

FCC - TEST REPORTReport Number : **60.792.17.006.01B** Date of Issue : April 6, 2017Model : **HG02132A-US-RX, HG02132B-US-RX**Product Type : **Temperature Station LCD**Applicant : Lidl US Trading, LLCAddress : 3500 S. Clark Street, Arlington, Virginia, United StatesProduction Facility : DIGI MAX TECHNOLOGY LIMITEDAddress : Room 708, Building 3, Xinyuan B area, Jinshan Industrial District,
Fuzhou, ChinaTest Result : **Positive** **Negative**Total pages including Appendices : 23

TÜV SÜD HONG KONG LTD. is a subcontractor to TÜV SÜD Product Service GmbH according to the principles outlined in ISO 17025. TÜV SÜD HONG KONG LTD. reports apply only to the specific samples tested under stated test conditions. Construction of the actual test samples has been documented. It is the manufacturer's responsibility to assure that additional production units of this model are manufactured with identical electrical and mechanical components. The manufacturer/importer is responsible to the Competent Authorities in Europe for any modifications made to the production units which result in non-compliance to the relevant regulations. TÜV SÜD HONG KONG LTD. shall have no liability for any deductions, inferences or generalizations drawn by the client or others from TÜV SÜD HONG KONG LTD. issued reports. This report is the confidential property of the client. As a mutual protection to our clients, the public and ourselves, extracts from the test report shall not be reproduced except in full without our written approval.

1 Table of Contents

1 Table of Contents.....	2
2 Description of Equipment Under Test	3
3 Summary of Test Standards	4
4 Details about the Test Laboratory	5
4.1 Test Equipment Site List	6
4.2 Measurement System Uncertainty	7
5 Summary of Test Results.....	8
6 General Remarks.....	9
7 Emission Test Results	10
7.1 Radiated Emission.....	10
8 Appendix A - Photographs of EUT	16
9 Appendix B - Setup Photographs of EUT.....	22
10 Appendix C - General Product Information	23

2 Description of Equipment Under Test

Description of the Equipment Under Test

Product: Temperature Station LCD
Model no.: HG02132A-US-RX, HG02132B-US-RX
FCC ID: 2AJ90-HG2132RX
Rating: 3.0VDC (3 x 1.5VDC size "AA" batteries)
Frequency: 433.92MHz



3 Summary of Test Standards

Test Standards

FCC Part 15 Subpart B 10-1-15 Edition Federal Communications Commission, PART 15 — Radio Frequency Devices, Subpart B — Unintentional Radiators

4 Details about the Test Laboratory

Site 1

Company name: TÜV SÜD Hong Kong Ltd.
3/F, West Wing, Lakeside 2,
10 Science Park West Avenue,
Science Park, Shatin, Hong Kong

Site 2

Company name: TÜV SÜD Certification and Testing (China) Co., Ltd. Shenzhen Branch
Building 12&13 Zhiheng Wisdomland Business Park,
Nantou Checkpoint Road 2,
Shenzhen 518052, P.R.China
FCC Registration Number: 502708

Emission Tests	
Test Item	Test Site
FCC Part 15 Subpart B	
FCC Title 47 Part 15.109 Radiated Emission 30MHz-1000MHz	Site 2
FCC Title 47 Part 15.107 Conduct Emission 150kHz-30MHz	N/A

4.1 Test Equipment Site List

Radiated emission Test – Site 2

DESCRIPTION	MANUFACTURER	MODEL NO.	SERIAL NO.	CAL. DUE DATE
EMI Test Receiver	Rohde & Schwarz	ESR 26	101269	15-July-17
Trilog Super Broadband Test Antenna	Schwarzbeck	VULB 9163	707	15-July-17
Horn Antenna	Rohde & Schwarz	HF907	102294	15-July-17
Pre-amplifier	Rohde & Schwarz	SCU 18	102230	15-July-17
3m Semi-anechoic chamber	TDK	9X6X6	----	29-May-19

4.2 Measurement System Uncertainty

Measurement System Uncertainty Emissions

System Measurement Uncertainty	
Items	Extended Uncertainty
Uncertainty for Radiated Emission in 3m chamber 30MHz-1000MHz	Horizontal: 4.83dB; Vertical: 4.91dB;
Uncertainty for Radiated Emission in 3m chamber 1000MHz-25000MHz	Horizontal: 4.89dB; Vertical: 4.88dB;

5 Summary of Test Results

Emission Tests				
FCC Part 15 Subpart B				
Test Condition	Pages	Test Result		
		Pass	Fail	N/A
FCC Title 47 Part 15.109 Radiated Emission 30MHz-1000MHz	10-15	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
FCC Title 47 Part 15.107 Conduct Emission 150kHz-30MHz	N/A	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

6 General Remarks

Remarks

Client informs that the HG02132B-US-RX have the same technical construction including circuit diagram, PCB Layout, components and component layout, all electrical construction and mechanical construction, with Temperature Station LCD, HG02132A-US-RX. The difference lies only on different color of the different models. (Client's conformation letter shown at appendix C)

EMC Tests were performed on model: HG02132A-US-RX.

SUMMARY:

- All tests according to the regulations cited on page 5 were

■ - Performed

□ - **Not** Performed

- The Equipment Under Test

■ - **Fulfills** the general approval requirements.

□ - **Does not** fulfill the general approval requirements.

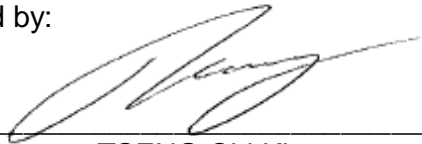
Sample Received Date: February 7, 2017

Testing Start Date: February 8, 2017

Testing End Date: March 15, 2017

- TÜV SÜD HONG KONG LTD. -

Reviewed by:



TSENG Chi Kit
EMC Project Engineer



Prepared by:



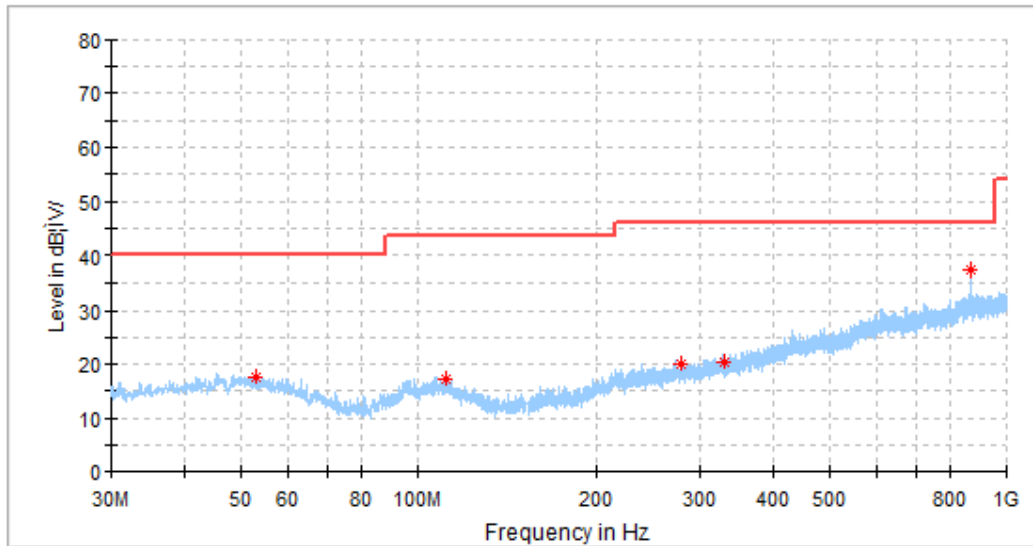
CHAN Kwan Ho Alex
EMC Project Engineer

7 Emission Test Results

7.1 Radiated Emission

EUT: HG02132A-US-RX
 Op Condition: Receive Mode
 Test Specification: Antenna: Horizontal
 Comment: 3.0VDC

Test Result	
<input checked="" type="checkbox"/>	Passed
<input type="checkbox"/>	Not Passed

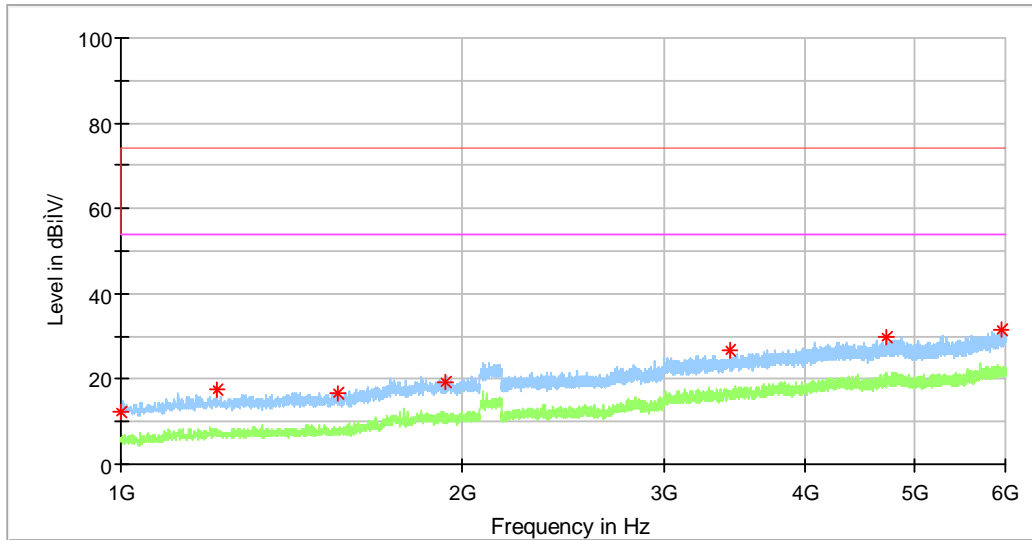


Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)
52.976875	17.48	40.00	-22.52
111.722500	17.07	43.50	-26.43
279.532500	19.97	46.00	-26.03
330.700000	20.43	46.00	-25.57
867.776875	37.12	46.00	-8.88

Radiated Emission

EUT: HG02132A-US-RX
 Op Condition: Receive Mode
 Test Specification: Antenna: Horizontal
 Comment: 3.0VDC

Test Result	
<input checked="" type="checkbox"/>	Passed
<input type="checkbox"/>	Not Passed

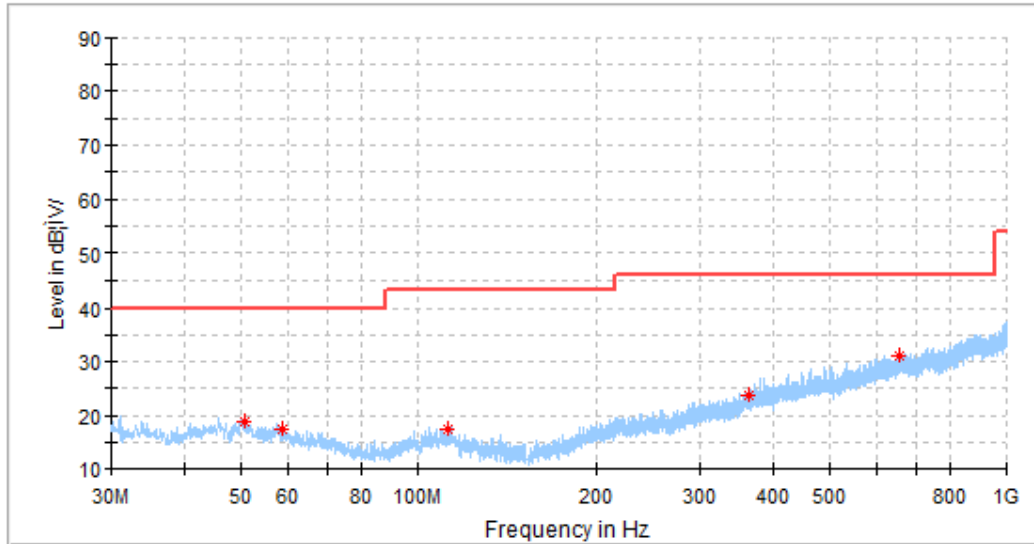


Frequency (MHz)	MaxPeak (dBµV/m)	Average (dBµV/m)	Limit (dBµV/m)	Margin (dB)
1000.000000	12.24	---	54.00	-41.76
1215.000000	17.40	---	74.00	-56.60
1550.500000	16.55	---	74.00	-57.45
1926.500000	19.34	---	74.00	-54.66
3435.500000	26.87	---	74.00	-47.13
4713.000000	29.98	---	74.00	-44.02
5946.000000	31.71	---	74.00	-42.29

Radiated Emission

EUT: HG02132A-US-RX
 Op Condition: Receive Mode
 Test Specification: Antenna: Vertical
 Comment: 3.0VDC

Test Result	
<input checked="" type="checkbox"/>	Passed
<input type="checkbox"/>	Not Passed

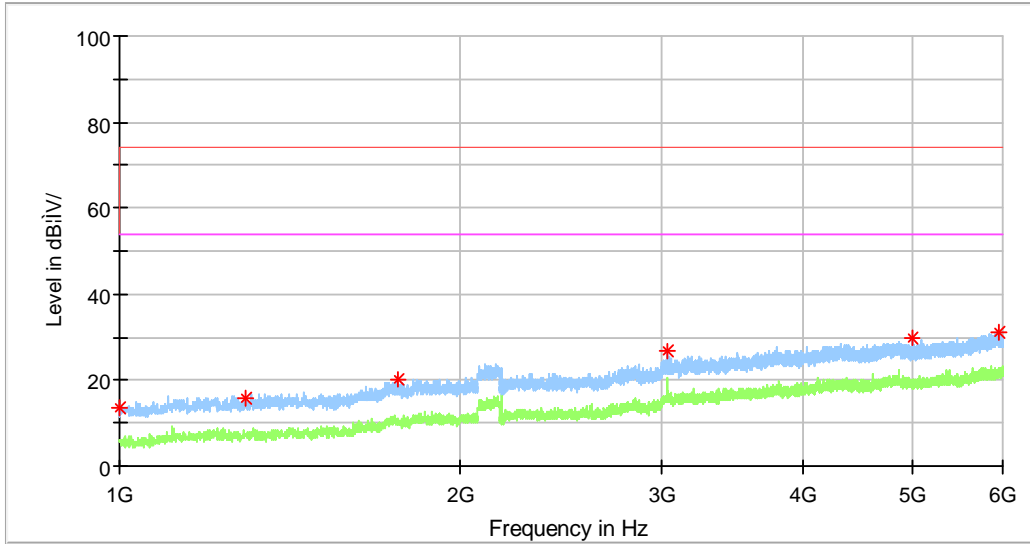


Frequency (MHz)	QuasiPeak (dBμV/m)	Limit (dBμV/m)	Margin (dB)
50.855000	18.71	40.00	-21.29
58.918125	17.49	40.00	-22.51
112.510625	17.52	43.50	-25.98
363.740625	23.73	46.00	-22.27
658.863125	31.02	46.00	-14.98

Radiated Emission

EUT: HG02132A-US-RX
 Op Condition: Receive Mode
 Test Specification: Antenna: Vertical
 Comment: 3.0VDC

Test Result	
<input checked="" type="checkbox"/>	Passed
<input type="checkbox"/>	Not Passed

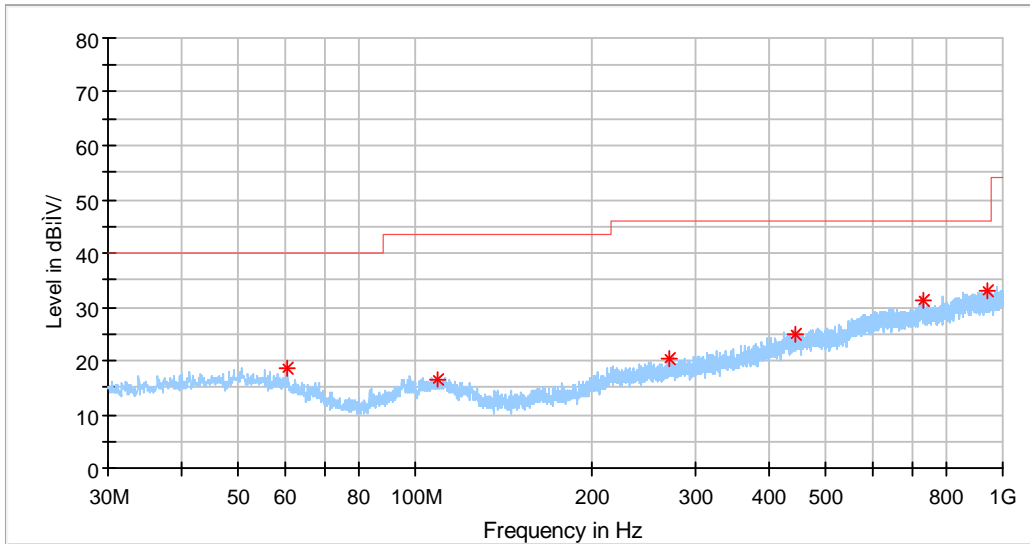


Frequency (MHz)	MaxPeak (dBµV/m)	Average (dBµV/m)	Limit (dBµV/m)	Margin (dB)
1000.000000	13.72	---	54.00	-40.28
1291.000000	15.74	---	74.00	-58.26
1759.500000	20.30	---	74.00	-53.70
3036.000000	26.55	---	74.00	-47.45
4998.000000	30.02	---	74.00	-43.98
5956.500000	31.18	---	74.00	-42.82

Radiated Emission

EUT: HG02132A-US-RX
 Op Condition: Clock Mode
 Test Specification: Antenna: Horizontal
 Comment: 3.0VDC

Test Result	
<input checked="" type="checkbox"/>	Passed
<input type="checkbox"/>	Not Passed

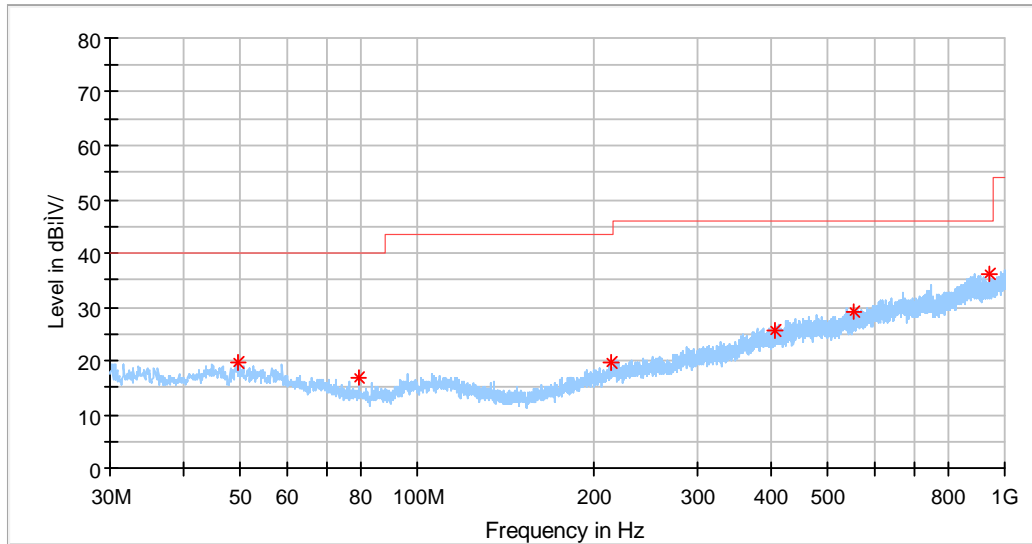


Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)
60.615625	18.47	40.00	-21.53
108.873125	16.54	43.50	-26.96
270.802500	20.29	46.00	-25.71
442.553125	24.96	46.00	-21.04
733.492500	31.34	46.00	-14.66
942.285000	33.11	46.00	-12.89

Radiated Emission

EUT: HG02132A-US-RX
 Op Condition: Clock mode
 Test Specification: Antenna: Vertical
 Comment: 3.0VDC

Test Result	
<input checked="" type="checkbox"/>	Passed
<input type="checkbox"/>	Not Passed

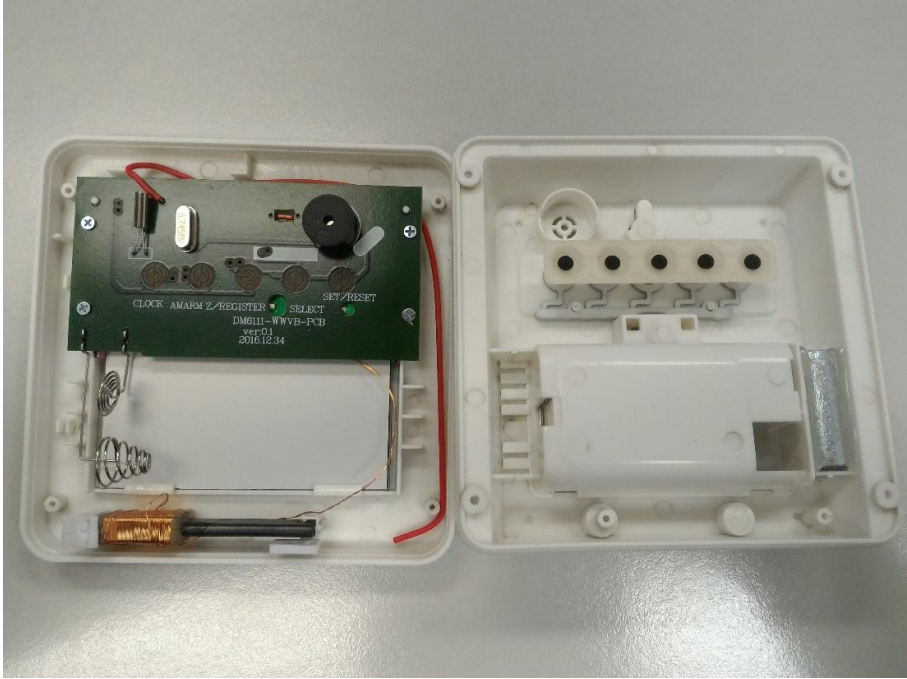
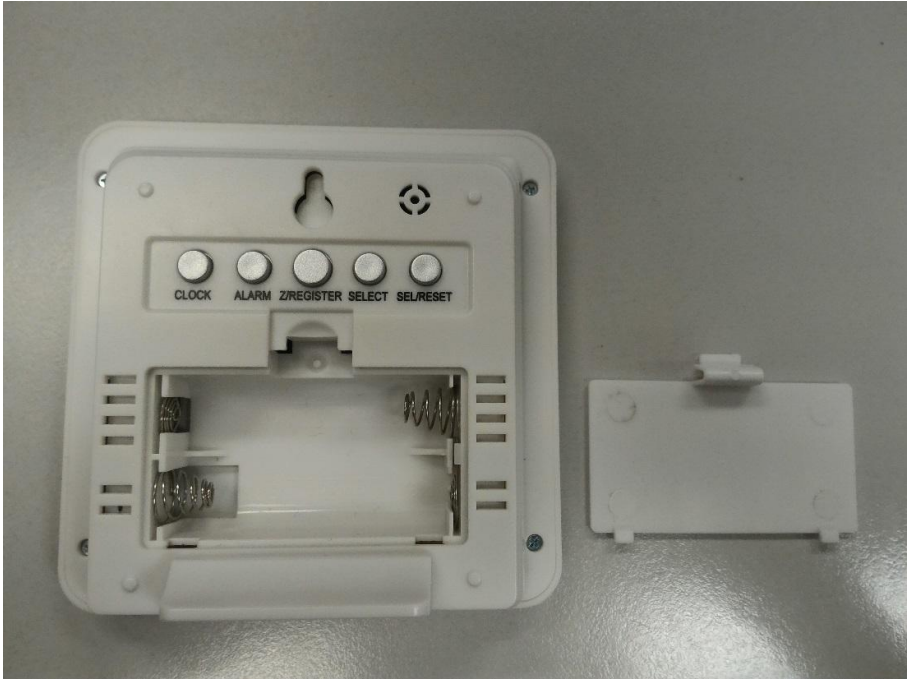


Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)
49.703125	19.79	40.00	-20.21
79.651875	16.73	40.00	-23.27
213.269375	19.50	43.50	-24.00
406.966250	25.75	46.00	-20.25
556.043125	29.18	46.00	-16.82
943.133750	36.13	46.00	-9.87

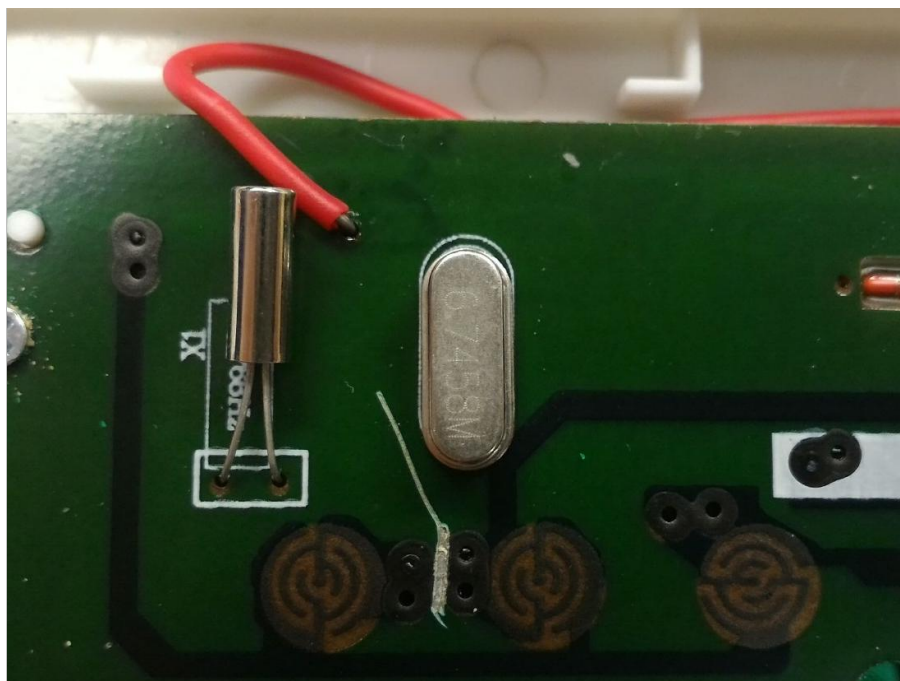
8 Appendix A - Photographs of EUT



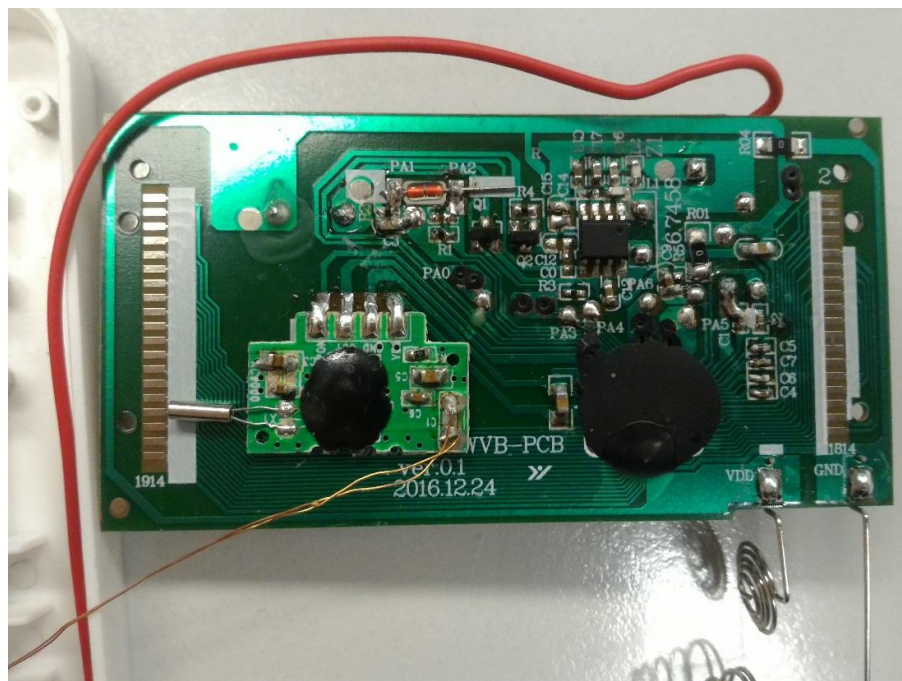
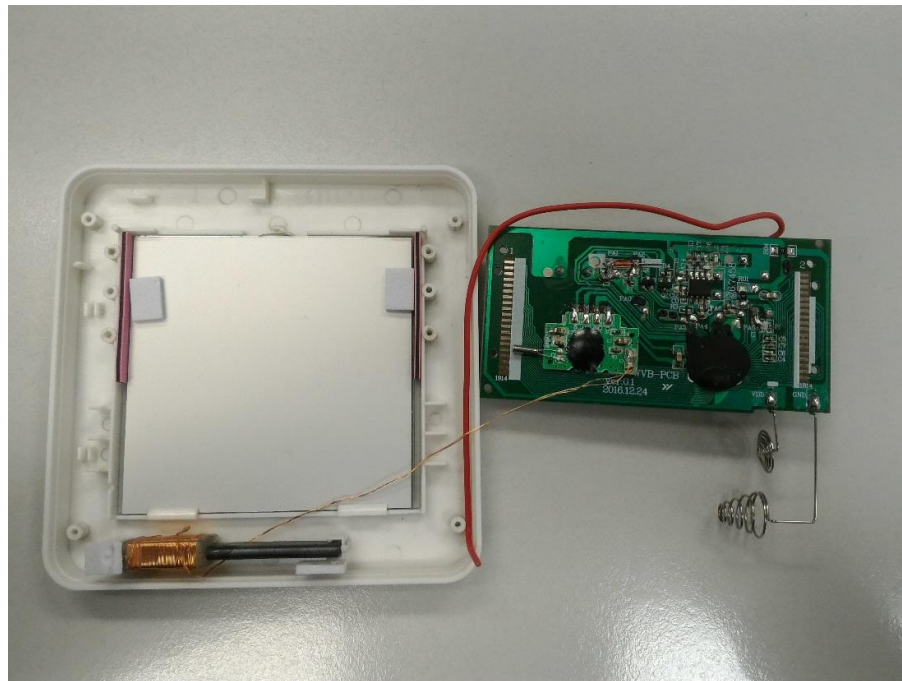
Appendix A



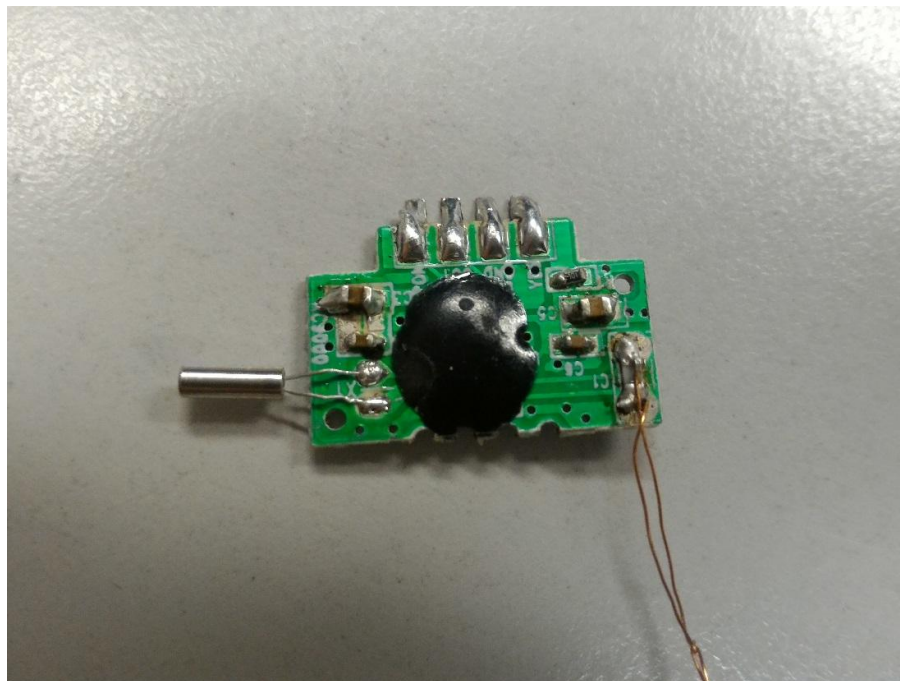
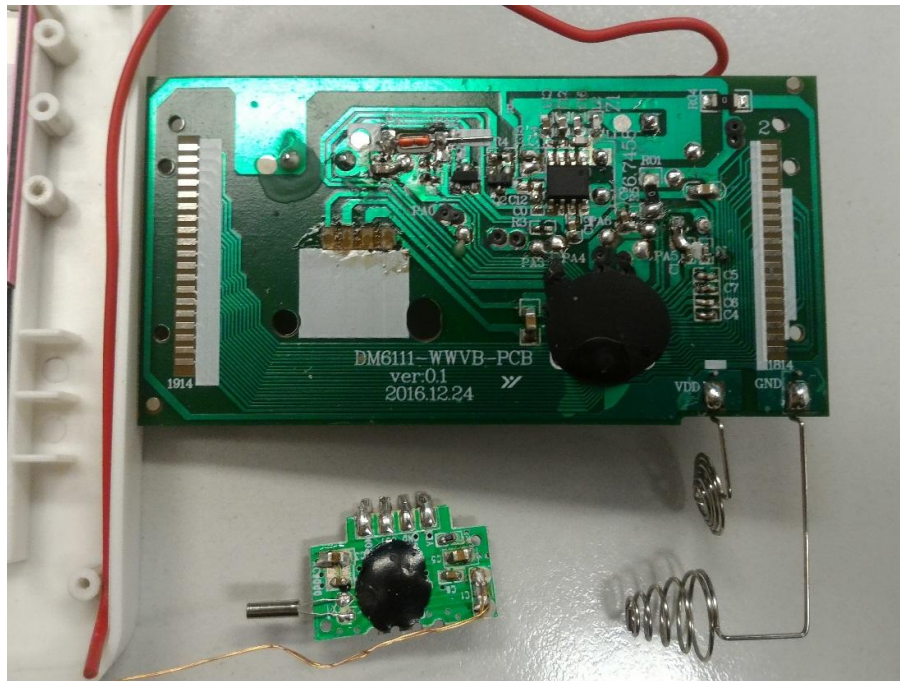
Appendix A



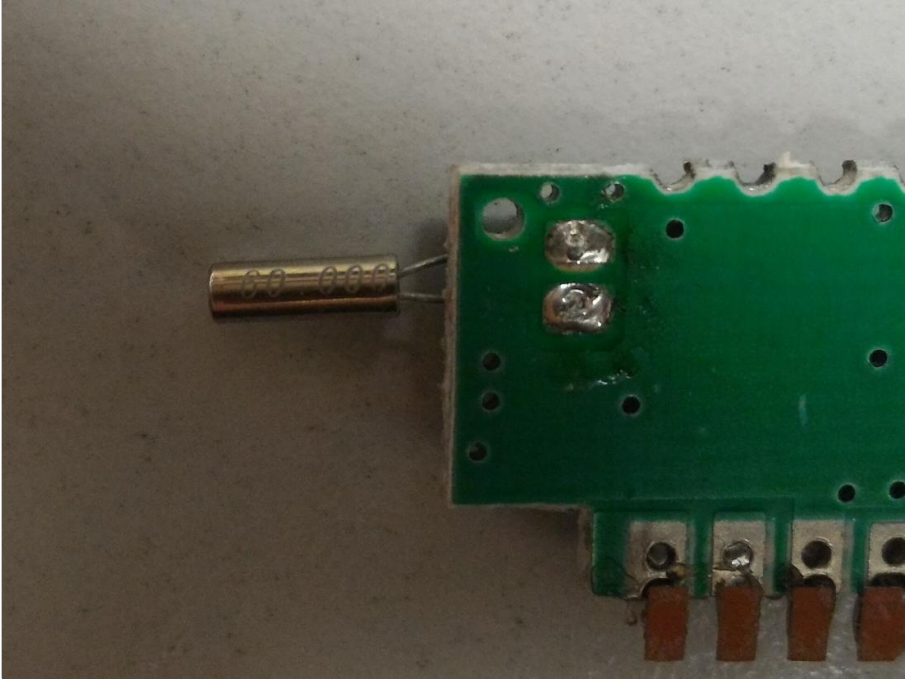
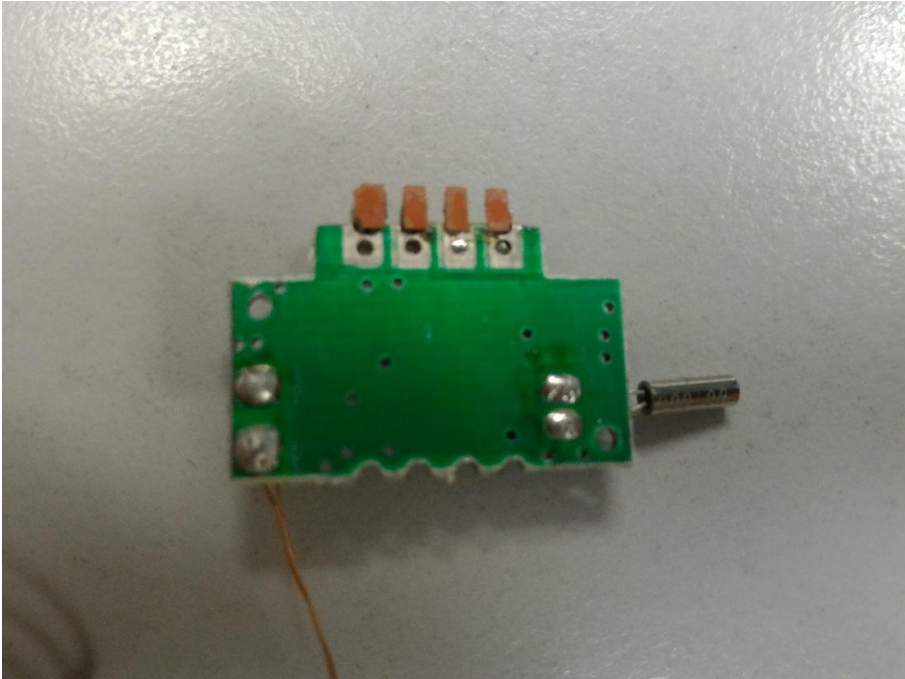
Appendix A



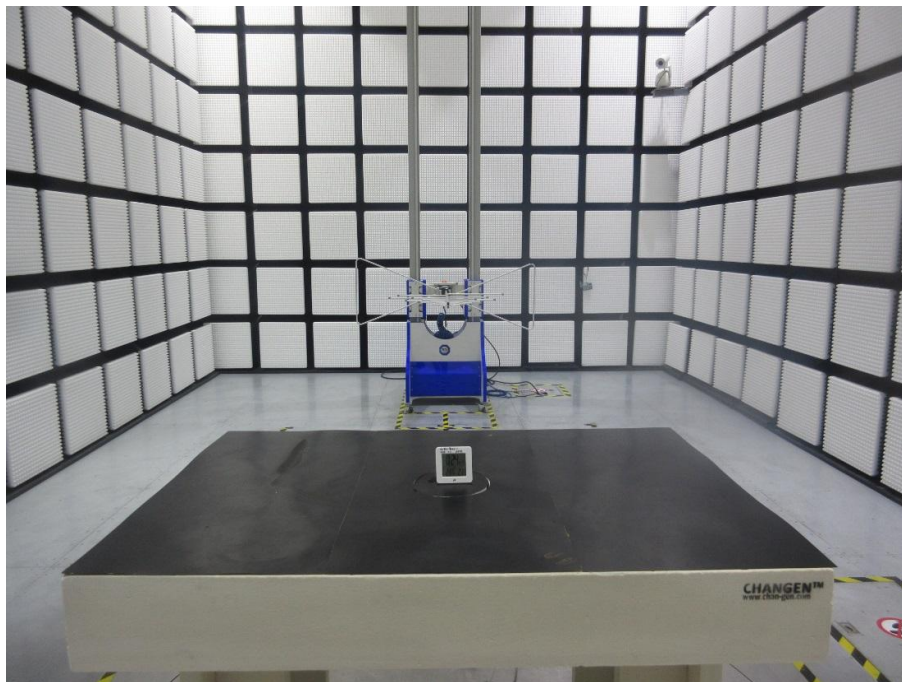
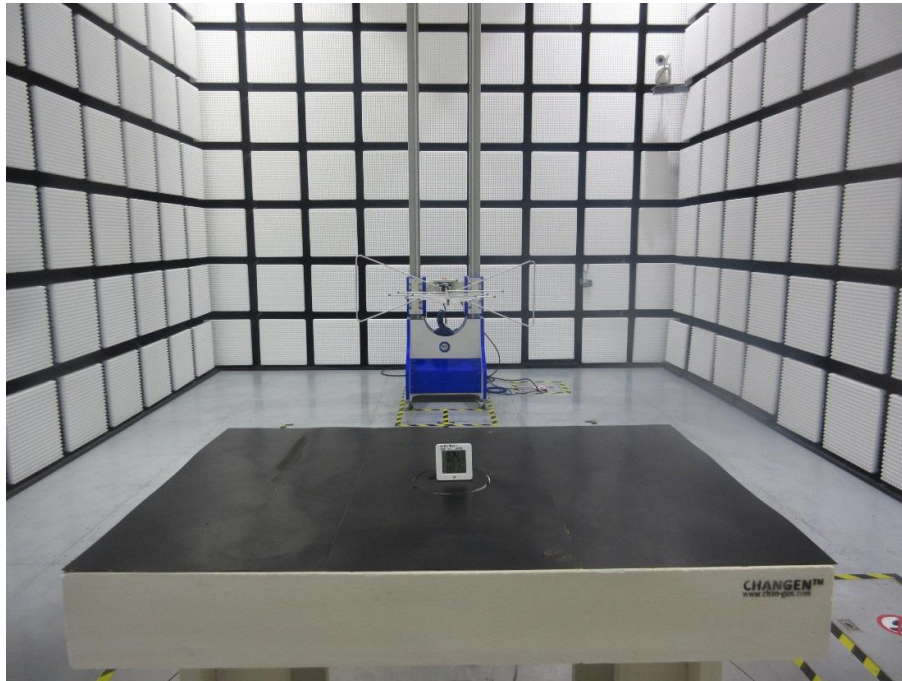
Appendix A



Appendix A



9 Appendix B - Setup Photographs of EUT



10 Appendix C - General Product Information



LIDL US LLC, 3500 S Clark Street, Arlington, VA 22202

To: TÜV SÜD HKG Ltd.

Attention: **Mr. Edmond Fung**

From: **Mr. David Matter**

Fax No:

Date: April 5, 2017

Total Page (Cover Included): 1

Declaration Letter

Subject: Declaration Letter for Model Number

We:

Officially notify TÜV SÜD HKG Ltd. that the <<Additional Model>> have the same technical construction including circuit diagram, PCB Layout, components and component layout, all electrical construction and mechanical construction, with <<PRODUCT>>, <<Main Test Model>>. The difference lies only on different color of the different models.

<<Additional Model >>: HGO2132B-US-RX, HGO2132A-US-TX

<<Main Test Model >>: HGO2132A-US-RX, HGO2132B-US-TX

<<Product>>: Temperature Station LCD

Applicant:

April 5, 2017

(Date)

Matter

Digitally signed by Matter
DN: cn=Matter, o=LIDL, ou=LLC,
email=david.matter@lidl.us,
c=US

(Applicant's authorized signature and company Chop) Date: 2017.04.05 19:19:43 +04'00