

天线规格

Antenna Specifications Data Sheet

版本: A1

客 户

XYSTOMEF:

品 名 规 格

DESCRIPTION:

SMA-2.4G WIFI 5DBI 黑色天线

料 号

PART NO.:

WHM5

客 户 料 号

CUS PART NO.:

日 期

D A T E:

2020. 6. 13

呈样签章

工 程 ENGINEERING DEPARTMENT	品 保 Q C DEPARTMENT	业 务 SALES DEPARTMENT
汪大海	王笑	李太文

客户承认签章

工 程 ENGINEERING DEPARTMENT	品 保 Q C DEPARTMENT	采 购 PURCHASING DEPARTMENT

※ 客户确认样品附意栏:

电器技术参数			
电 性 能 指 标		Electrical Specifications	
频率范围	2400-2500MHZ	Frequency Range	2400-2500MHZ
电压驻波比	≤1.5	VSWR	≤1.5
增益	5DBI	GAIN	5.42 DBI
输入阻抗	50 Ω	Input Impedance	50 Ω
机 械 指 标		Mechanical Specifications	
天线颜色	黑色	Antenna Color	BLACK
接口形式	SMA	Input connector	SMA
线长度	100--2000mm	Cable length	100--2000mm
工作温度	-40℃~+85℃	Working Temperature	-40℃~+85℃
工作湿度	20~80%	Working Humidity	20~80%

产品图片

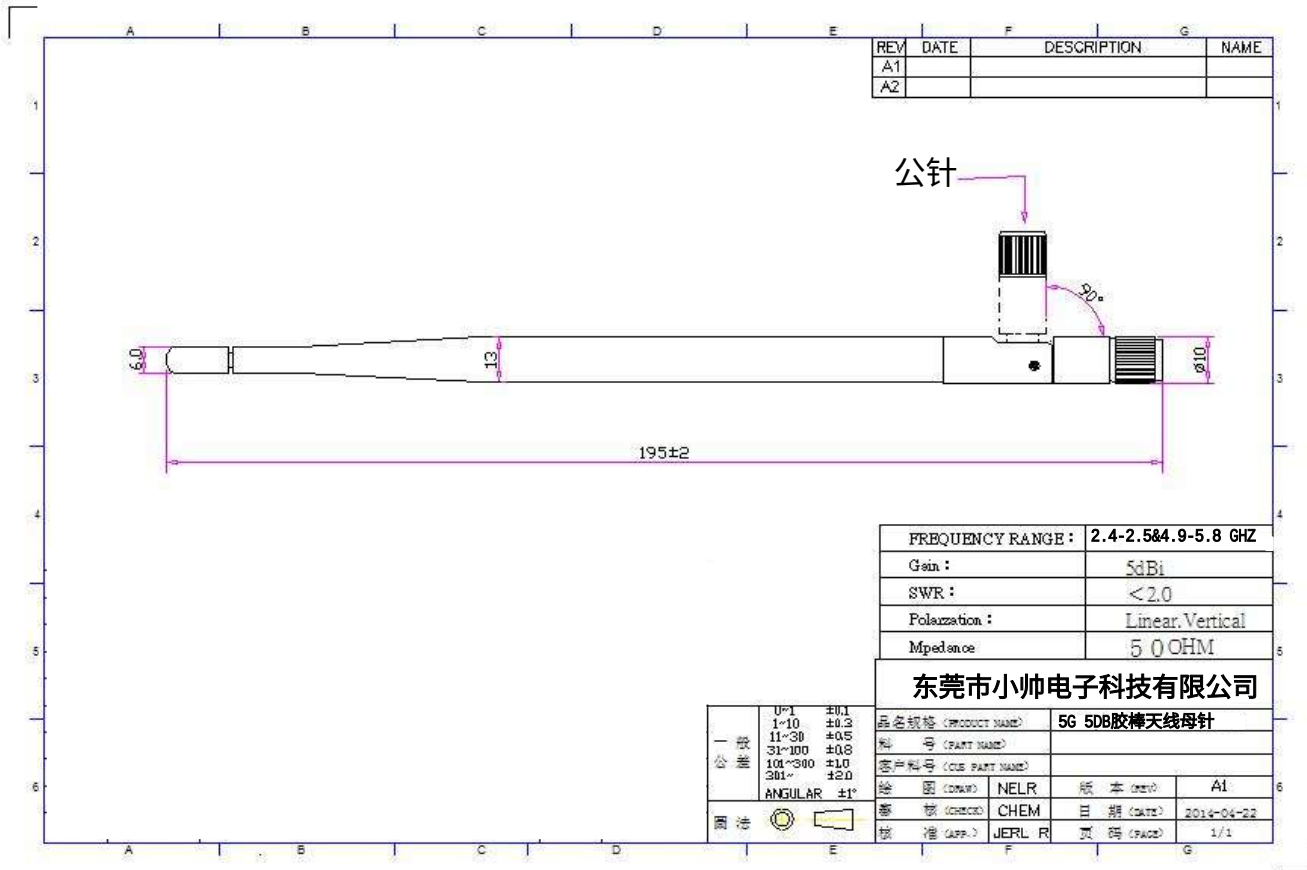


东莞市小帅电子科技有限公司

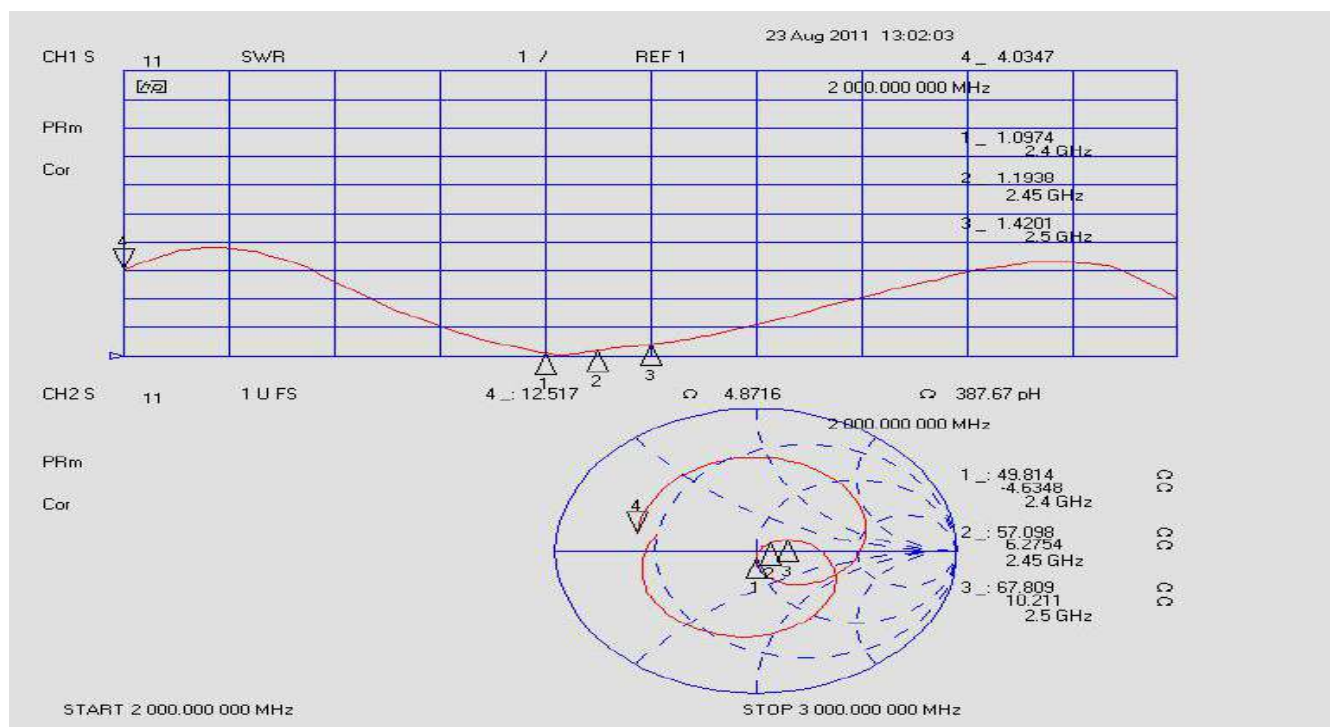
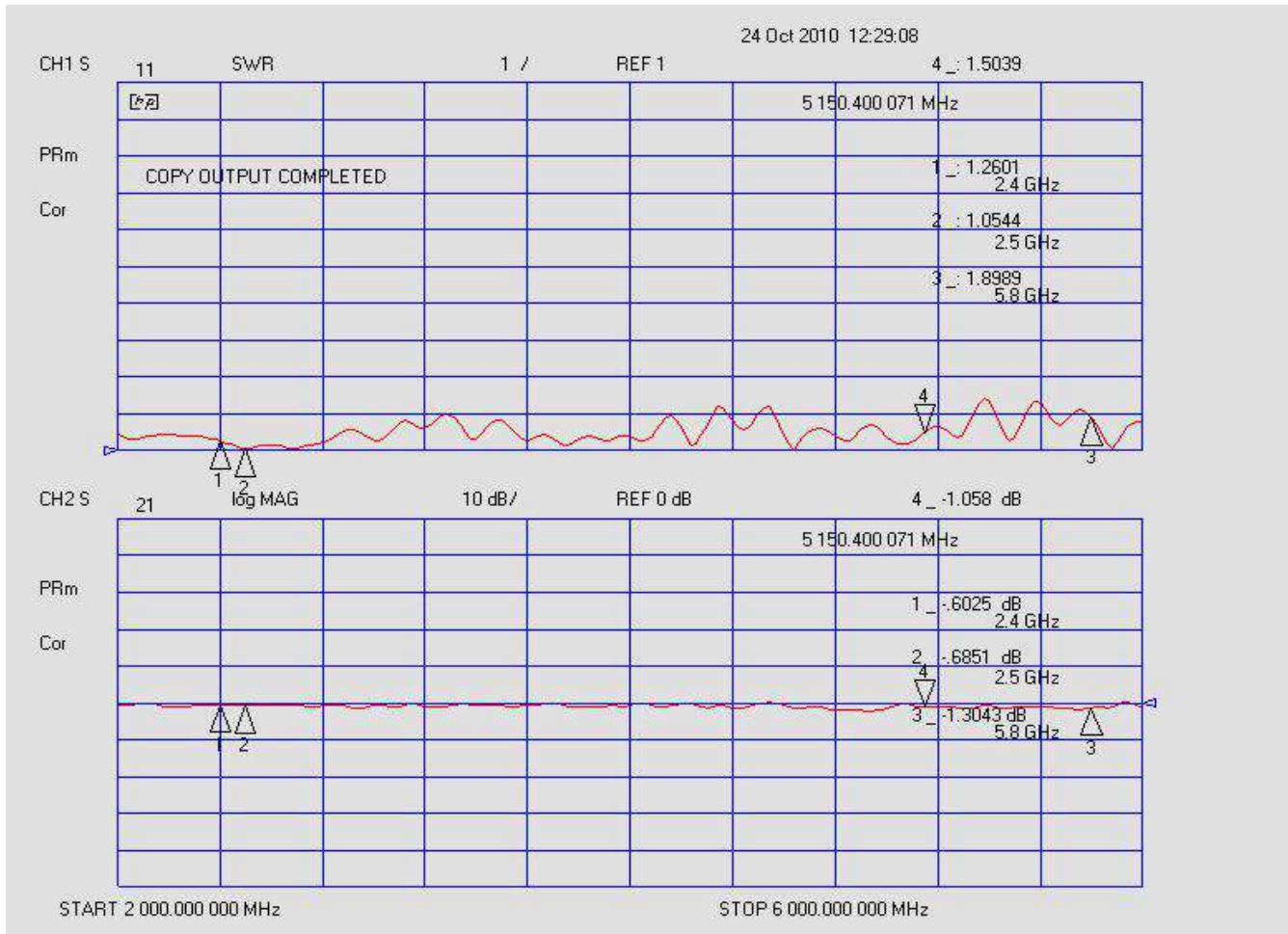
Dongguan Xiaoshuai Electronic Technology Co., Ltd

东莞市黄江镇星光村星湖工业园 7 栋 2 楼（光明交界）

2nd Floor, Building 7, Xinghu Industrial Park, Xingguang Village, Huangjiang Town, Dongguan, China



网分测试结果：



环境性能测试：

VSWR (驻波比)



S11 (回波损耗)



5-3.WIFI 天线增益/效率/3D 场型图

Frequency (MHz)	Efficiency (%)	Gain (dBi)
2400 MHz	73.3	4.6
2410 MHz	76.98	4.99
2420 MHz	80.08	5.3
2430 MHz	80.83	5.42
2440 MHz	77.86	5.22
2450 MHz	71.74	4.65
2460 MHz	75.88	4.6
2470 MHz	73.21	4.27
2480 MHz	65.98	3.73
2490 MHz	70.06	4.1
2500 MHz	69.83	4.09

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项目	测试条件	规格
储存环境	在没有指定的情况下测试温度、湿度、气压如下： 1. 温度为-30℃~+80℃ 2. 相对湿度为45%-85% 3. 气压为86kpa-106kpa	电气机械性能正常
高低温试验	在70℃与40℃之间进行5次循环，然后在正常条件下 1-2H，检查外观质量。	尺寸应满足规定并应 满足满足 于机械、电气性能
耐恒定湿热 试验	相对湿度95±3%，试验温度：40℃. 持续2H作用后， 试品取出后5min之内测定电气性能，试品在正常条 件下1-2H，检查外观质量	尺寸应满足规定并应 满足满足 于机械、电气性能
振动试验	振频范围10-55HZ，位移幅值：0.35MM，加速度幅值： 50.0M/S，扫频循环次数：30次	电气机械性能正常
跌落试验	1M高空按照互相垂直的轴方向自由跌落3次	电气机械性能正常

连接器参数：

SMA 连接器 BOM 表：

序号	名称	材料	镀层	数量
1	SMA 本体	黄铜, 镀金	D. L2Ni2/Au0.08	1
2	SMA 绝缘体 1	PTFE	-----	1
3	SMA 中心针	黄铜, 镀金	D. L2Ni2/Au0.1	1
4	SMA 分体	黄铜, 镀金	D. L2Ni2/Au0.08	1
5	SMA 护脚	TPEE	-----	1
6	红色防尘帽	PVC	-----	1

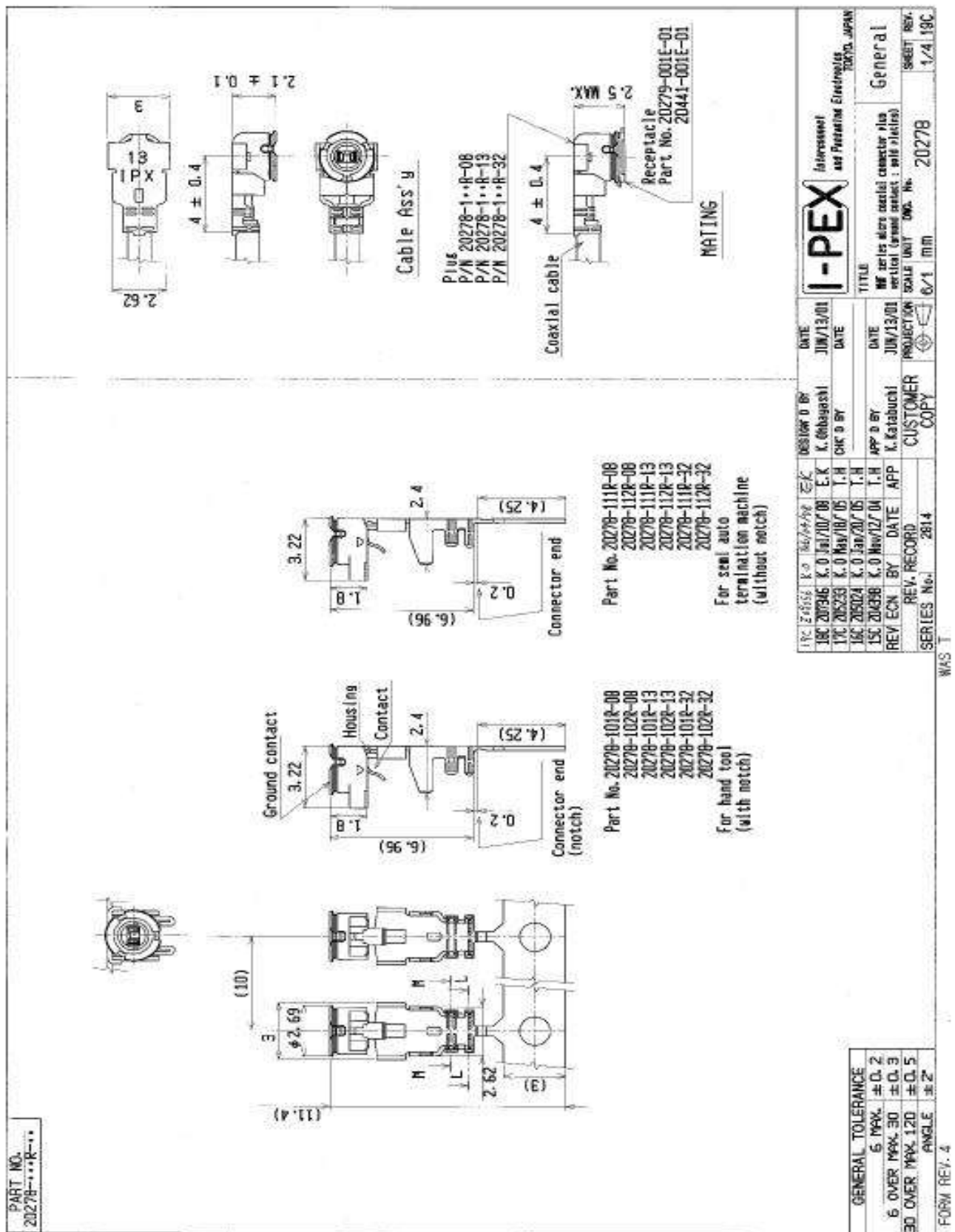
IPEX 连接器 BOM 表：

序号	名称	材料	镀层	数量
1	IPEX 外壳	黄铜, 镀金	D. L2Ni2/Au0.08	1
2	IPEX 绝缘体	PTFE	-----	1
3	IPEX 中心针	黄铜, 镀金	D. L2Ni2/Au0.1	1

2nd Floor, Building 7, Xinghu Industrial Park, Xingguang Village, Huangjiang Town, Dongguan, China

Material Data Sheet

MHF Connector



Part No. of non halogen free type	20278-101R-08	20278-111R-08	20278-101R-13	20278-111R-13	20278-101R-32	20278-111R-32	20278-101R-18	20278-111R-18
Part No. of halogen free type	20278-102R-08	20278-112R-08	20278-102R-13	20278-112R-13	20278-102R-32	20278-112R-32	20278-102R-18	20278-112R-18
Housing color	White	White	Black	Black	Black	Black	White	White
Applicable cable nominal dimension	2.09±0.1 1.25±0.1 1.16±0.1	2.09±0.1 1.25±0.1 1.16±0.1	2.09±0.1 1.25±0.1 1.16±0.1	2.09±0.1 1.25±0.1 1.16±0.1	2.09±0.1 1.25±0.1 1.16±0.1	2.09±0.1 1.25±0.1 1.16±0.1	2.09±0.1 1.25±0.1 1.16±0.1	2.09±0.1 1.25±0.1 1.16±0.1
Jacket	Dielectric core Outer conductor silver or tin Inner conductor silver plating	Dielectric core Outer conductor silver or tin Inner conductor silver plating	Dielectric core Outer conductor silver or tin Inner conductor silver plating	Dielectric core Outer conductor silver or tin Inner conductor silver plating	Dielectric core Outer conductor silver or tin Inner conductor silver plating	Dielectric core Outer conductor silver or tin Inner conductor silver plating	Dielectric core Outer conductor silver or tin Inner conductor silver plating	Dielectric core Outer conductor silver or tin Inner conductor silver plating
Cr Imp	CH-1 CH-2 CH-3	CH-1 CH-2 CH-3	CH-1 CH-2 CH-3	CH-1 CH-2 CH-3	CH-1 CH-2 CH-3	CH-1 CH-2 CH-3	CH-1 CH-2 CH-3	CH-1 CH-2 CH-3
Height	1.34~1.40 0.76~0.84 0.85~0.97	1.34~1.40 0.76~0.84 0.85~0.97	1.34~1.40 1.06~1.14 1.15~1.35	1.34~1.40 1.20~1.30 1.26~1.46	1.34~1.40 1.41~1.49 1.70~1.80	1.34~1.40 1.41~1.49 1.70~1.80	1.34~1.40 1.41~1.49 1.70~1.80	1.34~1.40 1.41~1.49 1.70~1.80
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Cable cut length

Crimp Height

Blade Micrometer

1-ft part

Outer conductor part

Jacket part

CH-1

CH-2

CH-3

CH-4

NOTE-1
中心導体、外部導体への半田コティングは不可
Must not use solder coated
Inner conductor and outer conductor.

I-PEX		Interconnect and Photocopy Envelope	
TITLE	MF series axial connector pin	General	SHEET REV.
REV. ECH BY	DATE	APP. D BY	DATE
REV. RECORD	2014	CUSTOMER	20278
SERIES No.	2014	INSPECTION	3/4 19C

FORM REV. 4

5-2 Unmating.

(1) In case of unmating by pulling tool.
Please use the pulling tool as the following drawing, and please pull plug to vertical direction as directly as possible.

(2) In case of unmating directly by hand.
Please catch the catching area of plug, and please pull plug to vertical direction as directly as possible.

5-3 Crimp over standards of outer conductor

Standards: Less than 10% from total numbers of outer conductor.
(Numbers of outer conductor's crimp over from outer conductor's barrel)

5-4 Caution about Heat shrinkage tubes
Please be careful not to melt housing when using heat shrinkage tubes.
It will become cause of open circuit.

6. This is 'Pb-free' connector.

5-1 Mating.

Please mate the connector straightly to vertical direction as much as possible, adjusting the mating axis of plug and receptacle.
As excessive slant angle mating may break the connector, please don't do it.

5-2 Connector assembly

(1) In case of mating by pulling tool.
Please use the pulling tool as the following drawing, and please pull plug to vertical direction as directly as possible.

(2) In case of mating directly by hand.
Please catch the catching area of plug, and please pull plug to vertical direction as directly as possible.

Notes

1. Material
(1) Housing : PBT, UL94V-0
(2) Contact
phosphor bronze
gold plating 0.1μm MIN.
over nickel 1.27μm MIN.
(3) Ground contact
phosphor bronze
gold plating 0.05μm MIN.
over nickel 1.27μm MIN.
2. Packing : reel
3. Mating partner part No.
: 20279-001E-01, 20441-001E-01
4. Permissible load of cable at mating

5. Suggestions for mating & unmating operation.

5-1 Mating.
Please mate the connector straightly to vertical direction as much as possible, adjusting the mating axis of plug and receptacle.
As excessive slant angle mating may break the connector, please don't do it.

5-2 Connector assembly
Plug and Receptacle of the cable connector should be mated as follows.
Please use the pulling tool as the following drawing, and please pull plug to vertical direction as directly as possible.
As excessive slant angle mating may break the connector, please don't do it.

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GENERAL TOLERANCE

6 MAX. ±0.2
6 OVER MAX. 30 ±0.3
30 OVER MAX. 120 ±0.5
ANGLE ±2°

DESIGN & DATE

DESIGN BY	DATE
CHK'D BY	DATE
APP'D BY	DATE

REV. RECORD

REV.	ECN	BY	DATE	APP.
1				

SERIES No.

2814

Customer Information

CUSTOMER:
COPY:
PROJECTION SCALE: UNIT: DIM:
TITLE:
I-PEX
Interconnect
for Automotive Electronics
TOKYO, JAPAN

Revision History

REV.	REV.	DATE	DESCRIPTION
1			