福 州 捷 雷 电 子 科 技 有 限 公 司

Fuzhou JieLei Electronic Technology Co.,Ltd.

文档编码：FRKF-0007 版本：1.1

规 格 书

Specification

客 户 名 称：

CUSTOMER： 环汇科技（福建）有限公司

客 户 料 号：

CUSTOMER P/N:

客 户 品 名：

DESCRIPTION:

捷 雷 料 号：

P/N: C168-JL-3867

捷 雷品 名：

PART NO: NFC antenna；V1.4

核准	审核	编制
Frank	WenSen	Sean
2019.09.30	2019.09.30	2019.09.30

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版本描述

日期	批准	版本	描述
2020-06-05		V1.4	PCB 焊接线的焊盘由原来的 1.5*1.0 改为 2.7*1.5；焊盘之间用白油丝印隔离
2020-03-17		V1.3	线圈尺寸公差修正
2019-12-27		V1.2	增加 ROHS 资料
2019-10-24		V1.1	线径改为 0.4mm, PCB 背面增加双面胶
2019-09-30		V1.0	初版

1. Electrical Performance

A.Electrical Characteristics	
Frequency Range(MHz)	13.5±1.5MHz
B.Chip parameters	
frequency（MHz）	13.56
material	Enameled wire
diameter（mm）	Φ0.4
inductance（uH）	0.8±0.1
C.Environmental	
Operation Temperature	-30℃~65℃
Storage Temperature	-30℃~85℃

2. Measurement Setup

(1)Reflection coefficient Measurement:

(a)Instrument: Network Analyzer

(b)Setup:

（Ⅰ)Calibrate the Network Analyzer by one port calibration using Agilent calibration kits.

（Ⅱ)Connect the antenna under test to the Network Analyzer

(Ⅲ)Measure the S11 (reflection coefficient) shown in Fig.1

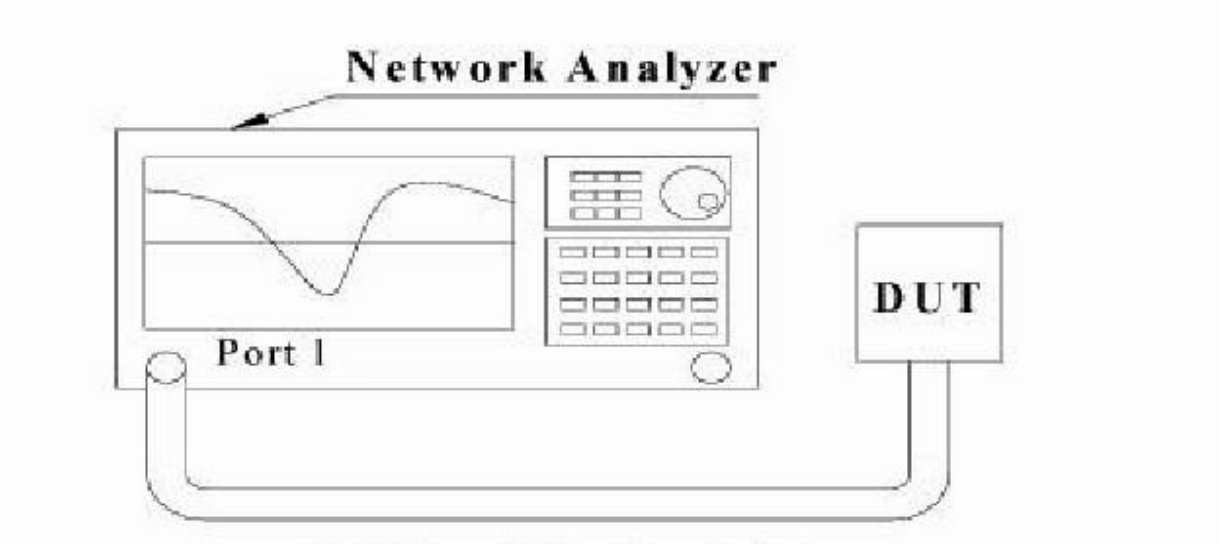

Fig.1 Measure S11 on Network Analyze

2.1 test equipment

Standing wave test equipment

VSWR was tested with an Agilent loss network analyzer E5071C. The subject is placed smoothly on a non-conductive material with a small dielectric constant, or suspended in the air.

Efficiency testing equipment

The efficiency test equipment was tested in a dark room set up by Terei Corporation. This includes active and passive testing of antenna 3D performance, as well as OTA performance tests (TRP&TIS) to CTIA standards. The external structure size of the anechoic chamber is 7m×5m×3 m (L×W×H), which can test antennas in the frequency range from 700MHz to 6GHz. When testing, the test to be tested is fixed on the turntable.

3. Mechanical Dimension Drawing