

 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013	 <b>ILAC-MRA</b>  <b>ACCREDITED</b>
	Measurement Date(s):	Aug 20-27, 2013		Report Revision No.:	Revision 1.0	
	FCC Rule Part(s):	47 CFR §15.249		FCC Test Firm Reg. No.:	714830	
	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1	

## DECLARATION OF COMPLIANCE - RF MEASUREMENT REPORT (FCC/IC)

<b>Test Lab Information</b>	<b>Name</b>	CELLTECH LABS INC.		
	<b>Address</b>	21-364 Lougheed Road, Kelowna, British Columbia V1X 7R8 Canada		
<b>Test Lab Registration No.(s)</b>	<b>FCC</b>	714830		
	<b>IC</b>	3874A-1		
<b>Applicant Information</b>	<b>Name</b>	Microlynx Systems Ltd.		
	<b>Address</b>	Suite 107, 1925 - 18 Ave NE Calgary, AB T2E 7T8 Canada		
<b>Standard(s) &amp; Procedure(s)</b>	<b>FCC</b>	47 CFR Part 15.249		
	<b>IC</b>	RSS-210 Issue 8; RSS-Gen Issue 3		
	<b>ANSI</b>	C63.4-2003		
<b>Device Classification(s)</b>	<b>FCC</b>	Low Power Communication Device (DXX)		
	<b>IC</b>	Low-power License-exempt Radiocommunication Device		
<b>Application Type(s)</b>	<b>FCC/IC</b>	TCB/CB Certification		
<b>Device Identifier(s)</b>	<b>FCC ID:</b>	L5M5033583		
	<b>IC:</b>	6364A-5033583		
<b>Device Model(s) Tested</b>	Testork Base Station 5033583			
<b>Test Sample Serial No.</b>	#124505			
<b>Transmit Frequency Band</b>	2400 – 2483.5 MHz			
<b>Transmit Frequency Range</b>	2405-2475 MHz			
<b>Max. RF Output Power (measured)</b>	91.96 dBuV/m@3m			
<b>Antenna Type(s) Tested</b>	Whip = 2.5 dBi, Patch = 4.0 dBi			
<b>Power Source(s) Tested</b>	45Ah Lithium DC Cell			
<p>This wireless device has demonstrated compliance with the applicable technical standards as indicated in the measurement report and was tested in accordance with the measurement procedures specified in FCC 47 CFR Part 15.249; Industry Canada RSS-210 Issue 8 and RSS-Gen Issue 3; and ANSI C63.4-2003.</p>				
<p>I attest to the accuracy of data. All measurements were performed by me or were made under my supervision and are correct to the best of my knowledge and belief. I assume full responsibility for the completeness of these measurements and vouch for the qualifications of all persons taking them.</p>				
<p>The results and statements contained in this report pertain only to the device(s) evaluated.</p>				
<p>This report shall not be reproduced partially or in full without the prior written approval of Celltech Labs Inc.</p>				
<b>Test Report Approved By</b>		Glen Westwell	Laboratory Manager	Celltech Labs Inc.

 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013
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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

## TEST SUMMARY

Referenced Standard(s):		FCC CFR Title 47 Part 15 Subpart C				
Section	Description of Test	Procedure Reference	Limit Reference	Test Start	Test End	Result
8	Field Strength of Intentional Radiators, Band Edge & Restricted Band Emissions	ANSI C63.4-2003	15.249(a)(d)	Aug 20	Aug 27	Pass
9	Radiated Spurious Emissions	ANSI C63.4-2003	15.205,15.209	Aug 20	Aug 27	Pass
10	Antenna Requirements	n/a	15.203	n/a	n/a	Pass

Referenced Standard(s):		Industry Canada RSS-210 Issue 8				
Appendix	Description of Test	Procedure Reference	Limit Reference	Test Start	Test End	Result
8	Field Strength of Intentional Radiators, Band Edge & Restricted Band Emissions	ANSI C63.4-2003	RSS-210 A8.2(a)	Aug 20	Aug 27	Pass
9	Radiated Spurious Emissions	ANSI C63.4-2003	RSS-210 A8.2(a)	Aug 20	Aug 27	Pass
10	Antenna Requirements	n/a	15.203	n/a	n/a	Pass

## REVISION LOG

Revision	Description	Implemented By	Issue Date
1.0	Initial Release	Glen Westwell	8/30/2013

## SIGNATORIES

Prepared By	Glen Westwell Lab Manager	Reviewed By	Mike Meaker Engineering Technologist	Date
				8/30/2013

 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013
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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

## 1.0 SCOPE

This report outlines the measurements made and results collected during electromagnetic emissions testing of Microlynx Systems Ltd. Testork Base Station 5033583. The measurement results were applied against the applicable FCC requirements and limits outlined in the technical rules and regulations set forth in the Federal Communication's Commission Code of Federal Regulations Title 47 Part 15 Subpart C and Industry Canada Radio Standards Specification RSS-210 Issue 8 and RSS-Gen Issue 3.

## 2.0 REFERENCES

## 2.1 Normative References

ANSI/ISO 17025:2005	General Requirements for competence of testing and calibration laboratories
IEEE/ANSI C63.4-2003	Methods of Measurement of Radio-Noise Emissions from Low-Voltage Electrical and Electronic Equipment in the Range of 9 kHz to 40 GHz
CFR Title 47 Part 15C	Code of Federal Regulations Title 47: Telecommunication Part 15C: Intentional Radiators
IC Spectrum Management & Telecommunications Policy	Radio Standards Specification RSS-210 Issue 8 - Low-Power License-Exempt Radiocommunication Devices (All Frequency Bands): Category I Equipment RSS-Gen Issue 3 - General Requirements and Information for the Certification of Radiocommunication Equipment

### **3.0 PASS/FAIL CRITERIA**

Unless otherwise noted in the Appendices, the pass/fail criteria is the limit set forth in the reference standards. The DUT is considered to have passed the requirements if the data collected during the described measurement procedure is no greater than the specified limits as defined. The pass/fail statements made in this report only apply to the unit tested.

 <b>Celltech</b> Testing and Engineering Services Ltd.	Test Report Serial No.:	082913L5M-T1246-E15	Report Issue Date:	8/30/2013	 <b>ILAC-MRA</b> <b>ACCREDITED</b>
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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

#### **4.0 FACILITIES AND ACCREDITATIONS**

The facilities used in collecting the test results outlined in this report are located at 21-364 Lougheed Road, Kelowna, British Columbia, Canada V1X 7R8. The radiated emissions site conforms to the requirements set forth in ANSI C63.4 and is filed and listed with the FCC under Test Firm Registration Number 714830 and Industry Canada under Test Site File Number IC 3874A-1.

#### **5.0 GENERAL INFORMATION**

##### **5.1 Applicant Information**

<b>Company Name</b>	<b>MICROLYNX SYSTEMS LTD.</b>
<b>Address</b>	#107, 1925 – 18 Ave. NE Calgary, AB T2E 7T8

##### **5.2 DUT Description**

<b>Device (DUT)</b>	2.4GHz Testork Base Station Transmitter 5033583.	
<b>Device Model(s) Tested</b>	Testork Base Station 5033583	
<b>Test Sample Serial No.(s)</b>	None.	
<b>Device Identifier(s)</b>	<b>FCC ID:</b>	L5M5033583
	<b>IC:</b>	6364A-5033583
<b>Power Source(s) Tested</b>	Laptop USB port.	
<b>Antenna Type(s) Tested</b>	Whip = 2.5 dBi Patch = 4.0 dBi	

##### **5.3 Mode(s) of Operation Tested**

<b>Transmit Frequency Range</b>	2405.0 – 2475.0 MHz
<b>Transmitter Test Frequency(s)</b>	2405, 2425, 2475 MHz
<b>Transmitter Test Mode(s)</b>	Continuous CW, Continuous Modulated

##### **5.4 Modification(s)**

The EUT was configured for continuous transmit (worst case).

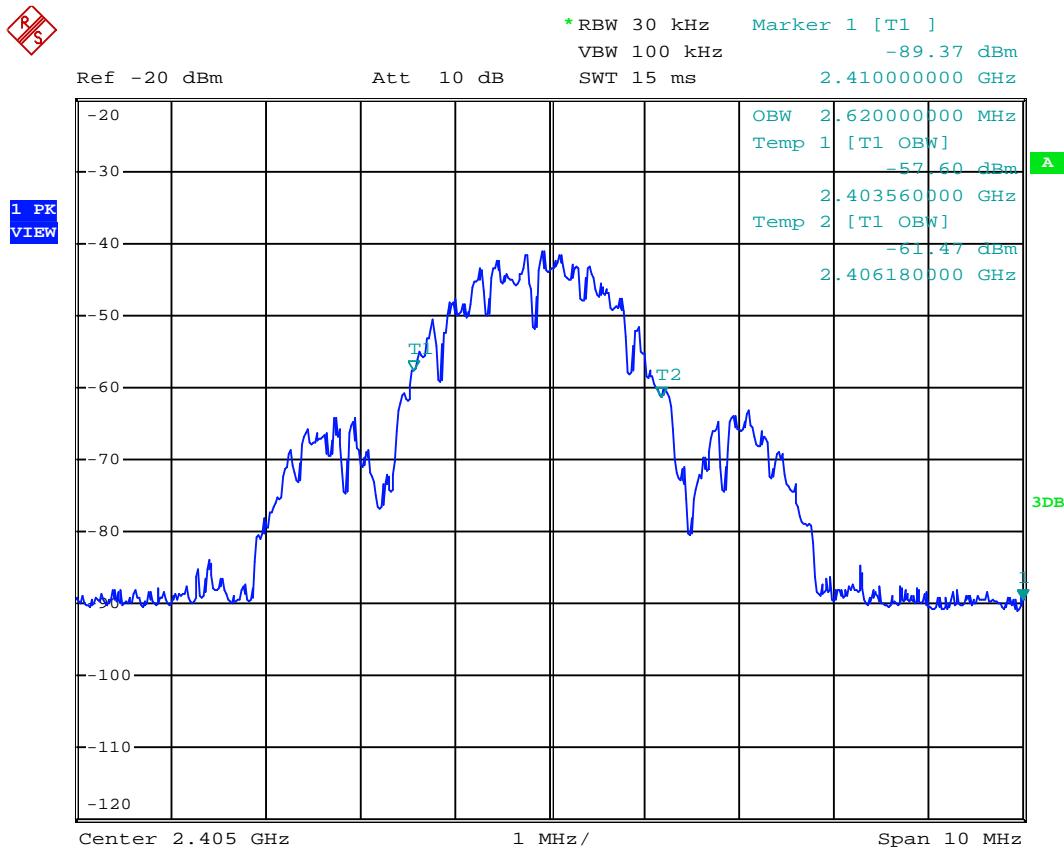
<b>Applicant:</b>	Microlynx	<b>Model:</b>	Testork BS 5033583	<b>FCC ID:</b>	L5M5033583	<b>IC:</b>	6364A-5033583	
<b>DUT :</b>	Testork Base Station 5033583, 2.4GHz Transmitter							
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 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013	 <b>ILAC-MRA</b>  <b>ACREDITED</b>
	Measurement Date(s):	Aug 20-27, 2013		Report Revision No.:	Revision 1.0	
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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1	

## 6.0 99% OCCUPIED BANDWIDTH = 2.62 MHZ

## Testork Base Station

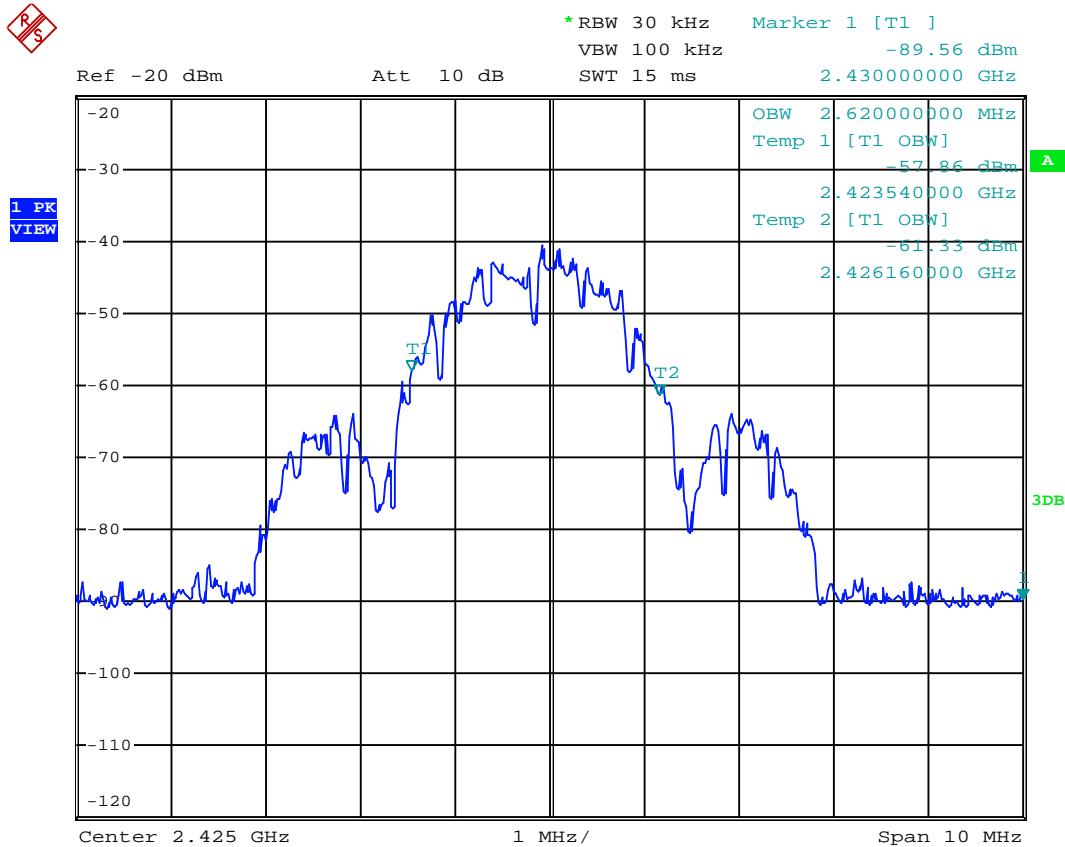
## Bottom Channel



Date: 22.AUG.2013 18:50:00

 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013	 <b>ILAC-MRA</b>  <b>ACREDITED</b>
	Measurement Date(s):	Aug 20-27, 2013		Report Revision No.:	Revision 1.0	
	FCC Rule Part(s):	47 CFR §15.249		FCC Test Firm Reg. No.:	714830	
	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1	

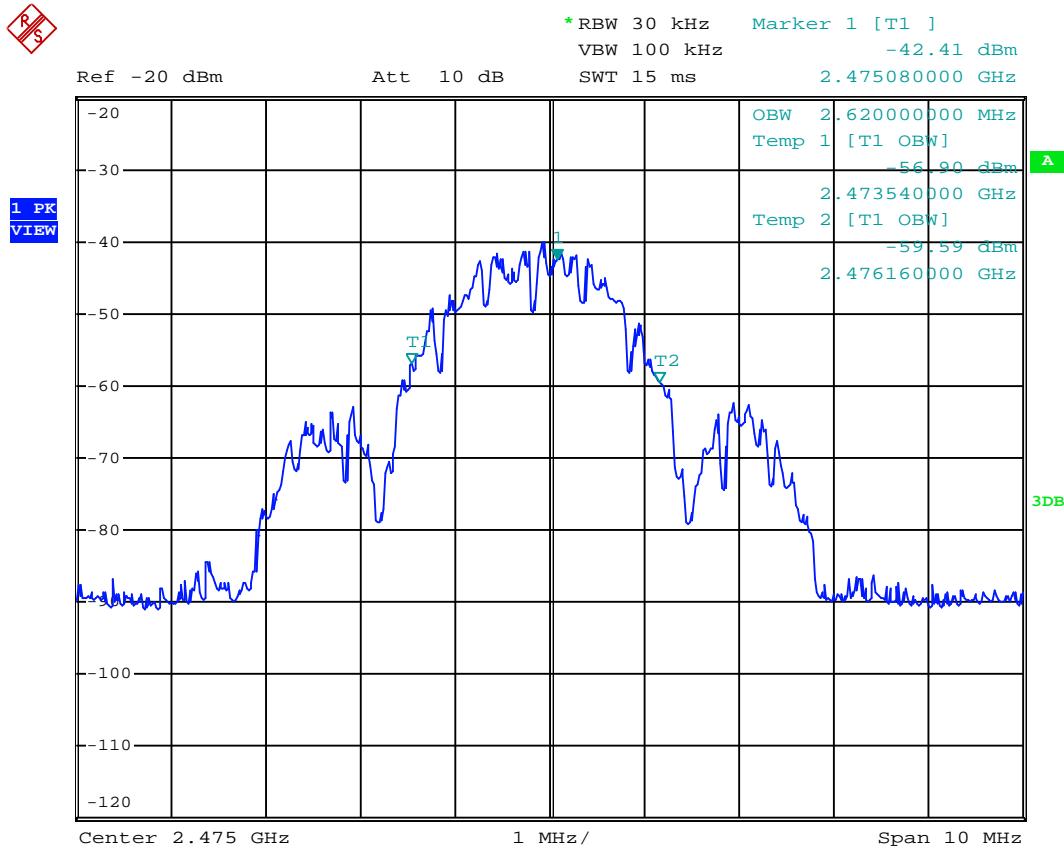
## Mid Channel



Date: 22.AUG.2013 18:47:54

 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013
	Measurement Date(s):	Aug 20-27, 2013		Report Revision No.:	Revision 1.0
	FCC Rule Part(s):	47 CFR §15.249		FCC Test Firm Reg. No.:	714830
	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

## Top Channel

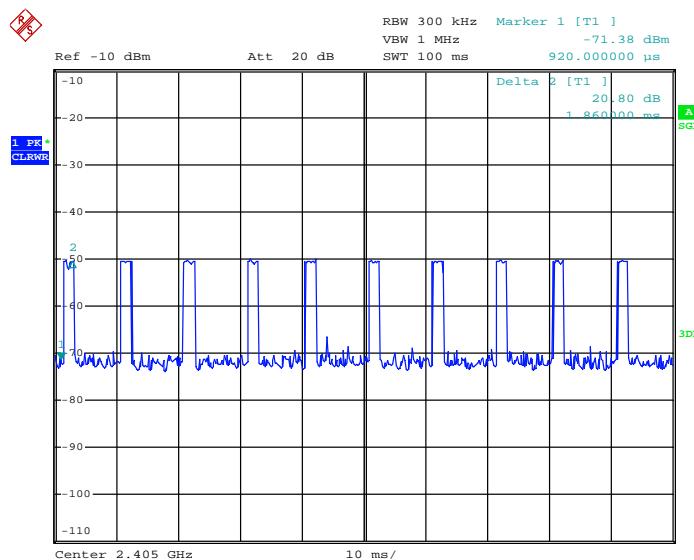


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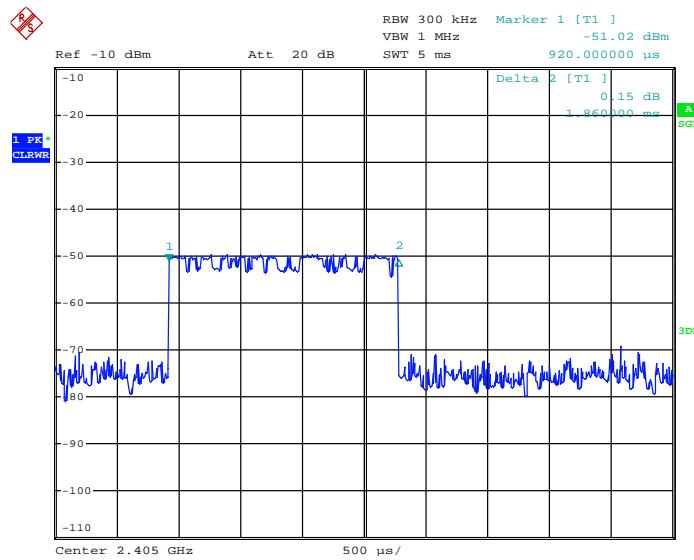
 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013	 <b>ILAC-MRA</b>  <b>ACREDITED</b>
	Measurement Date(s):	Aug 20-27, 2013		Report Revision No.:	Revision 1.0	
	FCC Rule Part(s):	47 CFR §15.249		FCC Test Firm Reg. No.:	714830	
	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1	

## **7.0 DUTY CYCLE CORRECTION FACTOR.**

Measured Duty Cycle = 18.6mS/100mS (-7.3 dB)  
Manufacturers declared max. duty cycle = 20mS/100mS (-7.0 dB)



Date: 13.AUG.2013 20:13:49



Date: 13.AUG.2013 20:12:01

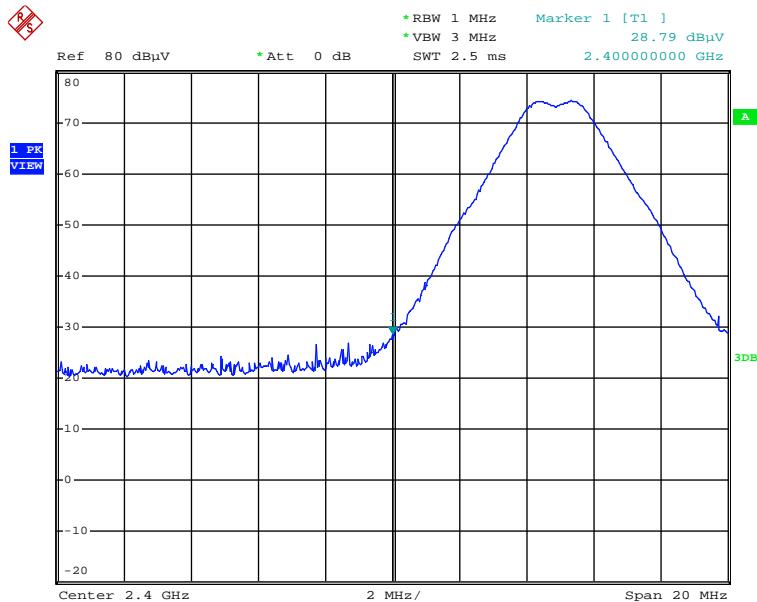




 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013
	Measurement Date(s):	Aug 20-27, 2013		Report Revision No.:	Revision 1.0
	FCC Rule Part(s):	47 CFR §15.249		FCC Test Firm Reg. No.:	714830
	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

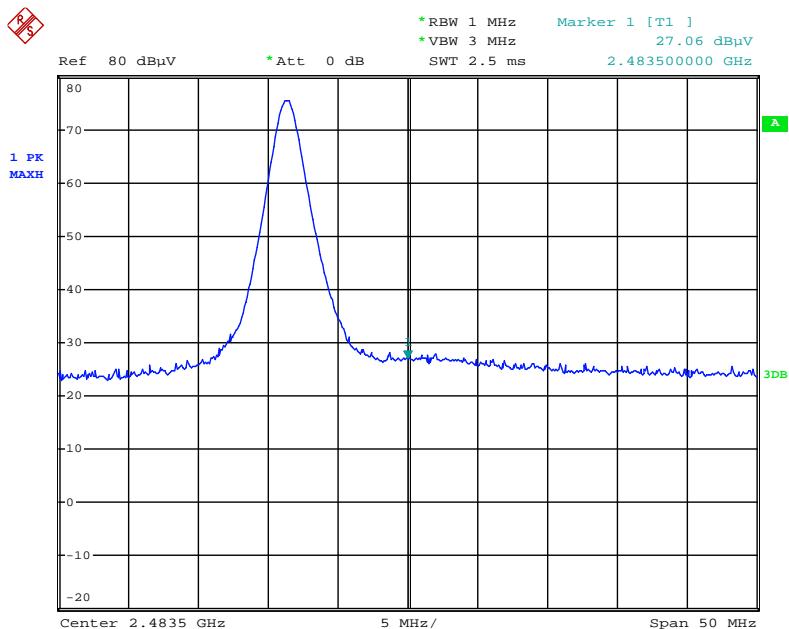
## Band Edge Plots

## LBE -2.400 GHz



Date: 22.AUG.2013 16:23:49

## UBE -2.4835 GHz

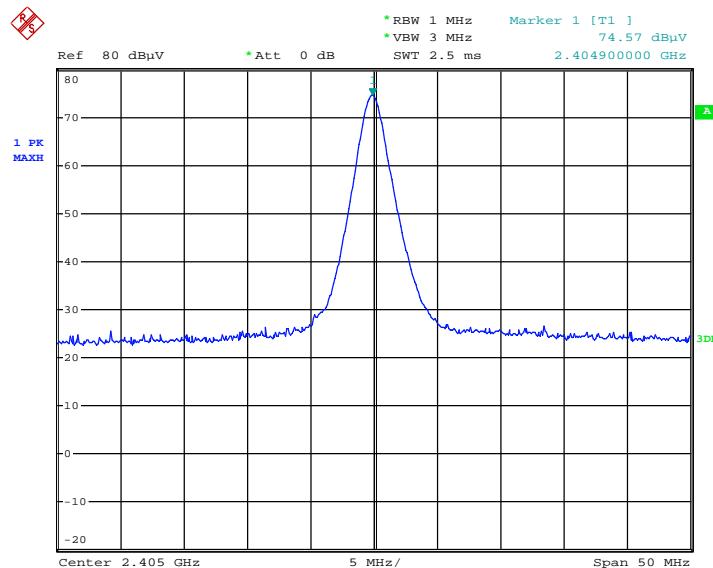


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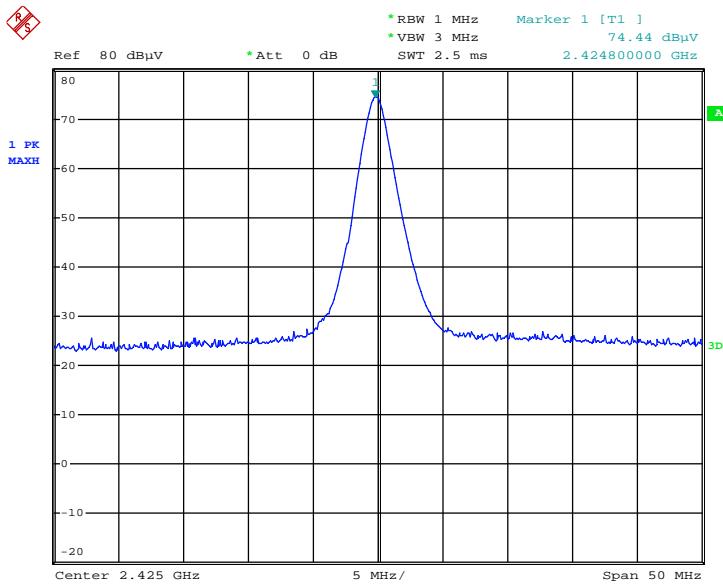
 <b>Celltech</b> Testing and Engineering Services Ltd.	Test Report Serial No.:	082913L5M-T1246-E15	Report Issue Date:	8/30/2013	 <b>ILAC-MRA</b>  <b>ACCREDITED</b>
	Measurement Date(s):	Aug 20-27, 2013	Report Revision No.:	Revision 1.0	
	FCC Rule Part(s):	47 CFR §15.249	FCC Test Firm Reg. No.:	714830	
	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

### TX Peak Power (worst case)

TX Peak Power – worst case



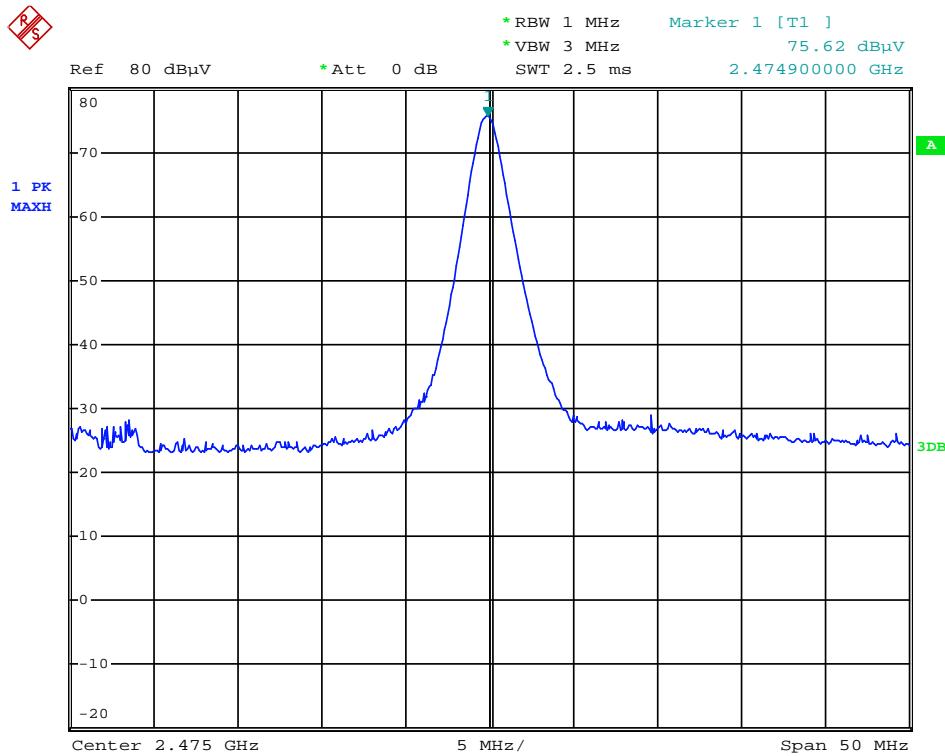
Date: 22.AUG.2013 13:47:18



Date: 22.AUG.2013 13:38:51

Applicant:	Microlynx	Model:	Testork BS 5033583	FCC ID:	L5M5033583	IC:	6364A-5033583	 <b>microlynx</b> ACTIVELY INNOVATING
DUT :	Testork Base Station 5033583, 2.4GHz Transmitter							
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	FCC Rule Part(s):	47 CFR §15.249	FCC Test Firm Reg. No.:	714830
	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:



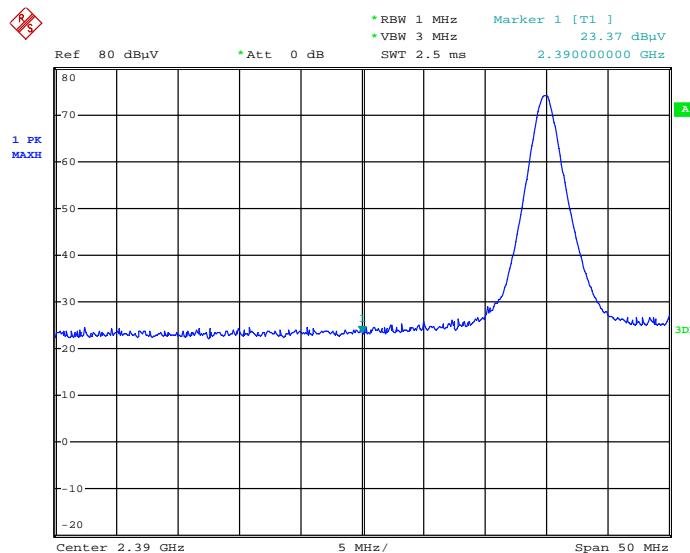
Date: 22.AUG.2013 16:29:26

 <b>Celltech</b> <small>Testing and Engineering Services Ltd</small>	Test Report Serial No.:	082913L5M-T1246-E15	Report Issue Date:	8/30/2013
	Measurement Date(s):	Aug 20-27, 2013	Report Revision No.:	Revision 1.0
	FCC Rule Part(s):	47 CFR §15.249	FCC Test Firm Reg. No.:	714830
	IC Standard(s):	RSS-210 RSS-Gen	IC Test Site No.:	IC 3874A-1



## Restricted Band

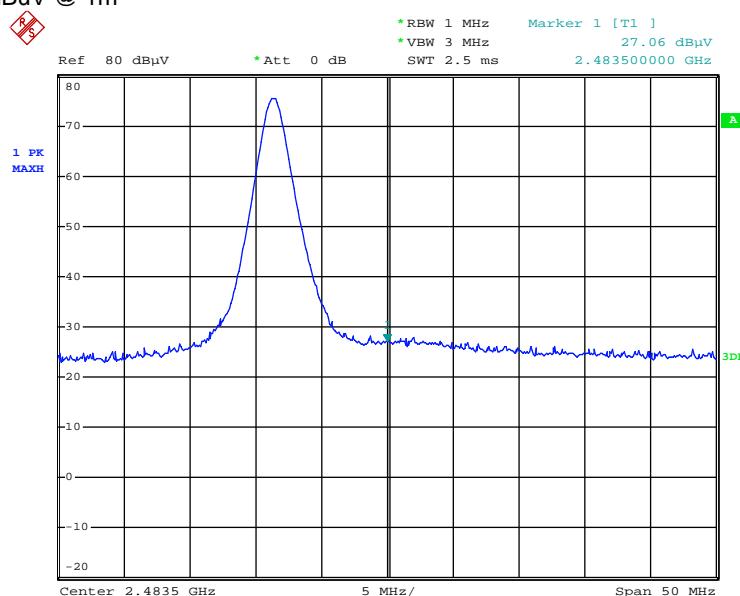
Peak emission = 26.3dBuV @ 1m



Date: 22.AUG.2013 16:57:23

## Restricted Band

Peak emission = 24.86dBuV @ 1m



Date: 22.AUG.2013 16:31:20

Applicant:	Microlynx	Model:	Testork BS 5033583	FCC ID:	L5M5033583	IC:	6364A-5033583	 <small>MICROLYNX MICROLYNX is a registered trademark of Microlynx Inc.</small>
DUT :	Testork Base Station 5033583, 2.4GHz Transmitter							
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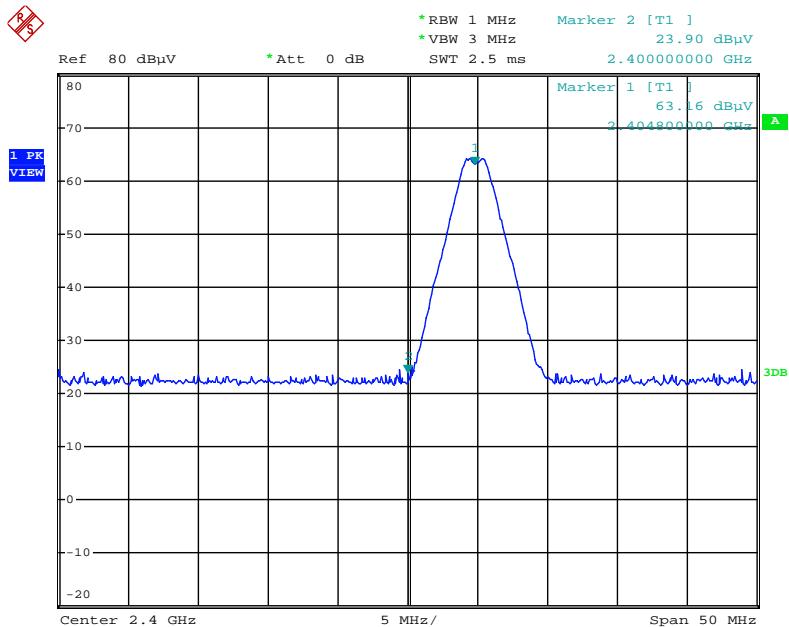
 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013
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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

15.249(a) Field Strength of Fundamental – Peak Detector Testork Base Station Low Power Transmitter – Patch Ant = 4.0 dBi									
Frequency (MHz)	Antenna Pol.	Emission Level (dBuV/m) @1m	Antenna Factor (dB)	Cable Loss	Distance Correction	D/C Corr.	Emission Level (dBuV/m@3m)	Limit (dBuV/m@3m)	Margin
2405.0	V	64.2	28.4	4.5	-9.54	-7.0	80.56	94.0	-13.44
2405.0	H	65.0	28.4	4.5	-9.54	-7.0	81.36	94.0	-12.64
2425.0	V	62.3	28.4	4.5	-9.54	-7.0	78.66	94.0	-15.34
2425.0	H	65.4	28.4	4.5	-9.54	-7.0	81.76	94.0	-12.24
2475.0	V	61.9	28.4	4.5	-9.54	-7.0	78.26	94.0	-15.74
2475.0	H	66.5	28.4	4.5	-9.54	-7.0	82.86	94.0	-11.14
Band Edge -15.249(d) (Worst Case)									
2400.0	V	23.9	28.3	4.5	-9.54	--	47.16	54.0	-6.84
2483.5	V	22.4	28.4	4.5	-9.54	--	45.76	54.0	-8.24
15.205 Restricted Band Emissions (worst Case)									
2390.0	V	22.8	28.2	4.5	-9.54	--	45.96	54.0	-8.04
2483.5	V	22.4	28.4	4.5	-9.54	--	45.76	54.0	-8.24

 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013
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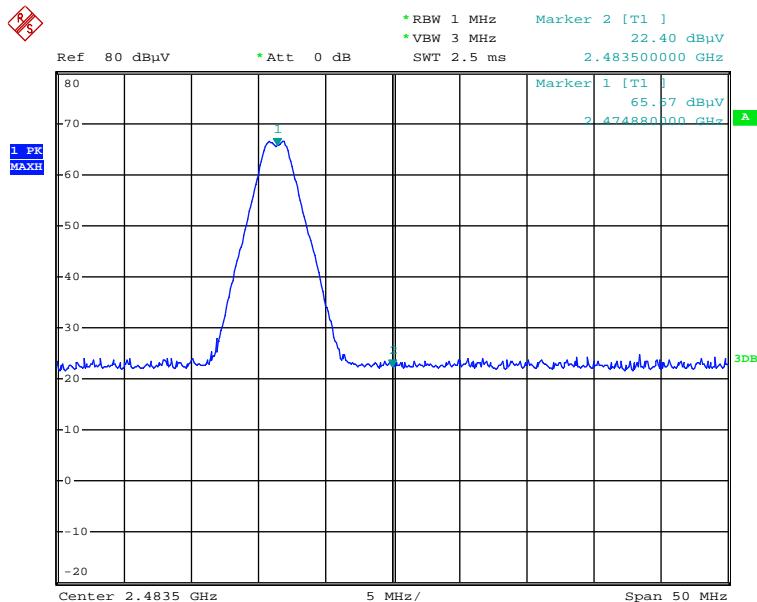
## Band Edge Plots

## LBE -2.400 GHz



Date: 21.AUG.2013 20:20:59

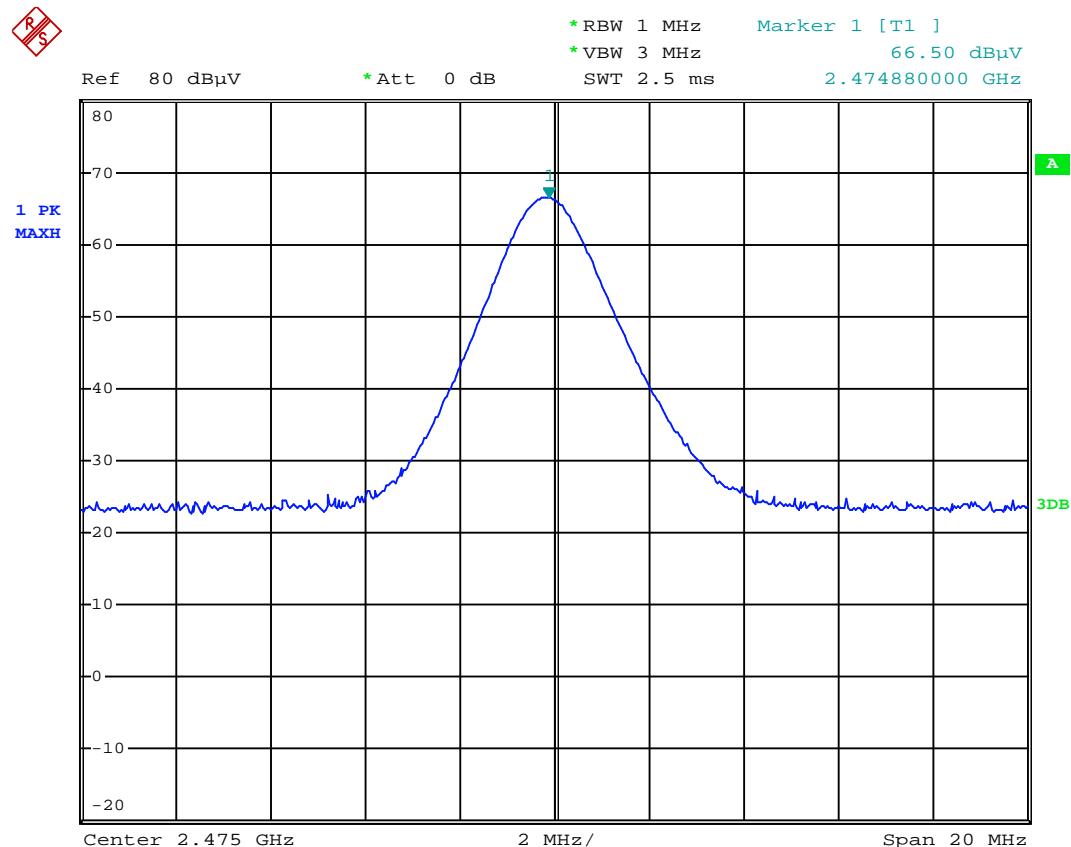
UBE -2.4835 GHz



Date: 21.AUG.2013 20:06:18



 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013
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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

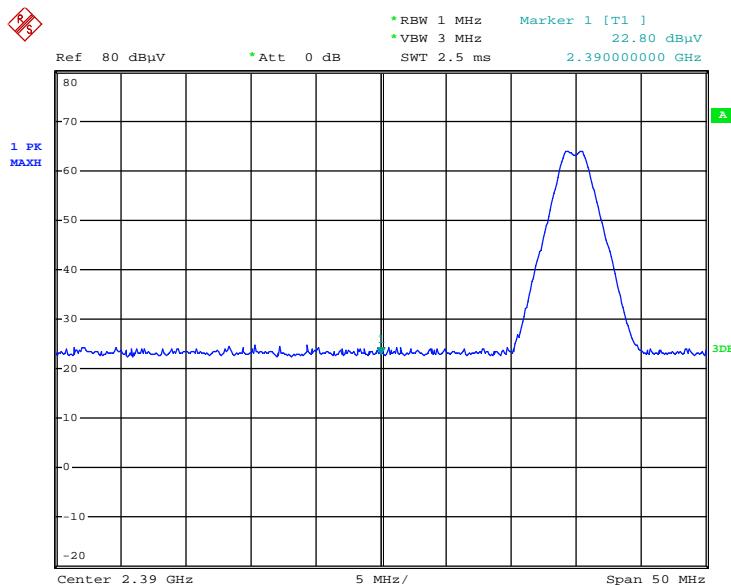


Date: 21.AUG.2013 19:57:39

 <b>Celltech</b> <small>Testing and Engineering Services Ltd</small>	Test Report Serial No.:	082913L5M-T1246-E15	Report Issue Date:	8/30/2013	 <b>ILAC-MRA</b>  <b>ACCREDITED</b>
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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

## Restricted Band

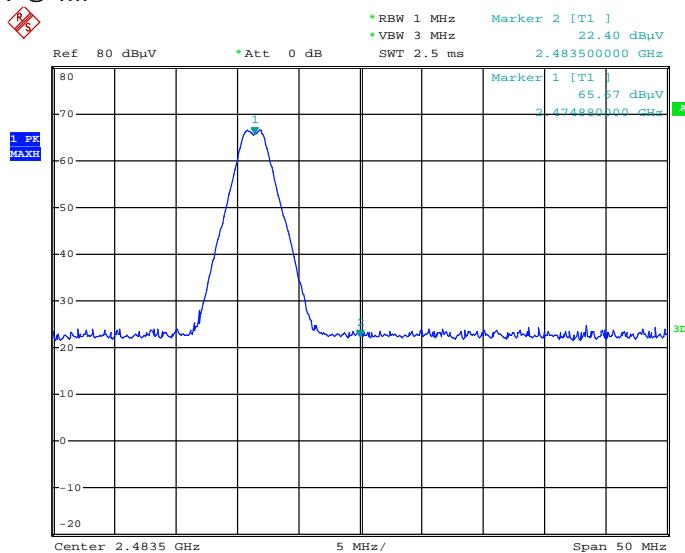
Peak emission = 26.3dBuV @ 1m



Date: 22.AUG.2013 17:34:30

## Restricted Band

Peak emission = 24.86dBuV @ 1m



Date: 21.AUG.2013 20:06:18

Applicant:	Microlynx	Model:	Testork BS 5033583	FCC ID:	L5M5033583	IC:	6364A-5033583	 <b>microlynx</b> <small>ACTIVELY INNOVATING</small>
DUT :	Testork Base Station 5033583, 2.4GHz Transmitter							
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	Measurement Date(s):	Aug 20-27, 2013	Report Revision No.:	Revision 1.0
	FCC Rule Part(s):	47 CFR §15.249	FCC Test Firm Reg. No.:	714830
	IC Standard(s):	RSS-210    RSS-Gen	IC Test Site No.:	IC 3874A-1

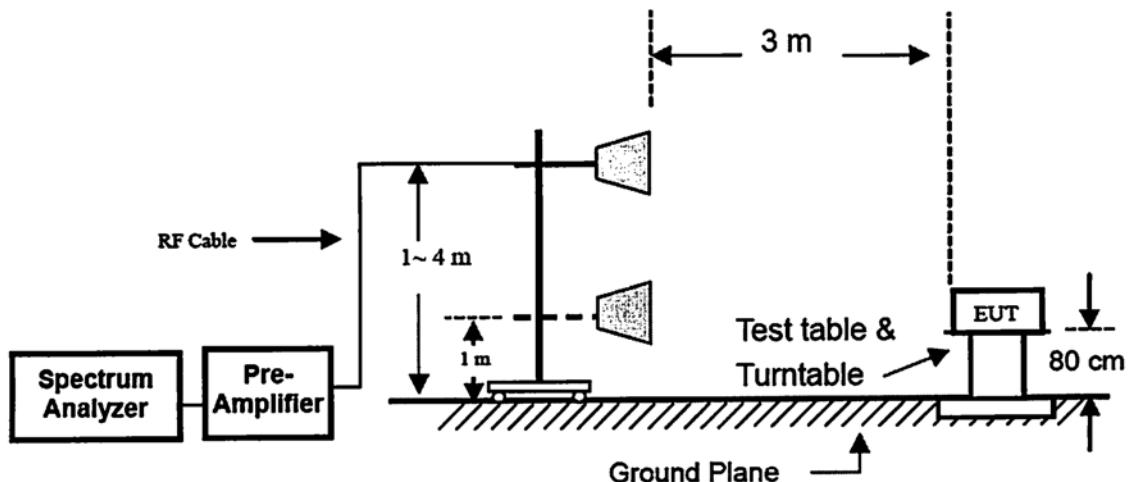
## 9.0 RADIATED SPURIOUS EMISSIONS

REFERENCES				
Normative Reference Standard	FCC CFR 47 §15.205; §15.209: §15.249, RSS-210, IECS-003			
Procedure Reference	ANSI C63.4:2003			
ENVIRONMENTAL CONDITIONS				
Temperature	25 +/- 5 °C			
Humidity	40 +/- 10 %			
Barometric Pressure	101 +/- 3 kPa			
EQUIPMENT LIST				
ASSET NUMBER	MANUFACTURER	MODEL	DESCRIPTION	CAL DUE
00051	HP	8566B	Spectrum Analyzer RF Section	09 May14
00049	HP	85650A	Quasi-peak Adapter	10 May14
00047	HP	85685A	RF Preselector	09 May14
00072	EMCO	2075	Mini-mast	n/a
00073	EMCO	2080	Turn Table	n/a
00071	EMCO	2090	Multi-Device Controller	n/a
00030	HP	83017A	Microwave system amplifier	n/a
00050	Chase	CBL-6111A	Bilog Antenna	03 May14
00034	ETS	3115	Double Ridged Guide Horn	06 Dec 14
00085	EMCO	6502	Active Loop Antenna	03 June 14
00162	Waveline	899	Horn Antenna	n/a
MEASUREMENT EQUIPMENT SETUP				
MEASUREMENT EQUIPMENT CONNECTIONS	For the field strength measurements, the measurement equipment was connected as shown in E.4. Various antenna types may be required to cover the applicable frequency range tested. The ranges in which each antenna was used are shown below.			
	Frequency Range		RX Antenna	TX Antenna
	9kHz – 30Mhz		Active Loop	N/a
	30 MHz - 1GHz		Bilog	N/a
	1 GHz - 18 GHz		ETS 3115 Horn	N/a
	18-26.5 GHz		Waveline Horn	N/a
MEASUREMENT EQUIPMENT SETTINGS	For the spurious out-of-band emissions, the spectrum analyzer was set to the following settings:			
	Measurement	RBW	VBW	Detector
		kHz	kHz	
	< 1 GHz	100	300	Peak*
	> 1 GHz	1000	3000	Peak*
	<ul style="list-style-type: none"> <li>The spectrum was searched from the lowest frequency generated by the EUT to the 10<sup>th</sup> harmonic of the fundamental.</li> <li>All detected emissions are reported.</li> <li>No emissions below 1GHz were detected.</li> </ul>			

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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

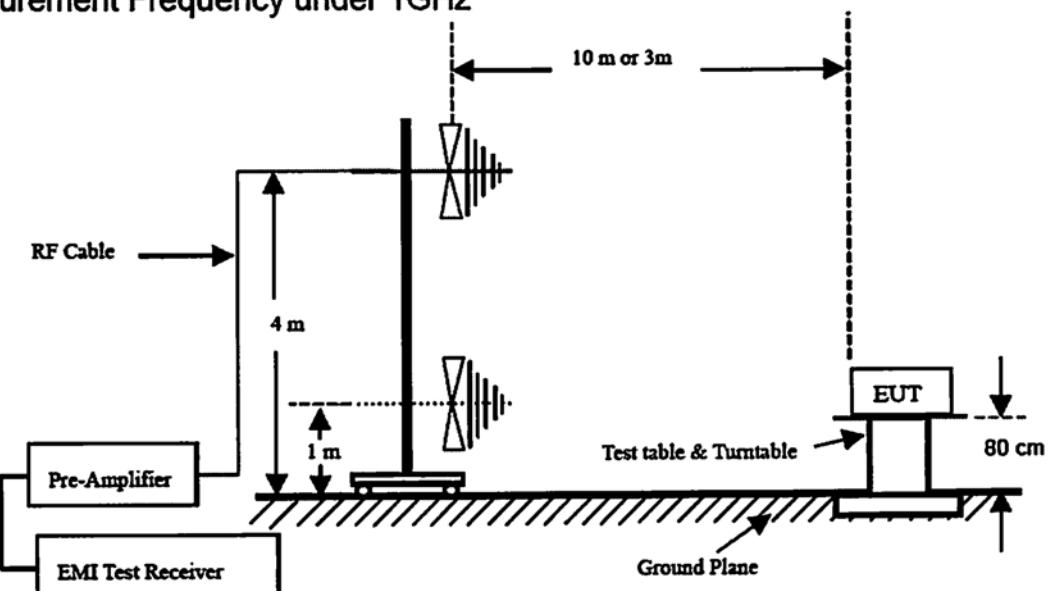
## SETUP DRAWING, SETUP DRAWING – RADIATED TX SPURIOUS EMISSIONS (> 1 GHZ)

### Measurement Frequency above 1GHz



#### SETUP DRAWING, SETUP DRAWING – RADIATED TX SPURIOUS EMISSIONS (< 1 GHZ)

### Measurement Frequency under 1GHz

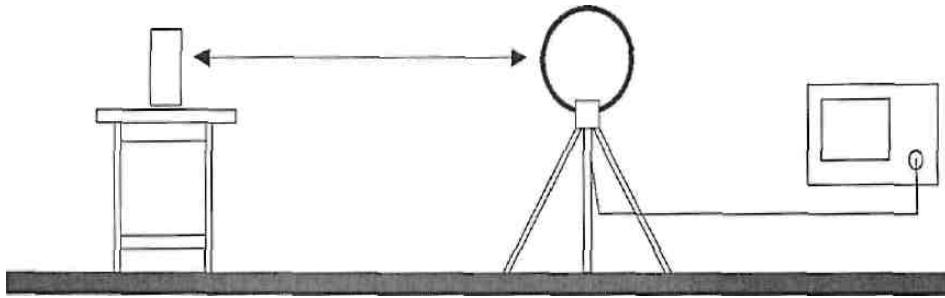


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## SETUP DRAWING, 9KHZ-30MHZ

Active Loop Ant.



Applicant:	Microlynx	Model:	Testork BS 5033583	FCC ID:	L5M5033583	IC:	6364A-5033583	 <small>MICROLYNX MICROLYNX is a registered trademark of Microlynx Inc.</small>
DUT :	Testork Base Station 5033583, 2.4GHz Transmitter							
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**15.249(a)(d) Emissions Field Strength– Peak Detector  
Testork Low Power Transmitter**

Frequency (MHz)	Antenna Pol.	Emission Level (dBuV/m) @1m	Antenna Factor (dB)	Cable Loss/Amp Gain Corr.	Distance Correction	Emission Level (dBuV/m@3m)	Limit (avg) (dBuV/m@3m)	Margin
7215.0	V	34.4	35.9	-26.0	-9.54	34.76	54.0	-19.24
7275.0	V	35.6	36.2	-26.0	-9.54	36.26	54.0	-17.74
7425.0	V	39.6	36.5	-26.0	-9.54	40.56	54.0	-13.44

## Notes:

Data presented using a Pk detector compared to average limits.

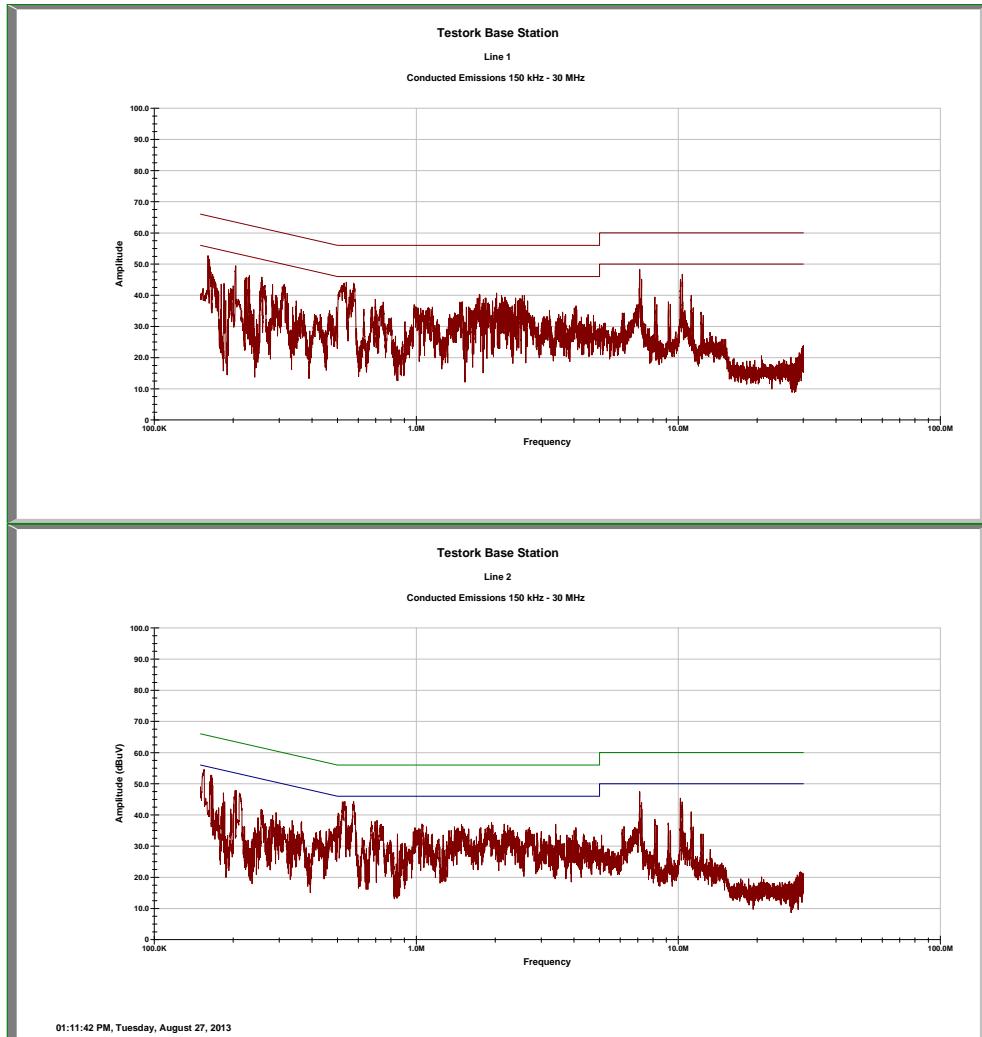
Device characterization was performed on all axis to determine worst case orientation for both antennas.

Worst case performance has been presented.

The Device was searched to the 10<sup>th</sup> harmonic of the fundamental (24.75 GHz).

All detected emissions have been reported.

## 15.209 Radiated Emissions (peak detector).



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	Measurement Date(s):	Aug 20-27, 2013		Report Revision No.:	Revision 1.0	
	FCC Rule Part(s):	47 CFR §15.249		FCC Test Firm Reg. No.:	714830	
	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1	

## Conducted Powerline Emissions Measurement

REFERENCES			
Normative Reference Standard(s)	CFR 47 FCC Part 15 §15.207 (a)	ICES-001 Issue 4	EN 55022: 2006
Procedure Reference(s)	ANSI C63.4	CISPR 11: 2004	EN 55022: 2006

LIMITS		
<p>§15.107(a): Except for Class A digital devices, for equipment that is designed to be connected to the public utility (AC) power line, the radio frequency voltage that is conducted back onto the AC power line on any frequency or frequencies within the band 150 kHz to 30 MHz shall not exceed the limits in the following table, as measured using a 50 [mu]H/50 ohms line impedance stabilization network (LISN). Compliance with the provisions of this paragraph shall be based on the measurement of the radio frequency voltage between each power line and ground at the power terminal. The lower limit applies at the band edges.</p>		
Frequency of Emission (MHz)	Conducted Limit (dBuV)	
	Quasi-Peak	Average
0.15 – 0.5	66 to 56*	56 to 46*
0.50 – 5.0	56	46
5.0 – 30.0	60	50

ENVIRONMENTAL CONDITIONS	
Temperature	$25 \pm 5$ °C
Humidity	$35 \pm 5$ %RH
Barometric Pressure	uncontrolled

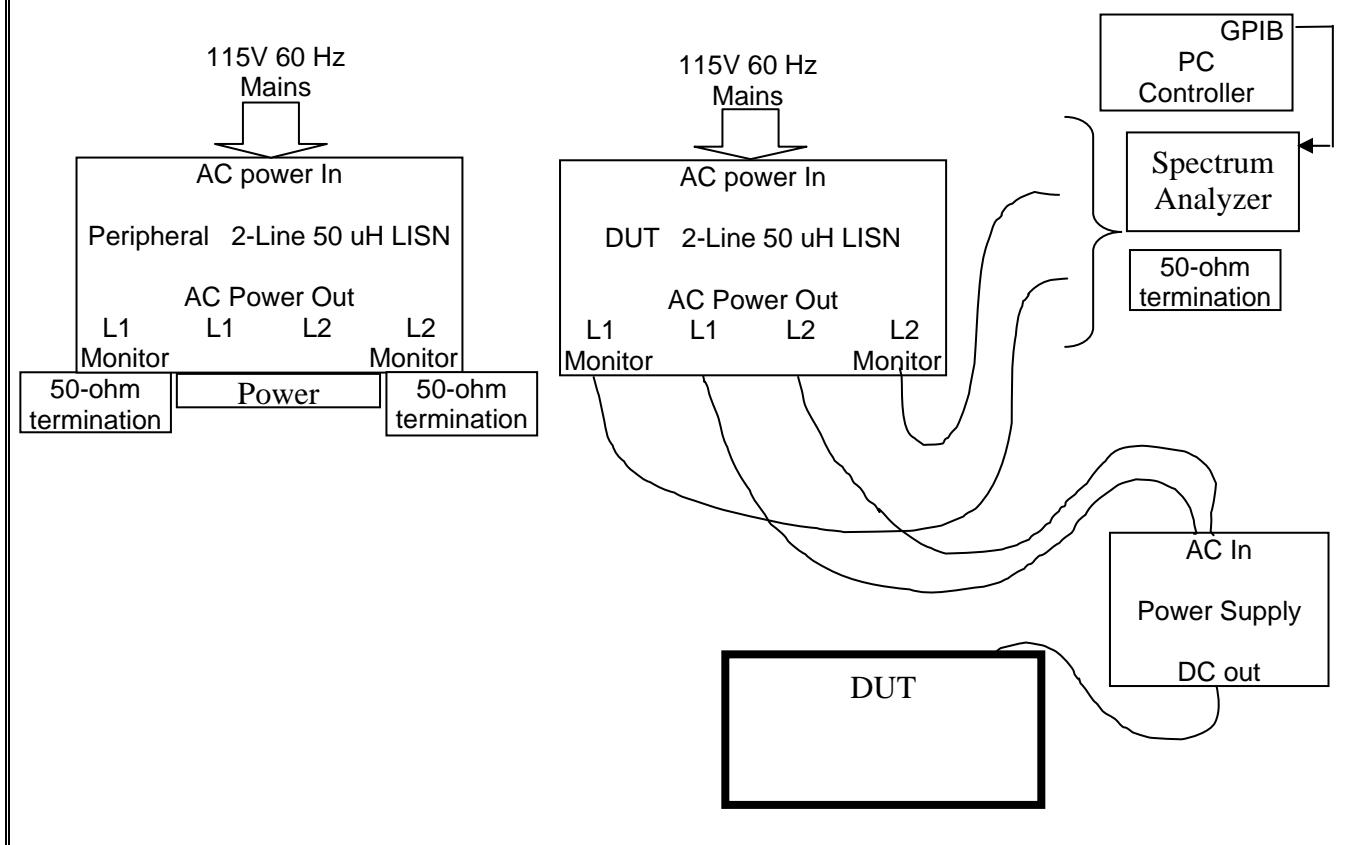
D.1. EQUIPMENT LIST					
ASSET NUMBER	MANUFACTURER	MODEL	DESCRIPTION	LAST CAL	CAL DUE
00049	HP	85650A	Quasi-Peak Adapter	05/10/2012	05/10/2014
00047	HP	85685A	RF Preselector	05/10/2012	05/10/2014
00051	HP	8566B	Spectrum Analyzer RF Section	05/9/2012	05/9/2014
00083	EMCO	3825/2	Line Impedance Stabilization Network	05/9/2012	05/9/2014

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	IC Standard(s):	RSS-210	RSS-Gen	IC Test Site No.:	IC 3874A-1

## MEASUREMENT EQUIPMENT SETUP

<b>MEASUREMENT EQUIPMENT CONNECTIONS</b>	The conducted emissions were measured on each of the two AC powerline leads connected to the DUT's host power supply brick. A two line LISN was used to make this measurement.
<b>MEASUREMENT EQUIPMENT SETTINGS</b>	<p>Each of the monitor ports from the 2-line LISN was connected in turn to the spectrum analyzer. The port not connected to the analyzer was terminated in a 50-ohm load. A prescan of the peak emission levels was made of the 150 kHz – 30 MHz range split into 4 equal frequency bands. The following were the spectrum analyzer settings:</p> <ul style="list-style-type: none"> <li>Start Frequency and Stop Frequency set by software for each of the four bands</li> <li>RBW: 100 kHz</li> <li>VBW: 300 kHz</li> <li>Sweep: 500 mS</li> </ul> <p>The resulting data from each band was corrected and collected by software and presented in the graphical representations shown on page 19 for the two leads.</p> <p>The frequency points with peak levels within 20 dB of the average limit were selected and optimized using software control each type of detector (peak, quasi-peak and average). This data was corrected by the software is presented in the tables shown in section on page 19.</p> <p>All peak emissions are below the average limit.</p>

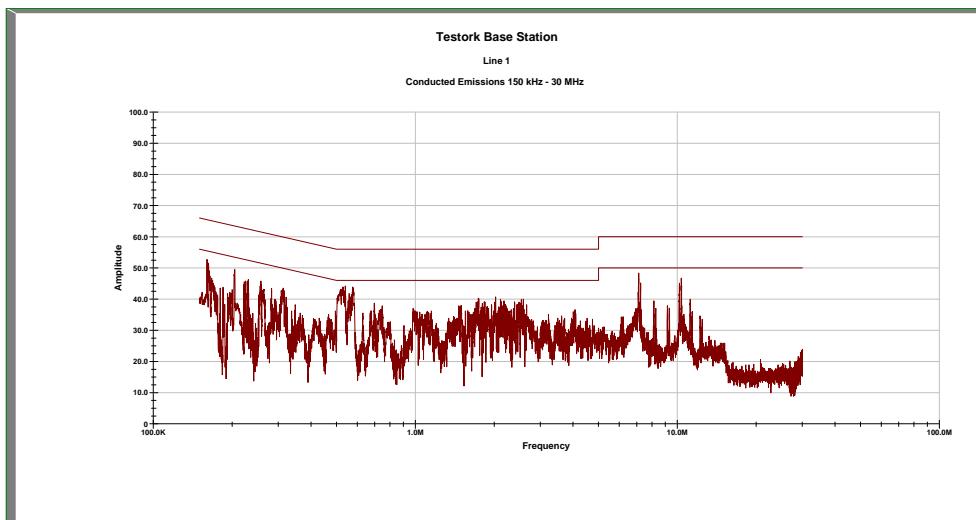
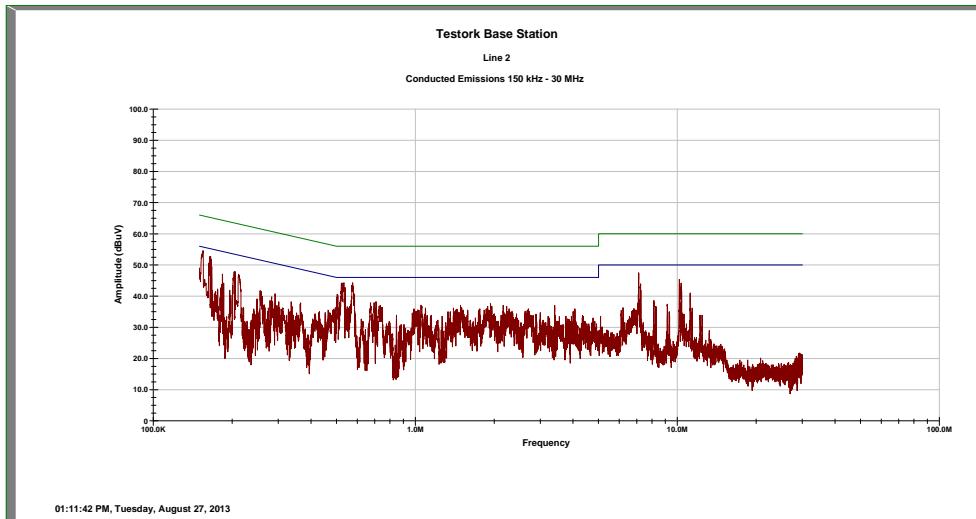
## SETUP DRAWING



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Test Lab Certificate No.  
2470.01

## 15.207, Powerline Conducted Emissions



All peak emissions are below the average limits.

Applicant:	Microlynx	Model:	Testork BS 5033583	FCC ID:	L5M5033583	IC:	6364A-5033583	 <small>MICROLYNX MICROLYNX is a registered trademark of Microlynx Inc.</small>
DUT :	Testork Base Station 5033583, 2.4GHz Transmitter							
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## **10.0 ANTENNA REQUIREMENTS**

## § 15.203 Antenna Requirement

An intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator shall be considered sufficient to comply with the provisions of this section. The manufacturer may design the unit so that a broken antenna can be replaced by the user, but the use of a standard antenna jack or electrical connector is prohibited.

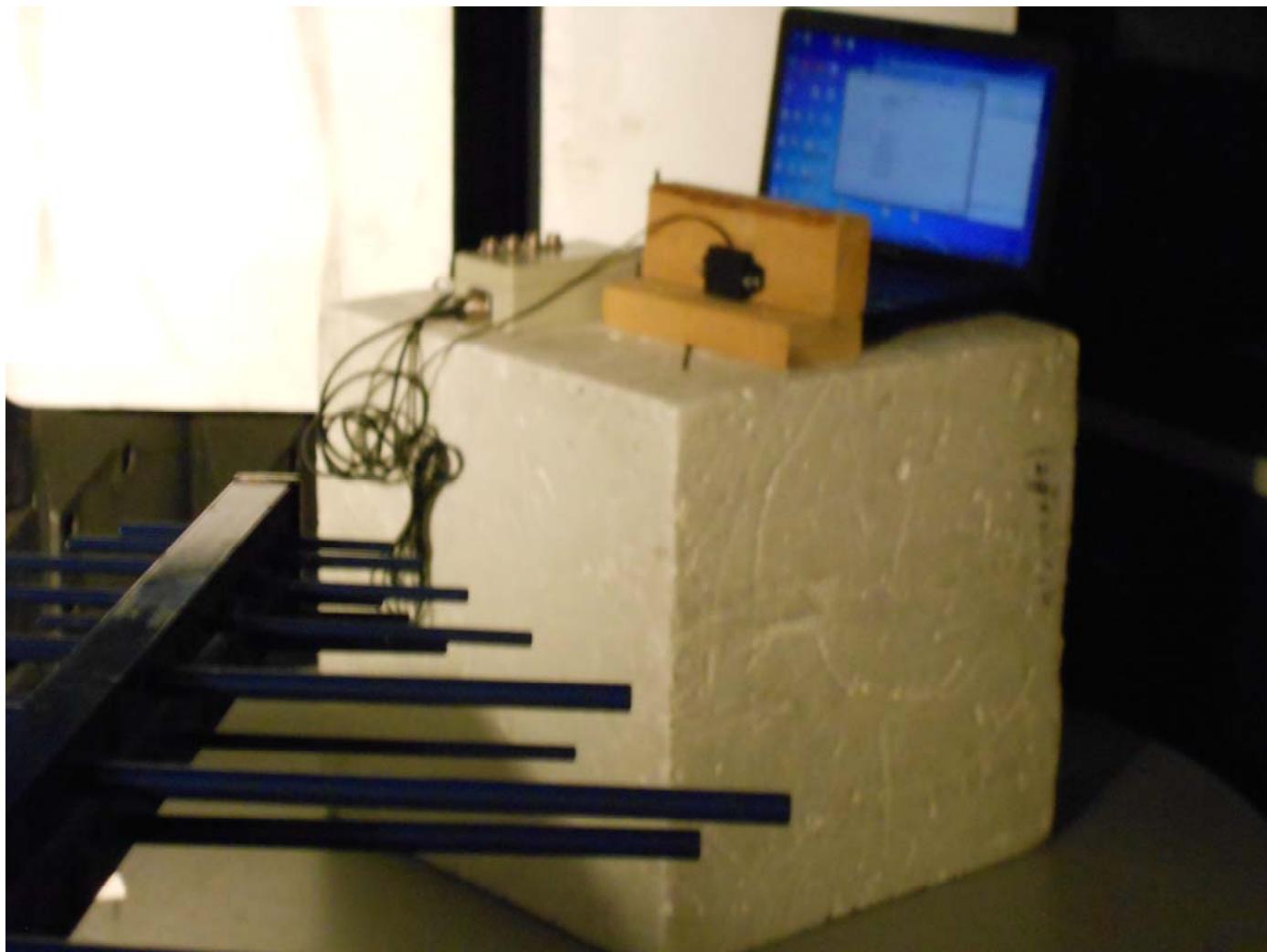
The DUT complies with the antenna requirements of 15.203 as follows:

- This device is for remote industrial use only, as such requires professional installation.
- Chapter 3 of the user guide details the professional installation instructions.

 Celltech <small>Testing and Engineering Services Lab</small>	Test Report Serial No.:	082913L5M-T1246-E15	Report Issue Date:	8/30/2013
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	IC Standard(s):	RSS-210 RSS-Gen	IC Test Site No.:	IC 3874A-1

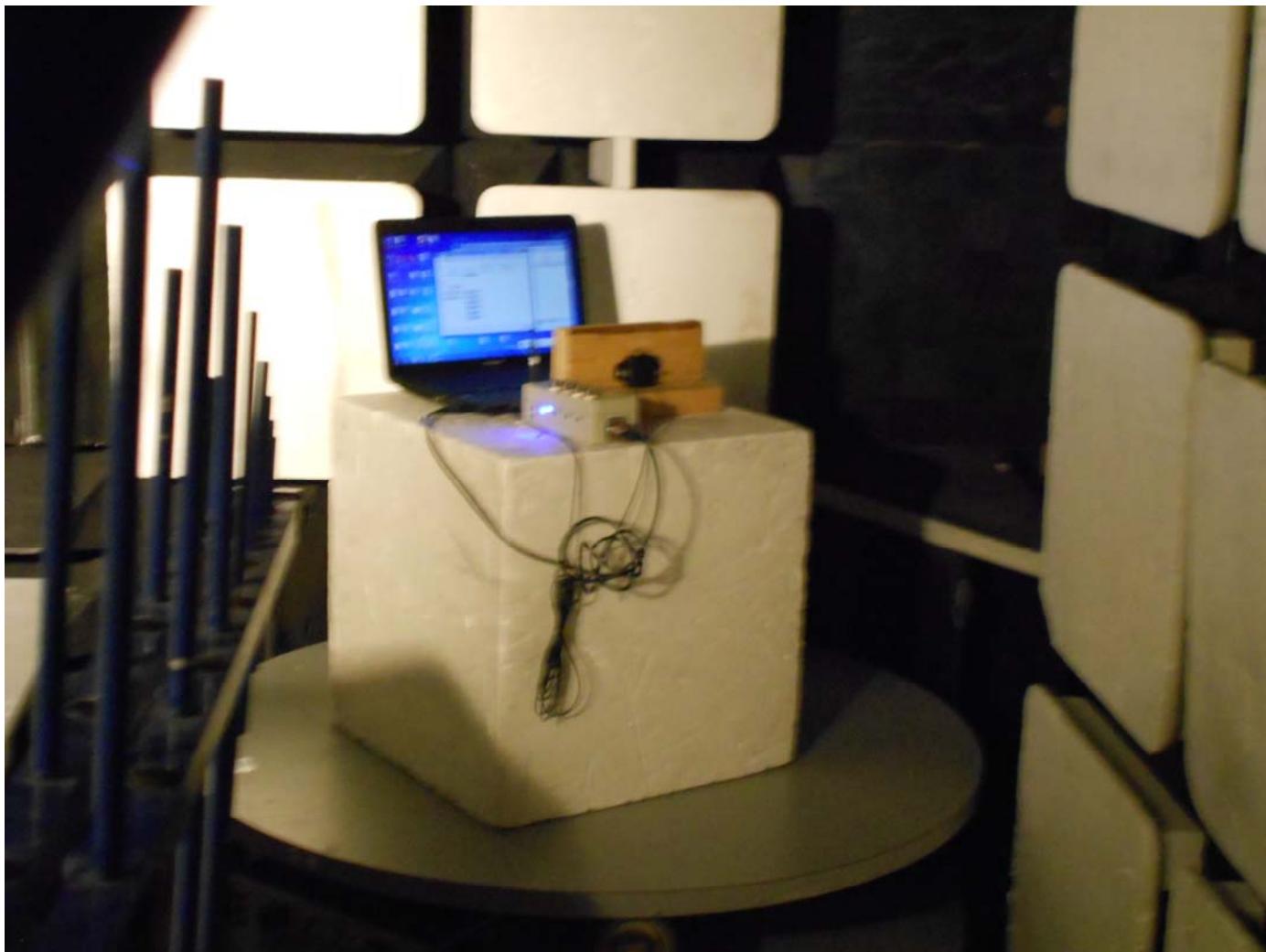


## 11.0 TEST SET UP PHOTO'S

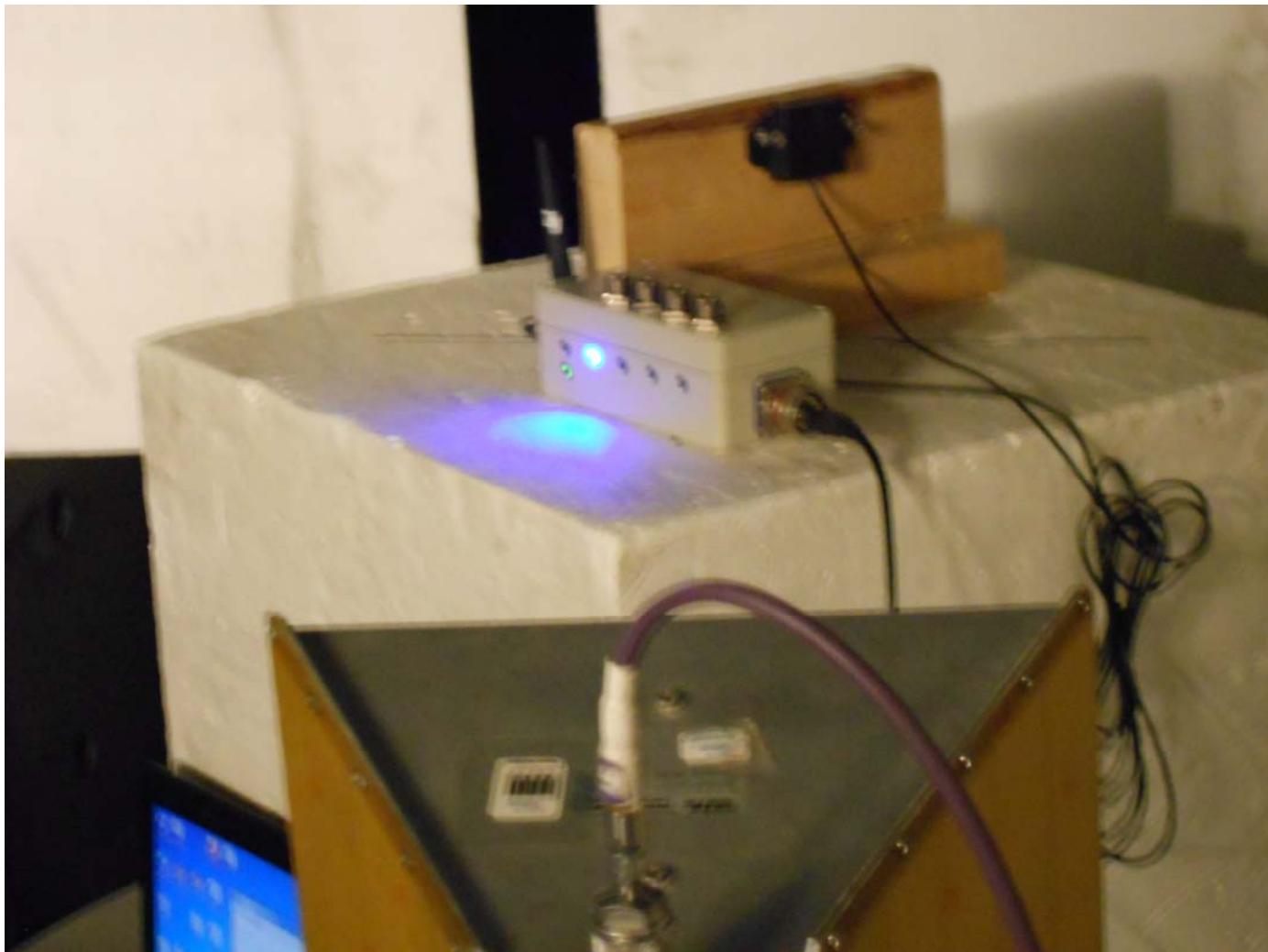


Applicant:	Microlynx	Model:	Testork BS 5033583	FCC ID:	L5M5033583	IC:	6364A-5033583	 <small>MICROLYNX MICROLYNX-TESTORk-BS</small>
DUT :	Testork Base Station 5033583, 2.4GHz Transmitter							
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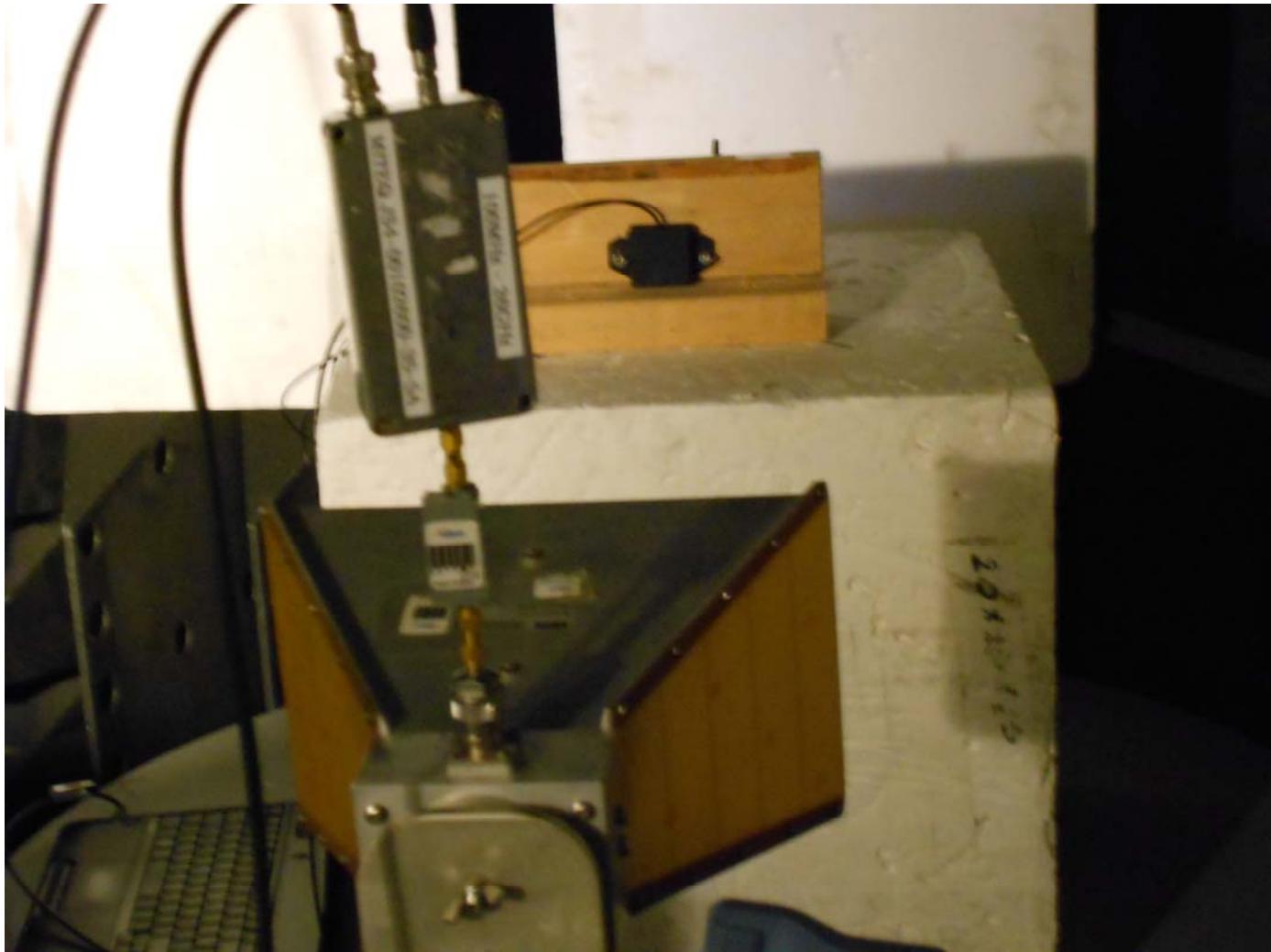
 <b>Celltech</b> <small>Testing and Engineering Services Ltd</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013	 <b>ILAC-MRA</b>  <b>ACCREDITED</b>
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	FCC Rule Part(s):	47 CFR §15.249	FCC Test Firm Reg. No.:	714830
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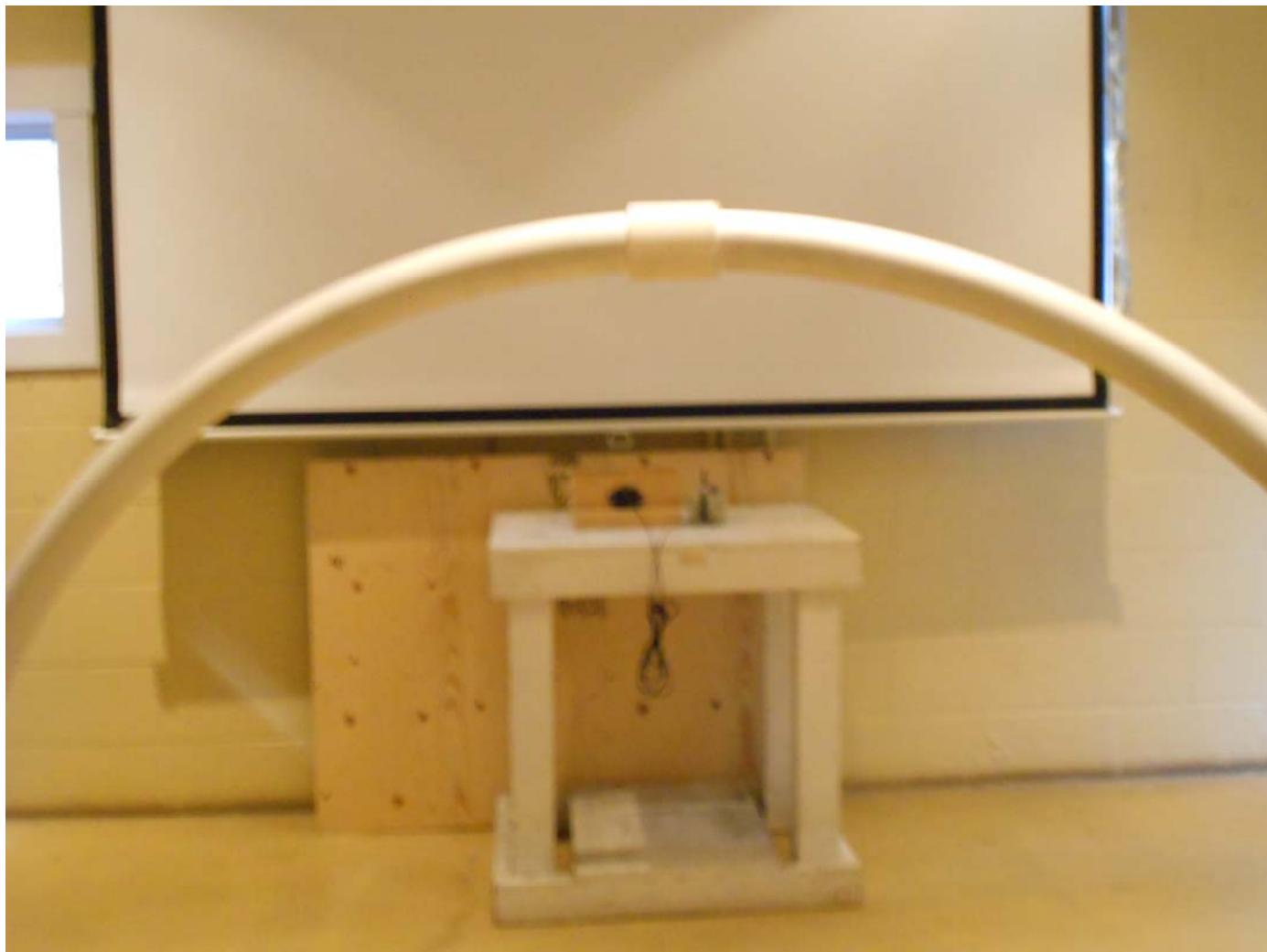
 <b>Celltech</b> <small>Testing and Engineering Services Ltd.</small>	Test Report Serial No.:	082913L5M-T1246-E15		Report Issue Date:	8/30/2013	 <b>ILAC-MRA</b>  <b>ACREDITED</b>
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DUT :	Testork Base Station 5033583, 2.4GHz Transmitter							
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