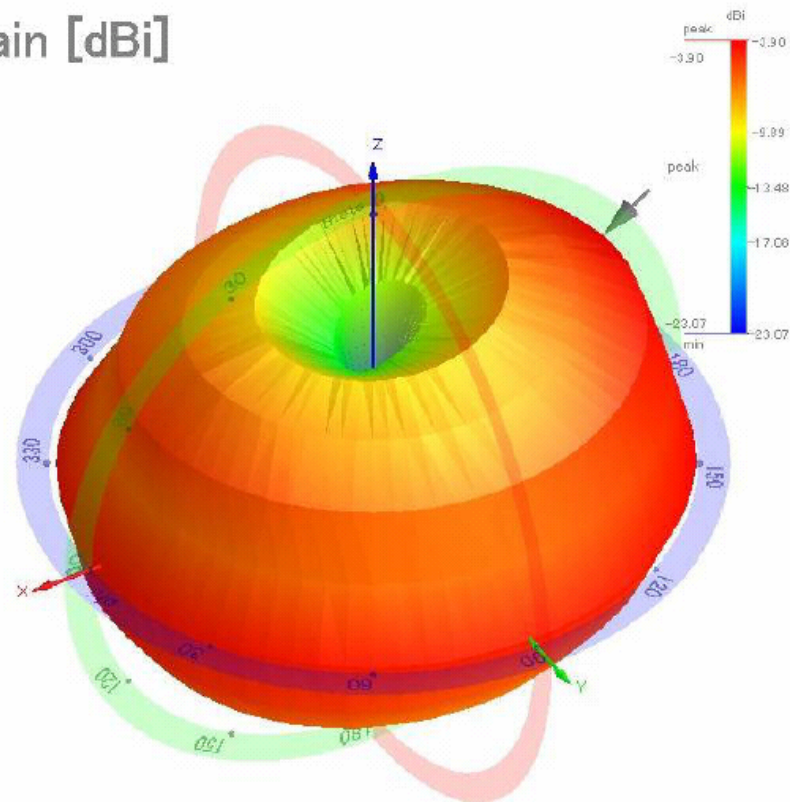
1) GSM850/DCS1800/PCS1900 Band

BAND		GSM850	DCS1800	PCS1900
GAIN	Avg.	-7.60dBi	-6.31dBi	-4.86dBi
	Peak	-4.43dBi	-1.93dBi	-0.99dBi

GAIN DATA (GSM850)



Gain [dBi]



Test Name : Test #1

Operator : Operator Name

Date : 2008-05-09

Time : 오전 10:17:37

Description :

Test Descriptions

Calibration : 080327

Frequency [MHz]

Plot Data Type

VH Sum

Amplitude [dB]

Normalization

Global Peak

Default Range

Range Change

Max Amplitude

5

Chart 2D

Chart 3D Polar

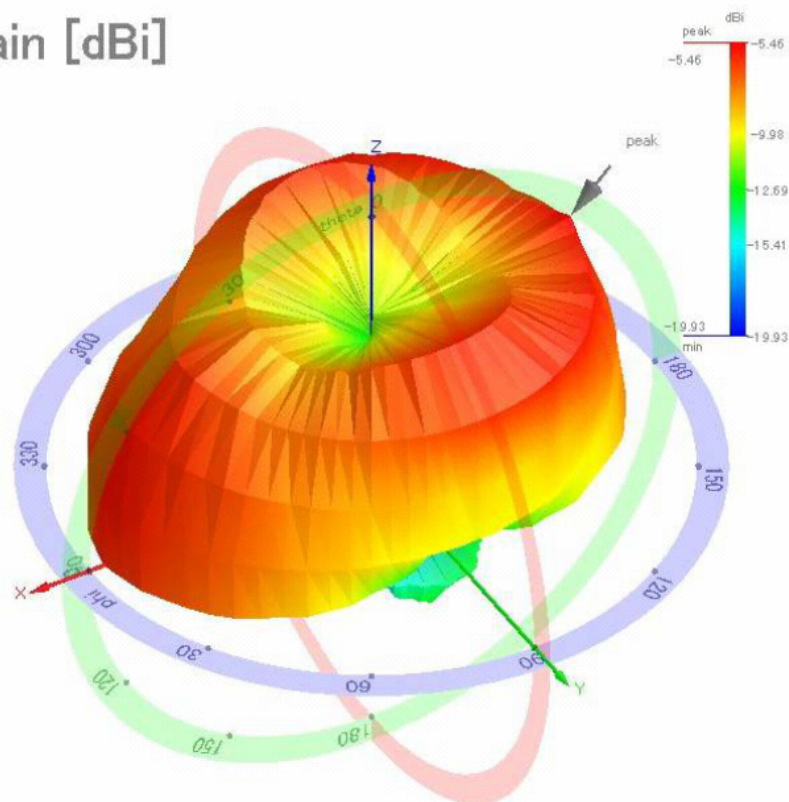
PLOT

Freq.[MHz]	Polarization	Beam Peak			Beam Null			Gain[dBi]	Efficiency
		Value	Phi	Theta	Value	Phi	Theta		
824		-3.869	180	120	-23.072	150	180	-6.515	22.31%
849		-3.707	175	120	-23.611	160	180	-6.604	20.87%
869		-4.478	180	120	-25.676	180	180	-7.845	16.42%
894		-5.694	175	120	-27.816	170	180	-9.279	11.91%
1710		-4.732	155	135	-20.122	165	60	-9.163	12.13%
1785		-1.166	150	135	-16.277	115	75	-5.744	26.65%
1805		-1.398	155	135	-15.265	125	75	-5.630	26.12%
1850		-0.914	25	105	-15.748	125	30	-4.681	32.50%

GAIN DATA (DCS1800, PCS1900)



Gain [dBi]



Test Name : Test #1

Operator : Operator Name

Date : 2008-05-29

Time : 오전 10:17:37

Description :

Test Descriptions

Calibration : 080327

Frequency [MHz]

Plot Data Type

VH Sum

Amplitude [dB]

Normalization

Global Peak

Default Range

Range Change

Max Amplitude

5

Chart 2D

Chart 3D Polar

PLOT

Freq.[MHz]	Polarization	Beam Peak			Beam Null			Gain[dBi]	Efficiency
		Value	Phi	Theta	Value	Phi	Theta		
1710		-4.732	155	135	-20.122	165	60	-9.163	12.13%
1785		-1.166	150	135	-16.277	115	75	-5.744	26.65%
1805		-1.398	155	135	-15.285	125	75	-5.830	26.12%
1850		-0.914	25	105	-15.748	125	30	-4.881	32.50%
1880		-0.475	30	105	-13.984	155	75	-4.526	35.27%
1910		-0.273	0	120	-12.830	160	75	-4.213	37.91%
1930		-0.783	5	120	-12.646	160	75	-4.642	34.34%
1990		-2.012	10	120	-17.865	125	90	-5.739	26.67%