

SPECIFICATION

SHEET FOR APPROVAL

	CUSTOMER(客户名称)	GSD	
	CS P/N(客户机种)		
	PART NAME(品名)	WIFI Antenna	
	FREQUENCY(频率)	2400-2500MHz 5150-5850 MHz	
	GSD NO.(物料编号)	WC0D	
	DATE(日期)	2016-06-25	

CUSTOMER	
CHECKE	APPROVAL

Remark(备注):

Sign(客户确认签字盖章): _____

DESIGN	CHECK	APPROVAL
	邹一麟	赵烽

惠州高盛达科技有限公司

HUIZHOU GAOSHENGDA TECHNOLOGY CO.,LTD

ANTENNA SPECIFICATION

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1. General Description

Dbi	Decibel relative isotropic antenna
Tx	Transmit frequency
Rx	Receive frequency
VSWR	Voltage Standing Wave Ratio
GSM	Global Service for Mobile communication
DCS	Digital Communication System
PCS	Personal Communication System
PHS	Personal Handy-phone System
SAR	Specific Absorption Rate
PCB	Printed Circuit Board

2. Electrical Specifications

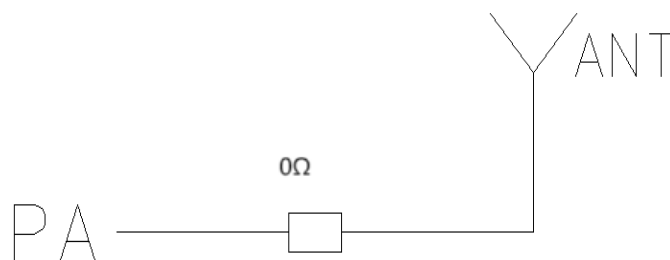
2-1 Set-up

2-1-1 Frequency Band

Frequency Band	Frequency
WIFI 2.4G	2400-2500MHZ
WIFI 5G	5150-5850MHZ

2-1-2 Impedance

Nominal Impedance(including matching circuit) : **50** ohms



2-1-3 Matching Requirements

The matching circuit on the PCB of the handset is according to Figure 1

Optimum matching circuit is highly dependent on the handset and thus.

Final matching circuit layout and values will be defined when handset is available.

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2-1-4 VSWR And GAIN

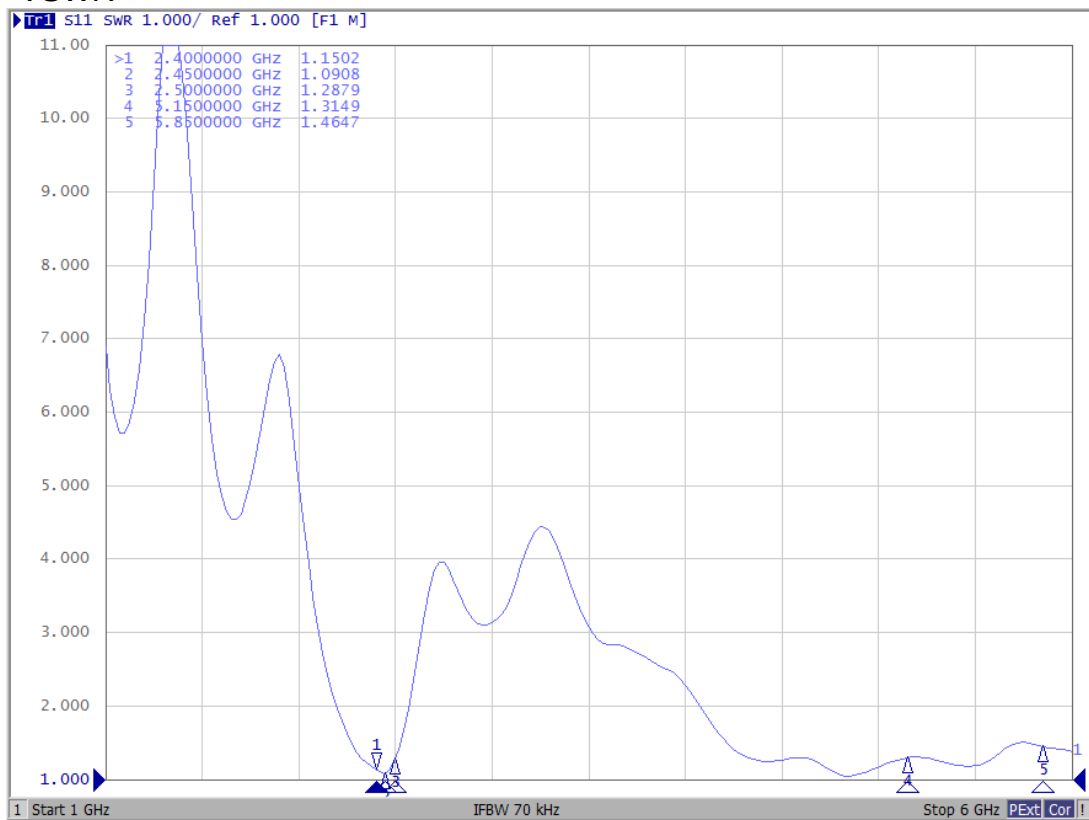
VSWR		GAIN	
Freq. Band	OPEN SPEC	Band Freq.	OPEN SPEC
2400MHz	≤ 2.0	2400MHz	$\geq -1.0\text{dBi}$
2500MHz	≤ 2.0	2500MHz	$\geq -1.0\text{dBi}$
5150MHz	≤ 2.0	5150MHz	$\geq -1.0\text{dBi}$
5850MHz	≤ 2.0	5850MHz	$\geq -1.0\text{dBi}$

※Measuring a 50 Ω test jig is connected to a network analyzer to measure the VSWR.

※※All test value is done in customer approval fixture.

2-2 Test Data

2-2-1 VSWR



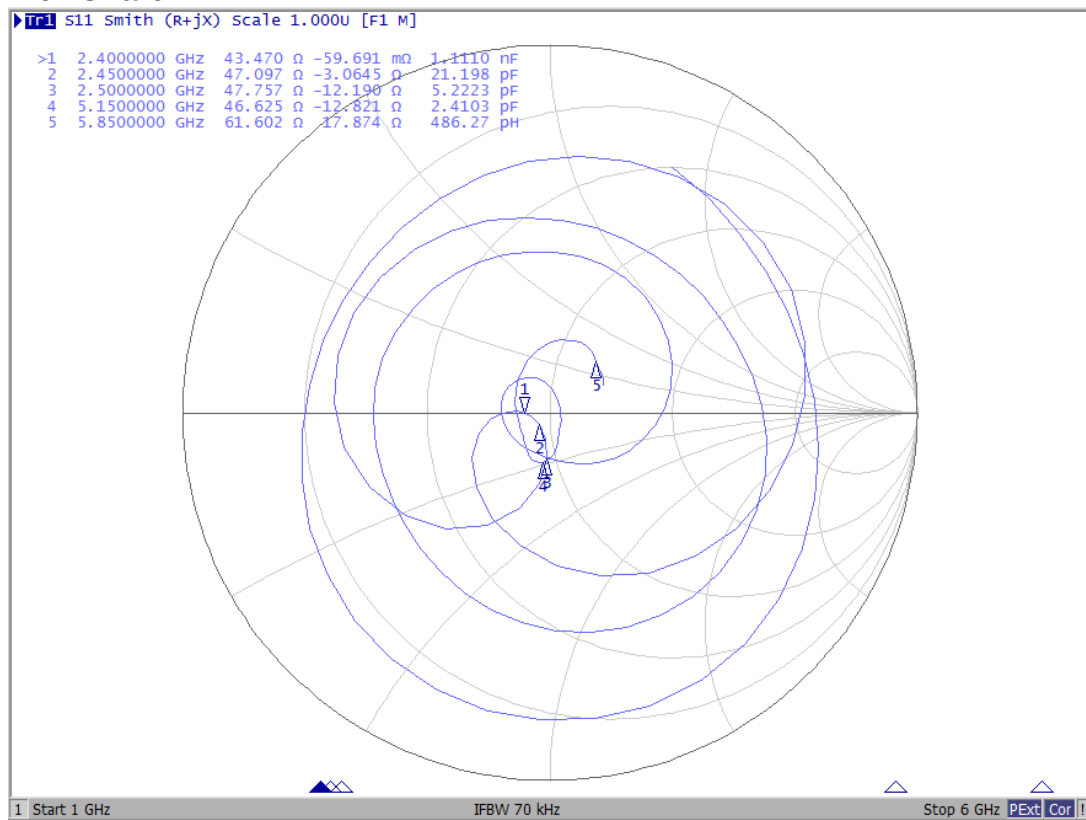
Model No:WC0D	File:
GSD NO:WC0D Antenna	Note: WIFI2.4G/5G
Sample No:yes	
Test Condition: Free Space	

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2-2-2 Smith Chart



2-2-3 GAIN Efficiency

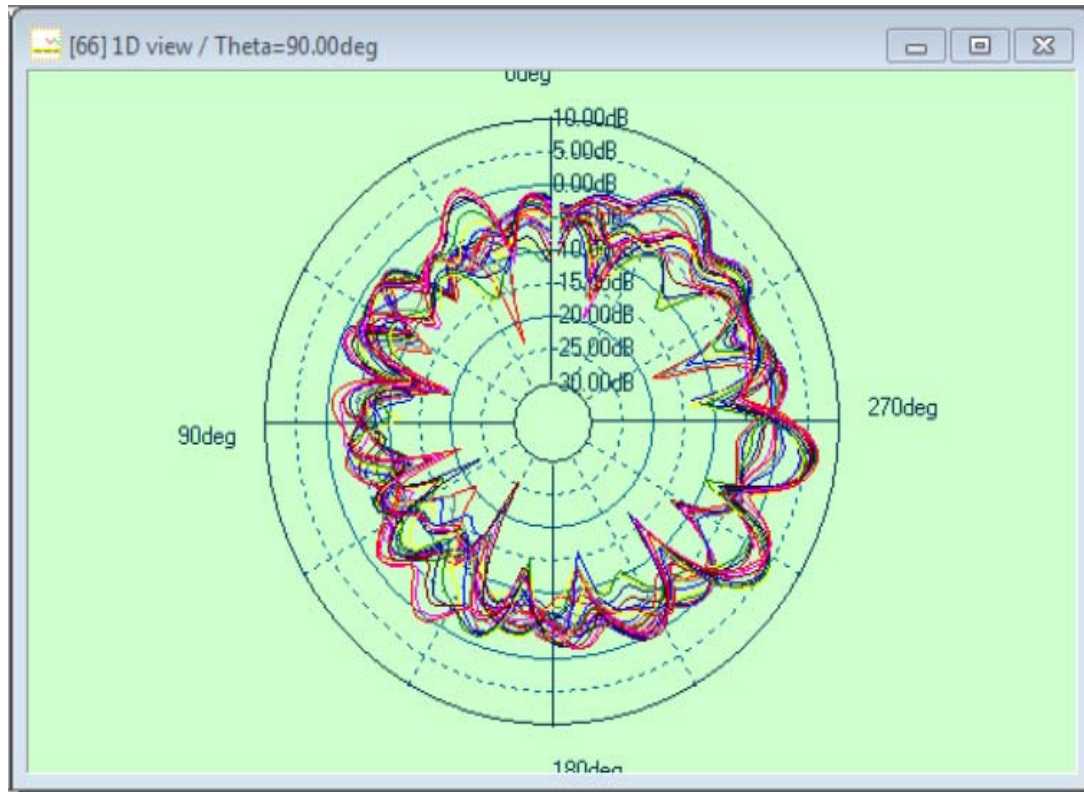
WIFI Gain:

	WIFI				
Frequency (MHz)	2400	2450	2500	5150	5850
Gain	1.42	1.72	1.65	2.34	2.57
Efficiency (dBi)	(44%)	(48%)	(45%)	(61%)	(66%)

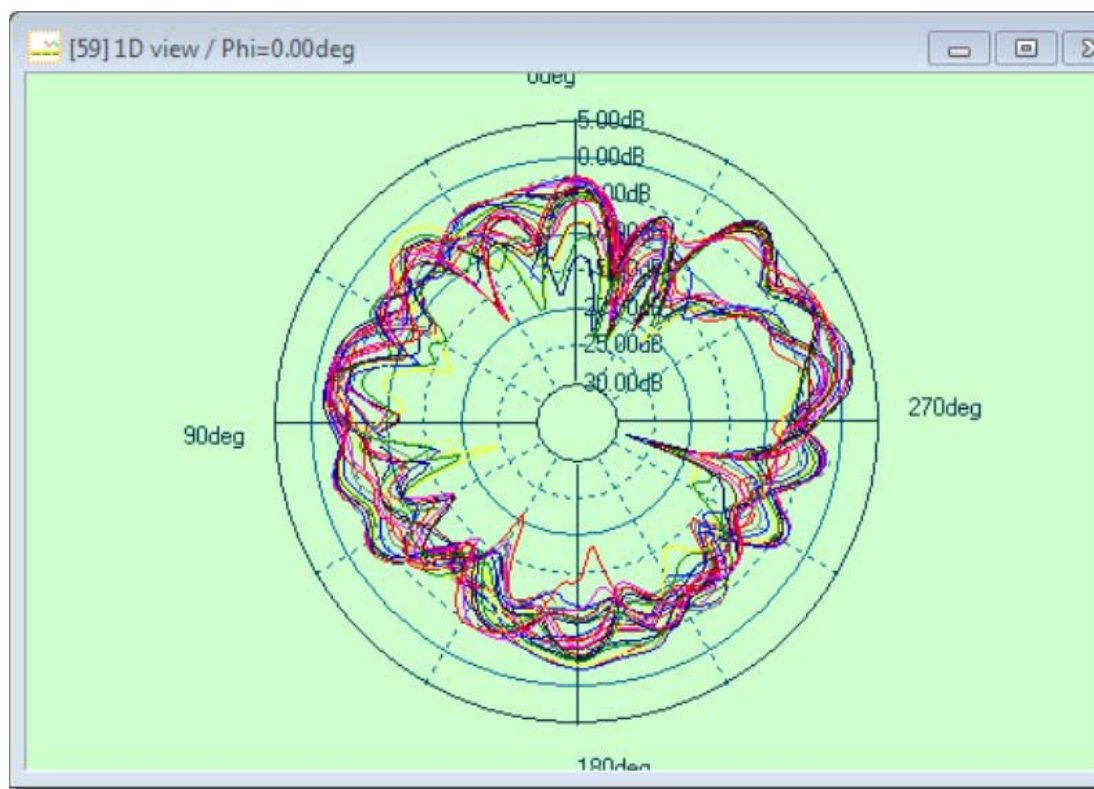
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2-2-4 The direction of figure

H

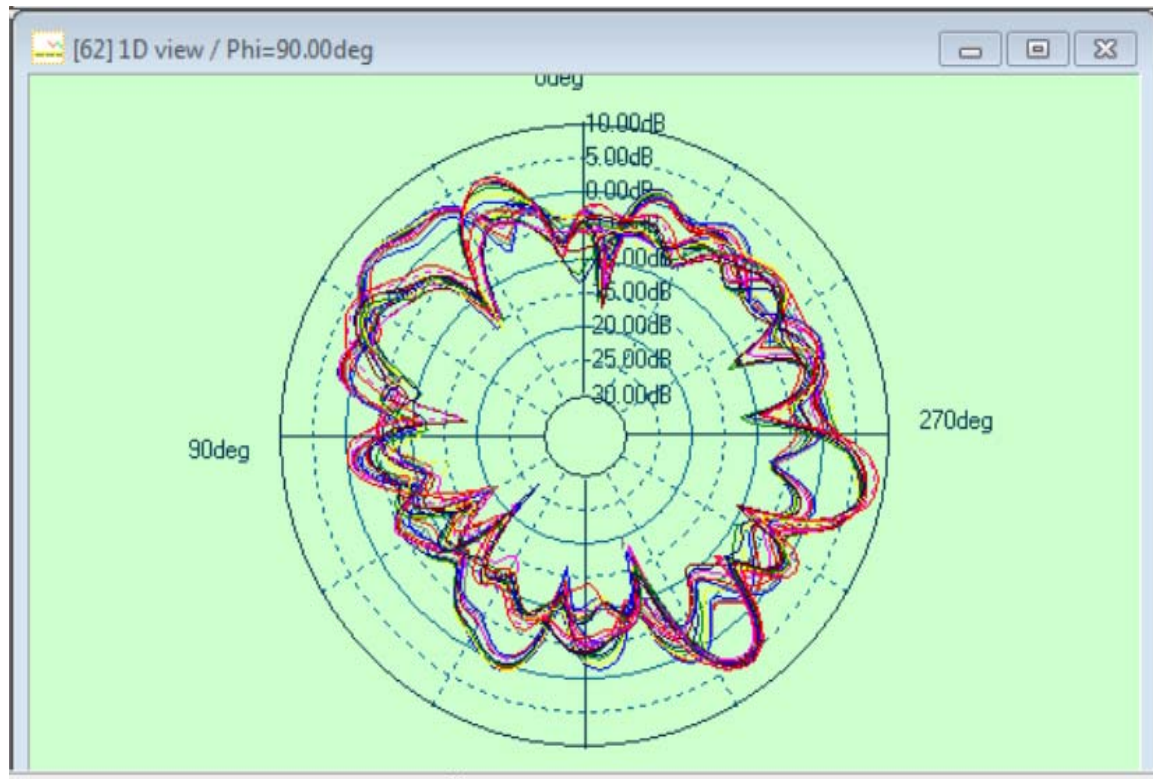


E1



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E2



2-2-5 Testing equipment

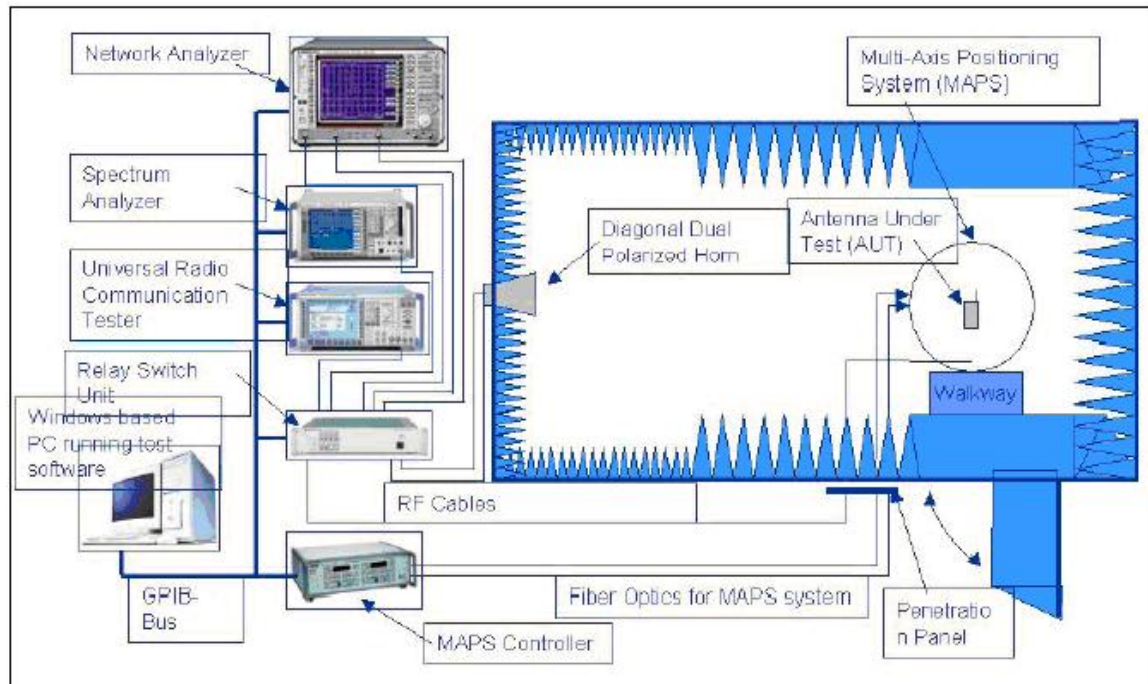


The company has the most advanced French Satimo SG24 OTA test system 1 set, EST OTA standard test system 2 sets, BlueTest reverberation darkroom 1 set, MicroPross NFC test system 1 set, which can quickly and stably provide customers with accurate test reports. Fully meet the CITA standards, support GSM/CDMA/WCDMA/TD/LTE/WIFI/BT/GPS/MIMO active passive test and so on various formats.



The MicroPross NFC system can meet the test requirements of individual operators, perform fast performance tests on NFC devices, and output formal certification test reports

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3. Mechanical Specification

3-1 Mechanical Configuration

3-1-1 Mechanical Configuration(WIFI2.4G/5G)

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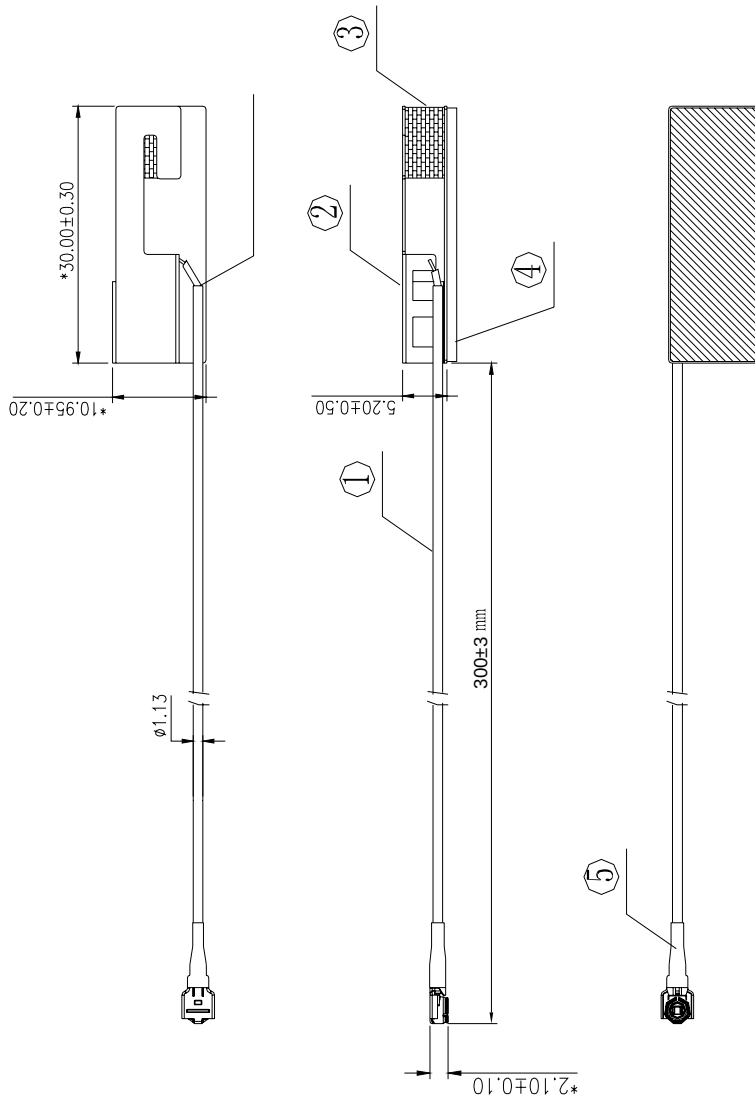
3-1-2 Mechanical Configuration(天线组件)

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版本	说明	审核	日期	批准	日期



材质说明:

序号	结构说明	材质	工 艺
①	RF同轴线	PEP (F46) 一代高仿端子	
②	WIFI弹片	SUS304 T=0.30mm	镀镍
③	支撑泡棉	防火EVA 3M 9495	通过UL-94
④	固定泡棉胶	泡棉胶 3M RP45	通过UL-746C
⑤	护套	黑色热缩套管	

未注明公差		制图	日期	材料	比例	数量	物料号
5 UND	±0.08	邓靖东	2016.0624	SS304 140, 20mm	1:1	2.00000630	
5-10	±0.10	剪须					
10-35	±0.12						
35-50	±0.15	审核					
50-100	±0.18						
100 OVE	±0.20	批准					
RcHs (PPM)							
Pd	≤100						
Cd	≤1000						
Pb	≤1000						
Cr6+	≤1000						
PBB	≤1000						
PBB#	≤1000						