
PERCSSON

Sample Confirmation

Customer Name: ZTE Mobile

ZTEMT Product Information

Part name: F310 RF antenna FPC

(GSM850/1900M-WCDMA850/1900M)

Part No. : 5314051100MT

Part model: ZX694.93JA-01V1.0

This product complies ZTE Mobile ROHS standard

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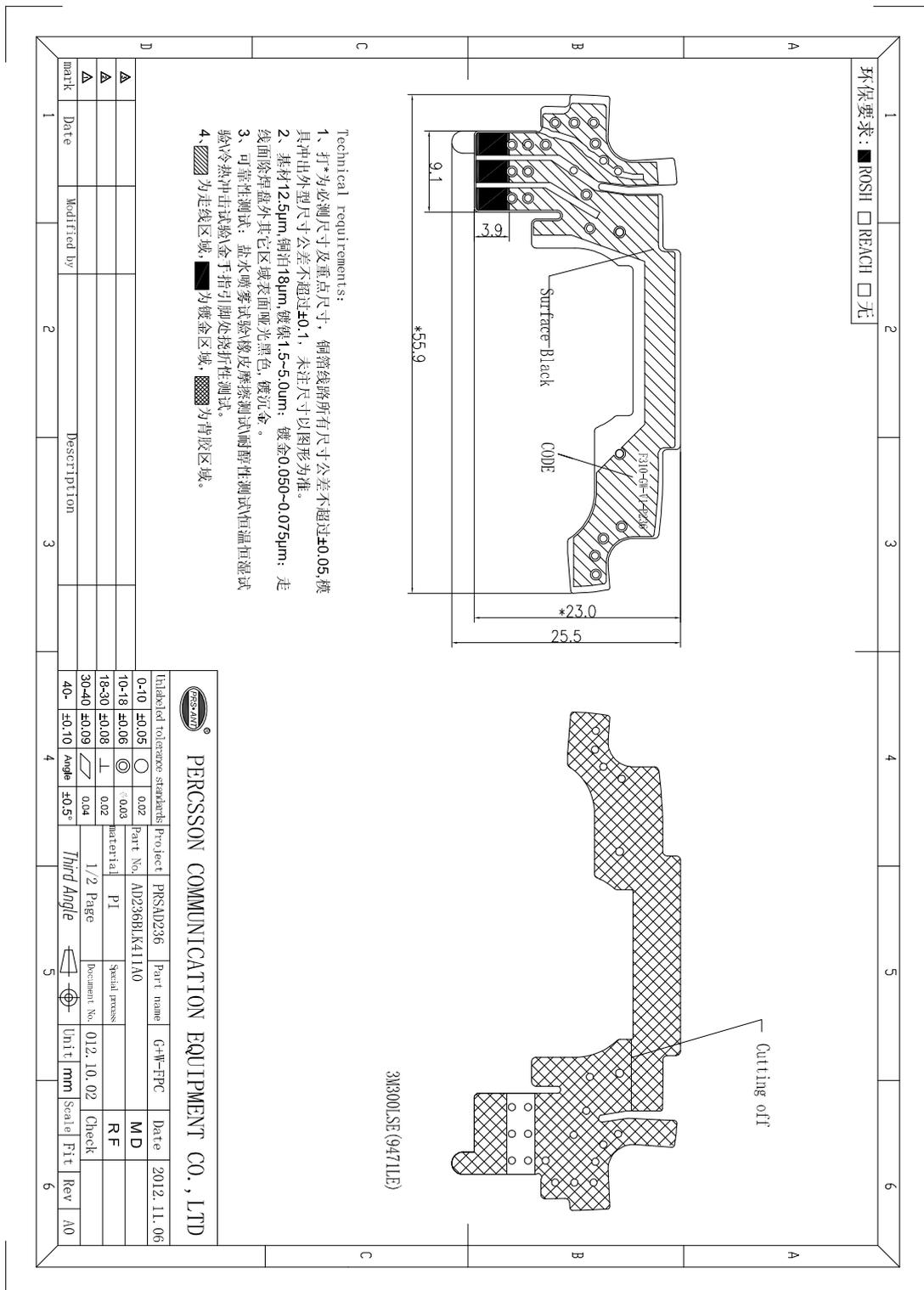
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3) .Product structure 2D drawing



4) Full-size test report

ZTE mobile sample size measurement report (Version:V1.0)												
suppliers		Percsson communication equipment co.,LTD			material			FPC		Drawing number		012.10.02
Part name		F310 RF antenna FPC			Measurement environment			QC		Drawing Version		A0
Part No.		ZX000AD236GWA			Surveyors			Qiao Dong		Mold No.		PRS.XC.PRSAD236
Item No.		AD236BLK411A0			Measuring time			2012.11.08		Tryout time		2012.11.01
Design size					Sample size					Treatmen advice		
NO.	Item	Specific ation	Size	Tolerance	1	2	3	Judgeme nt	Measurem ent tools	Supplier audit	ZTE audit	
1	①	Ordinary	23.0	±0.1	23.0	23.0	23.0	OK	Caliper			
2	②	Ordinary	55.9	±0.1	55.9	55.9	55.9	OK	Caliper			
3	③	Key	9.1	±0.1	9.1	9.1	9.1	OK	Caliper			
Prepared date:				check date:				Approve date:				

5) Process capability report (Key-size CPK report)

ZTE mobile sample process capability report (version:V1.0)							
suppliers	Percsson communication equipment co.,LTD		material	PI1812+3M300LSE	Drawing No.	012.10.03	
Part name	F310 RF antenna FPC		Measurement environment		Drawing version	A0	
Part No.	ZX000AD236GWA		Surveyors		Mold No.	PRS.XC.PRSAD236	
Item No.	AD236BLK411A0		Measuring time		Tryout time	2012.11.01	
Size item	1	2	3	4			
Design size							
Upper tolerance							
Lower tolerance							
Upper size							
Lower size							
Sample coding	Measured values	Measure d values	Measured values	Measured values	Measured values	Measured values	Measured values
1							
2							
3							
4							
MAX							
MIN							
T							
MEAN							
STDEV							
Cp							
Ca							
Cpk							
Prepared date:		check date:			Approve date:		

6) Product performance test report

1. Summary

This report summarizes the electrical results of the our antenna to support the project PRSAD236. The test fixture is made for further testing, which is show below:



2. General Description

2.1 Antenna Components/Part revisions

The antenna part number is T: A

2.2 Definitions

VSWR: Voltage Standing Wave Rate

TRP: total radiated power

TIS: total isotropic sensitivity

3. Electrical Performance

3.1 Specification

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Worst allowable in band values are presented. A setup according to should be used when testing these values.

3.1.1 VSWR(Test in free space)

Freq.	824	894	1850	1990
VSWR	≤ 3.6	≤ 2.1	≤ 2.7	≤ 1.8

3.2 Set-up

3.2.1 VSWR

The S11 parameter is performed using Angilent 8753D Network Analyzer and PRS's test fixture that is using customer-providing device. We use a 30cm long ferrite de-coupling sleeve to mitigate surface currents on the outside of the testing cable.

3.2.2 Matching Circuit Description

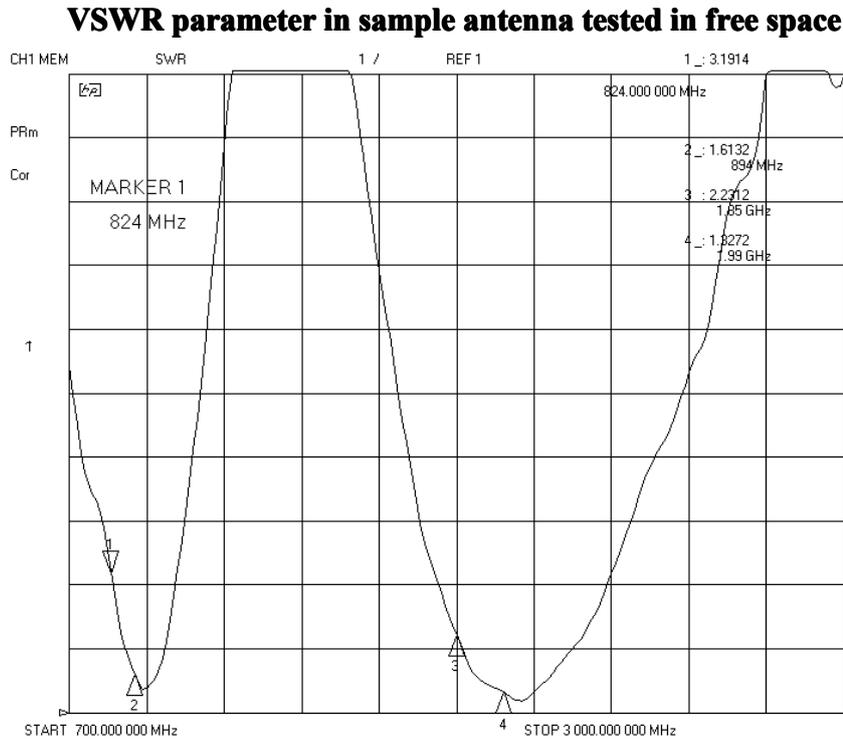
Original matching circuit

3.3 VSWR& R.L.(Test in free space)

Freq.(MHz)	824	894	1850	1990
VSWR	3.1	1.6	2.2	1.3
R.L.	-5.6	-12.6	-8.3	-17.0

4. Plots

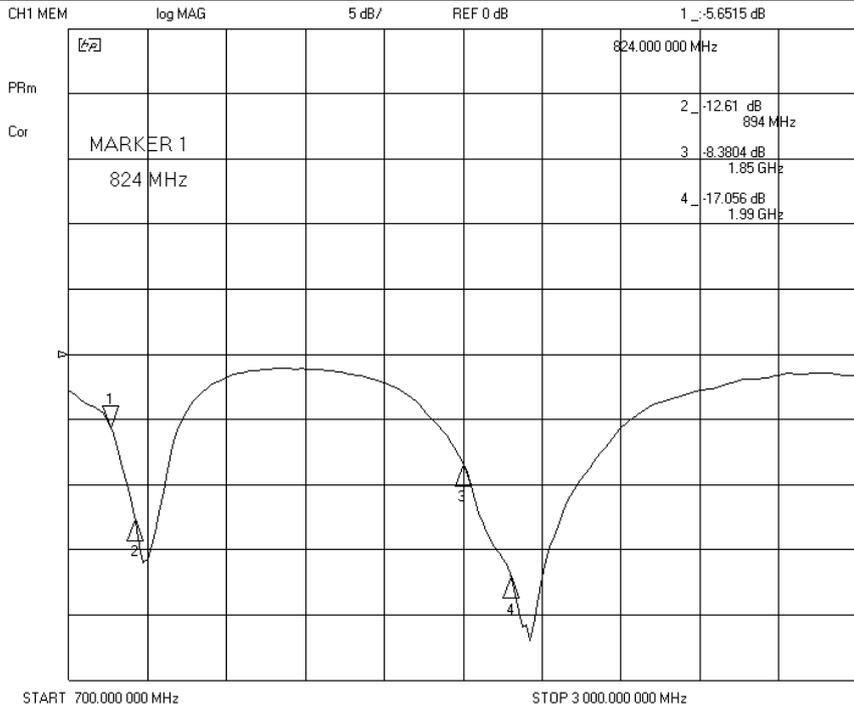
4.1 VSWR



4.2 Return Loss

S11 parameter in sample antenna tested in free space

Confidential Information



4.3 TRP&TIS test results

Measurement data:

PERCSSON ANT TRP&TIS parameter Summary of PRSAD236						
BAND	GSM850			PCS		
CHANNEL	128	189	251	512	661	810
TRP (dBm)	29.6	30.3	30.4	28.1	28.2	28.3
TIS (dBm)	-105.3	-105.2	-104.5	-104.3	-104.4	-103.3
BAND	WCDMA BAND V					
CHANNEL	4132	4183	4233	4357	4408	4458
TRP (dBm)	21.7	20.4	21.5			
TIS (dBm)				-107.7	-107.4	-107.0
BAND	WCDMA BADN II					
CHANNEL	9262	9400	9538	9662	9800	9938
TRP (dBm)	20.7	21.1	20.7			
TIS (dBm)				-107.2	-107.1	-106.5

4.3 Antenna Gain

Band	Gain(dBi)
GSM850MHz	0.7dBi
WCDMA850MHz	0.7dBi
PCS1900MHz	1dBi
WCDMA1900MHz	1dBi