

FCC - TEST REPORT

Report Number : **60.792.17.006.01B** Date of Issue : April 6, 2017

Model : **HG02132A-US-RX, HG02132B-US-RX**

Product Type : **Temperature Station LCD**

Applicant : Lidl US Trading, LLC

Address : 3500 S. Clark Street, Arlington, Virginia, United States

Production Facility : DIGI MAX TECHNOLOGY LIMITED

Address : Room 708, Building 3, Xinyuan B area, Jinshan Industrial District, Fuzhou, China

Test Result : ☒ **Positive** ☐ **Negative**

Total pages including Appendices : 23

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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: 2AJ9O-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	☒	☐	☐
FCC Title 47 Part 15.107 Conduct Emission 150kHz-30MHz	N/A	☐	☐	☒

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.

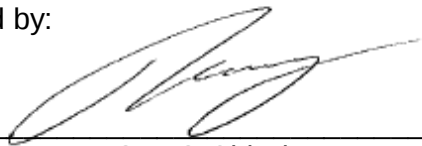
Sample Received Date: February 7, 2017

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:



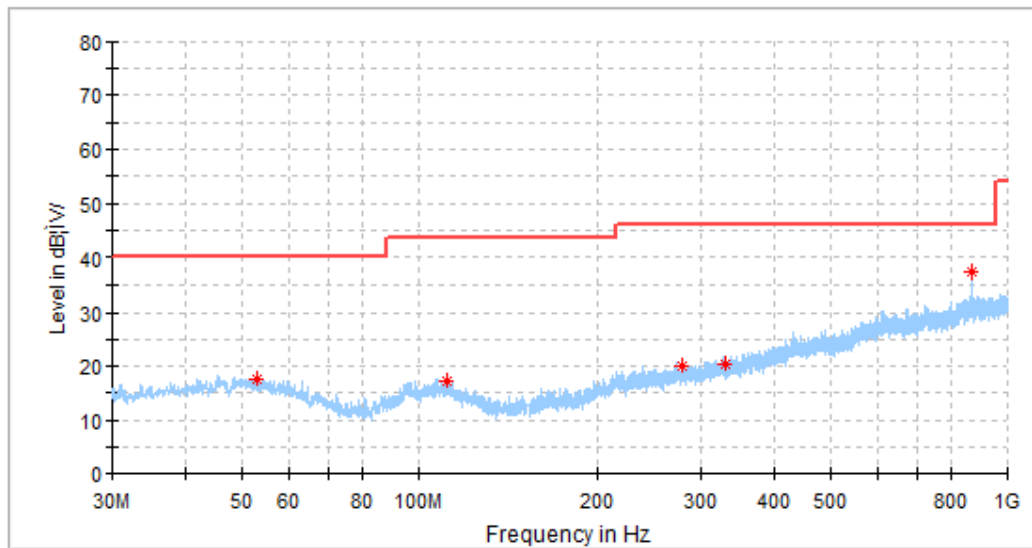
CHAN Kwan Ho Alex
EMC Project Engineer

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	
☒	Passed
☐	Not Passed

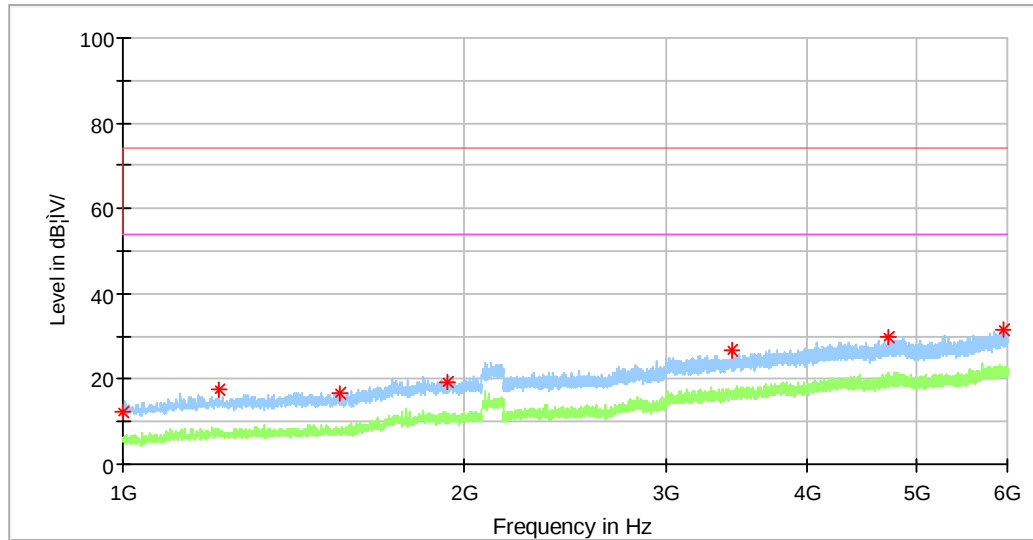


Frequency (MHz)	QuasiPeak (dBμV/m)	Limit (dBμV/m)	Margin (dB)
52.976875	17.48	40.00	-22.52
111.722500	17.07	43.50	-26.43
279.532500	19.97	46.00	-26.03
330.700000	20.43	46.00	-25.57
867.776875	37.12	46.00	-8.88

Radiated Emission

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

Test Result
☒ Passed
☐ Not Passed

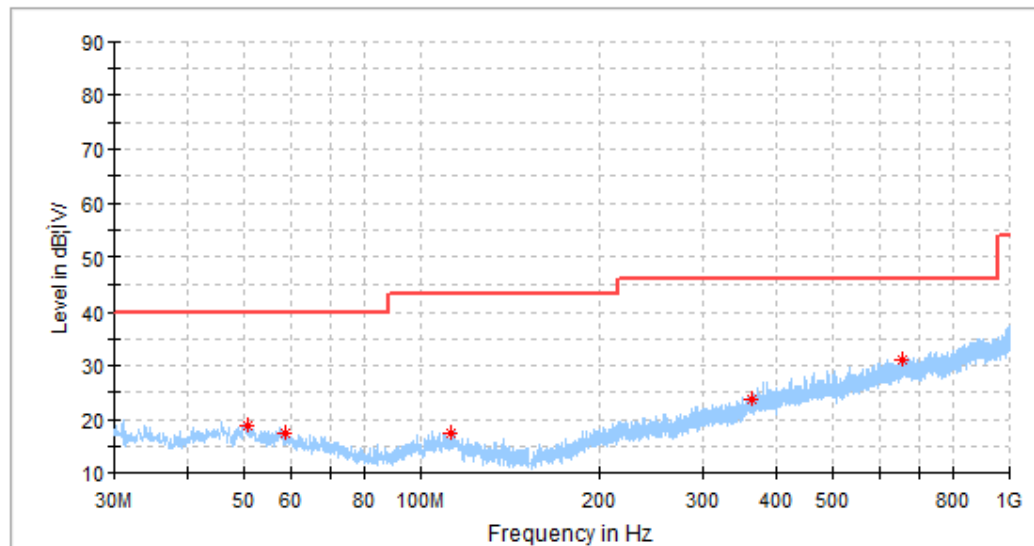


Frequency (MHz)	MaxPeak (dBµV/m)	Average (dBµV/m)	Limit (dBµV/m)	Margin (dB)
1000.000000	12.24	---	54.00	-41.76
1215.000000	17.40	---	74.00	-56.60
1550.500000	16.55	---	74.00	-57.45
1926.500000	19.34	---	74.00	-54.66
3435.500000	26.87	---	74.00	-47.13
4713.000000	29.98	---	74.00	-44.02
5946.000000	31.71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

Radiated Emission

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

Test Result
☒ Passed
☐ Not Passed

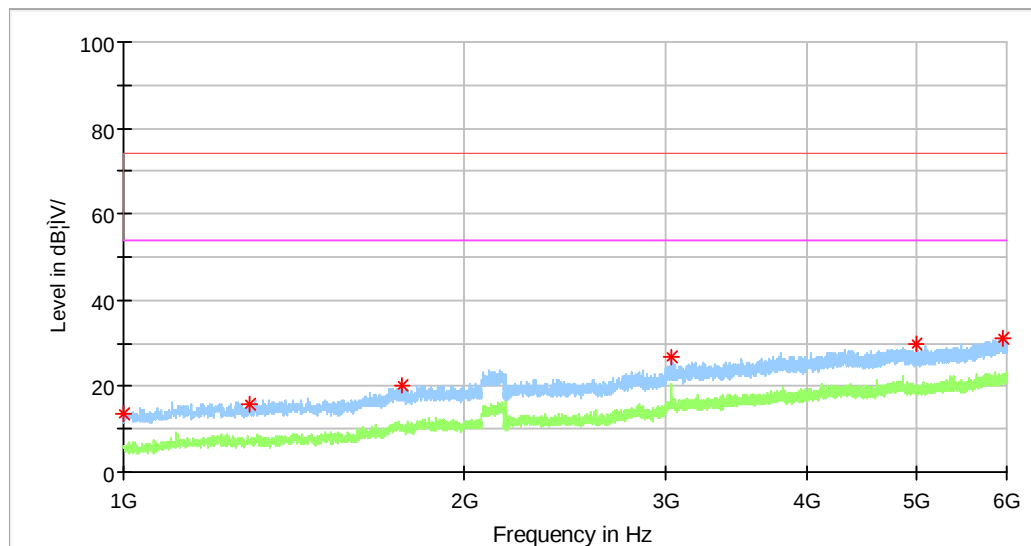


Frequency (MHz)	QuasiPeak (dBμV/m)	Limit (dBμV/m)	Margin (dB)
50.855000	18.71	40.00	-21.29
58.918125	17.49	40.00	-22.51
112.510625	17.52	43.50	-25.98
363.740625	23.73	46.00	-22.27
658.863125	31.02	46.00	-14.98

Radiated Emission

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

Test Result
☒ Passed
☐ Not Passed

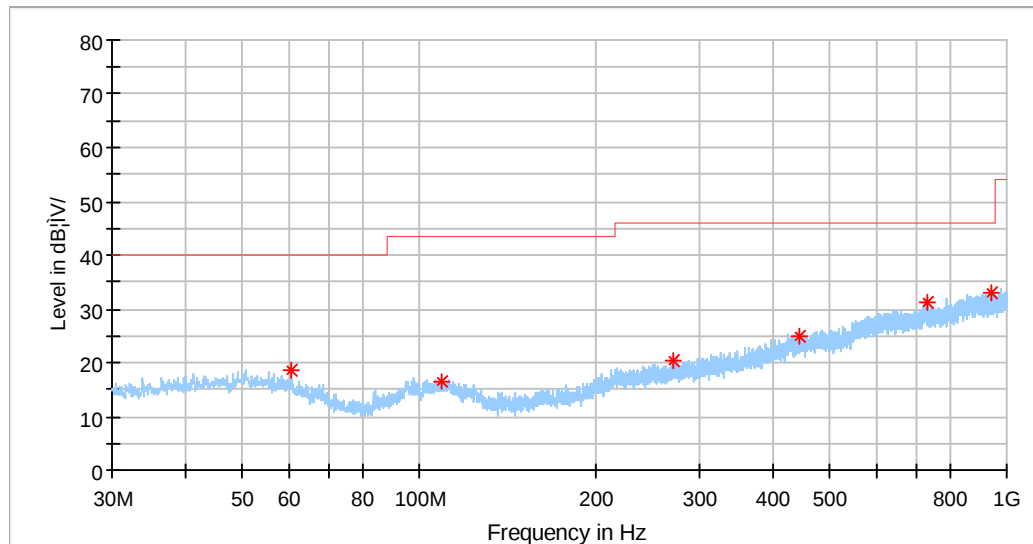


Frequency (MHz)	MaxPeak (dBµV/m)	Average (dBµV/m)	Limit (dBµV/m)	Margin (dB)
1000.000000	13.72	---	54.00	-40.28
1291.000000	15.74	---	74.00	-58.26
1759.500000	20.30	---	74.00	-53.70
3036.000000	26.55	---	74.00	-47.45
4998.000000	30.02	---	74.00	-43.98
5956.500000	31.18	---	74.00	-42.82

Radiated Emission

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

Test Result
☒ Passed
☐ Not Passed

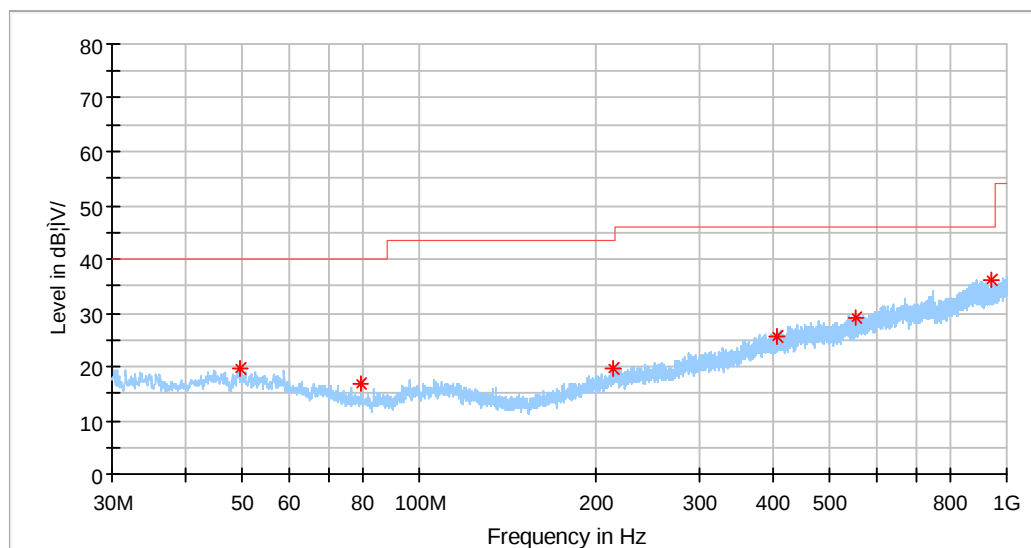


Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)
60.615625	18.47	40.00	-21.53
108.873125	16.54	43.50	-26.96
270.802500	20.29	46.00	-25.71
442.553125	24.96	46.00	-21.04
733.492500	31.34	46.00	-14.66
942.285000	33.11	46.00	-12.89

Radiated Emission

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

Test Result
☒ Passed
☐ Not Passed

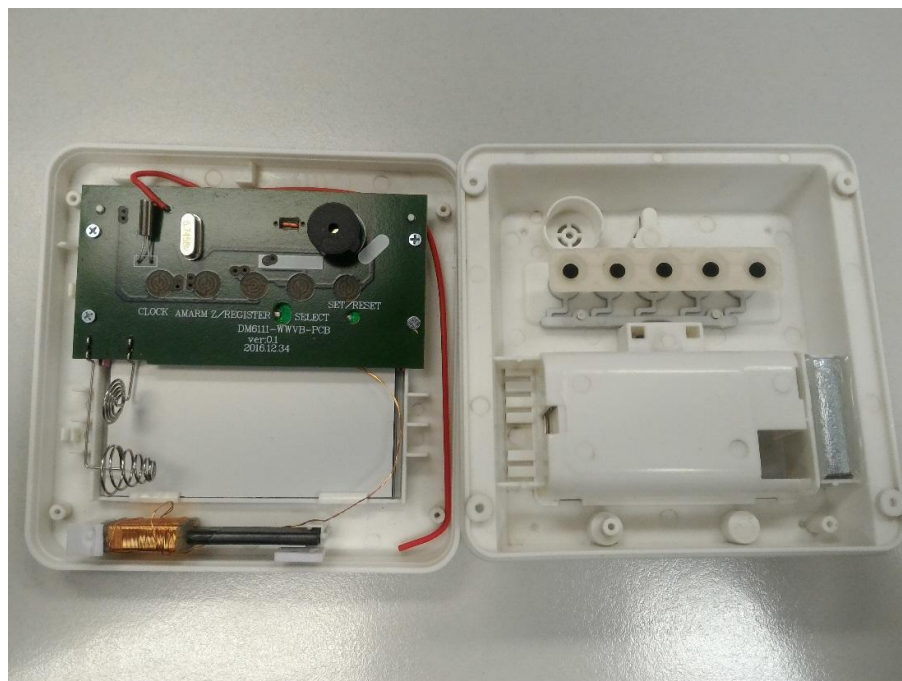
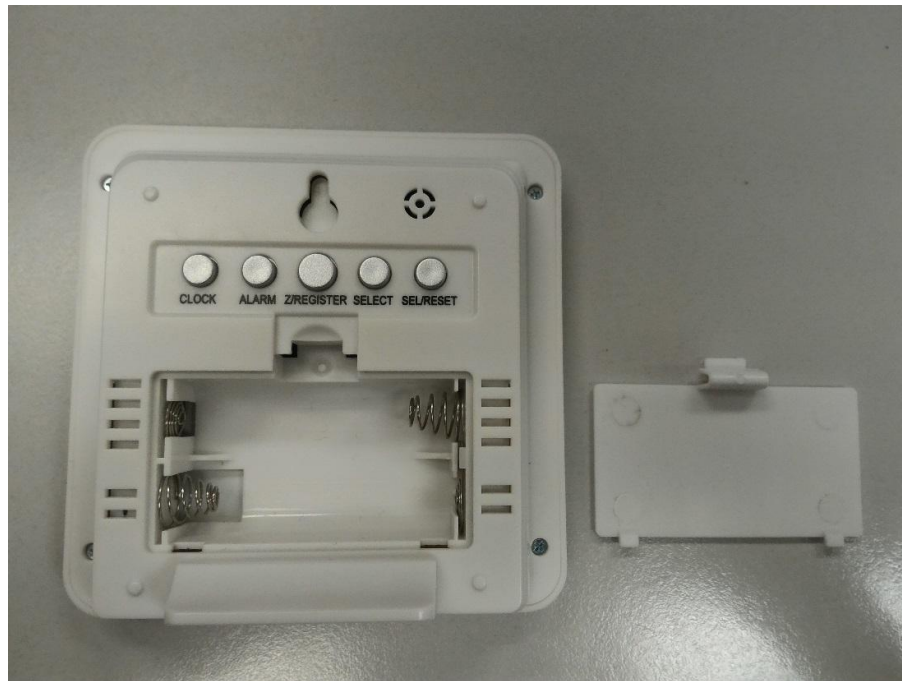


Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)
49.703125	19.79	40.00	-20.21
79.651875	16.73	40.00	-23.27
213.269375	19.50	43.50	-24.00
406.966250	25.75	46.00	-20.25
556.043125	29.18	46.00	-16.82
943.133750	36.13	46.00	-9.87

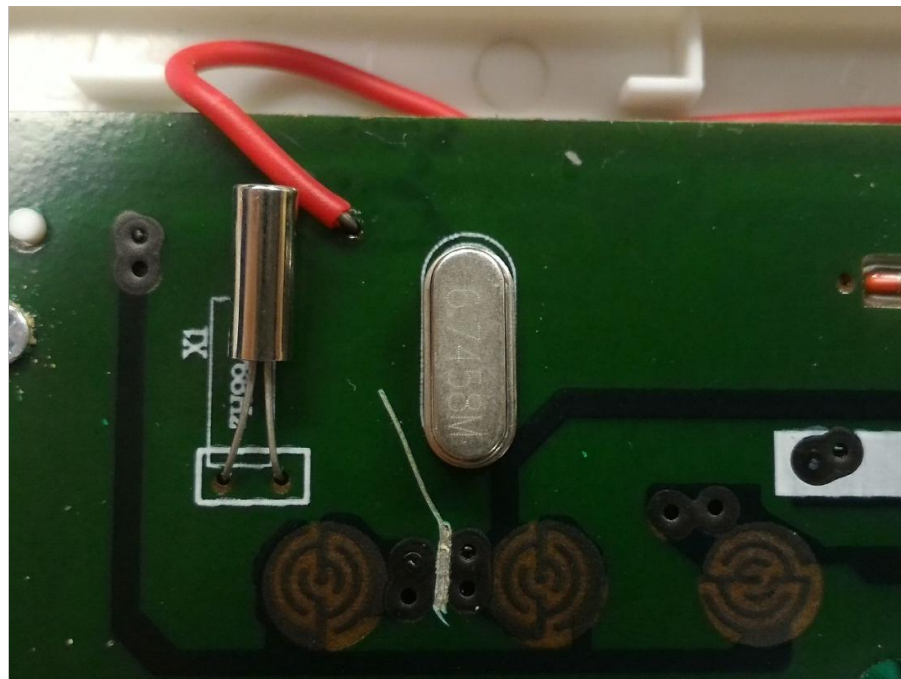
8 Appendix A - Photographs of EUT

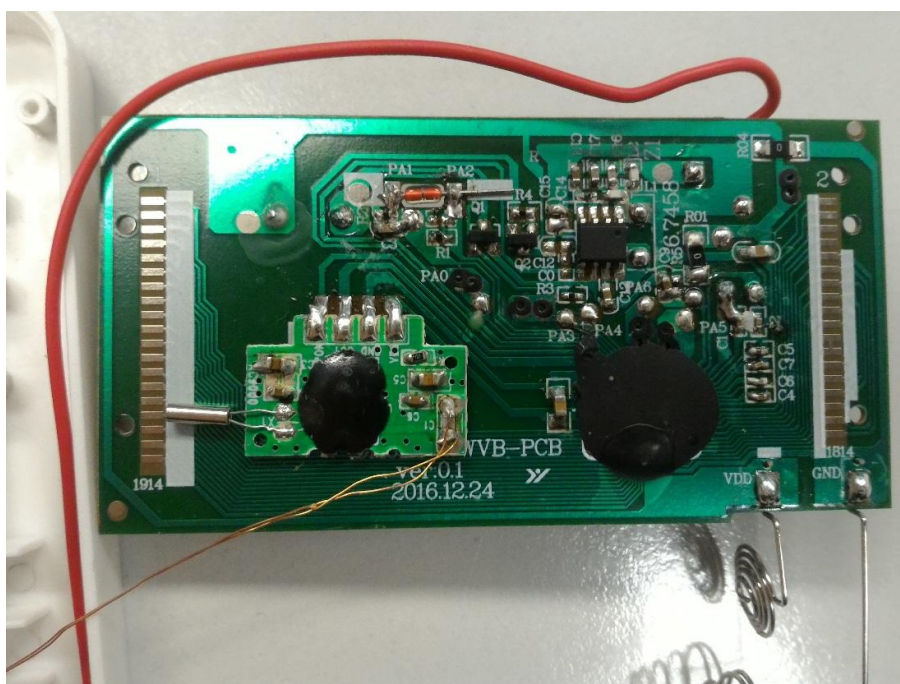


Appendix A

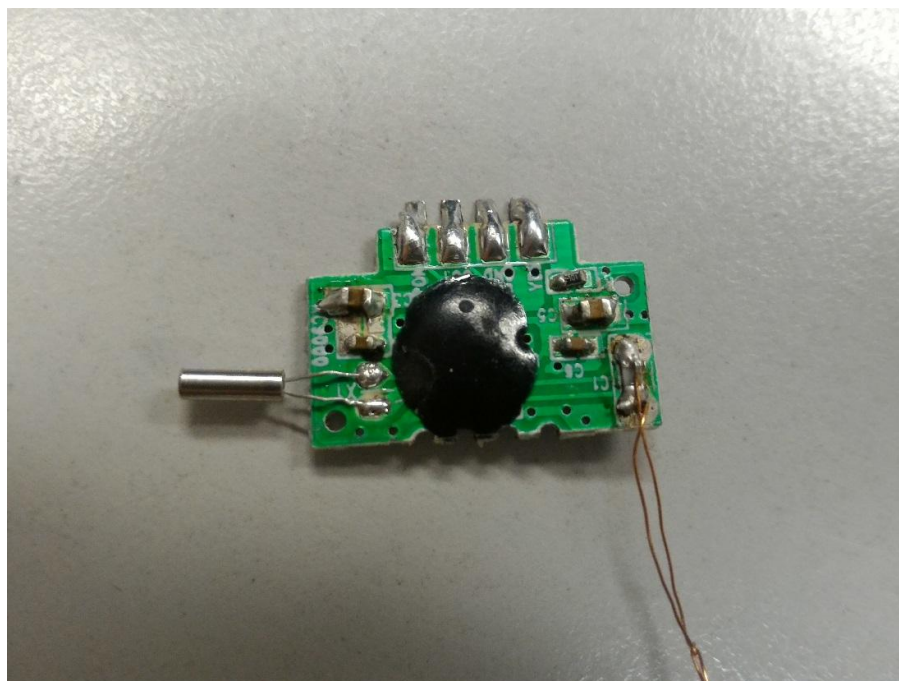
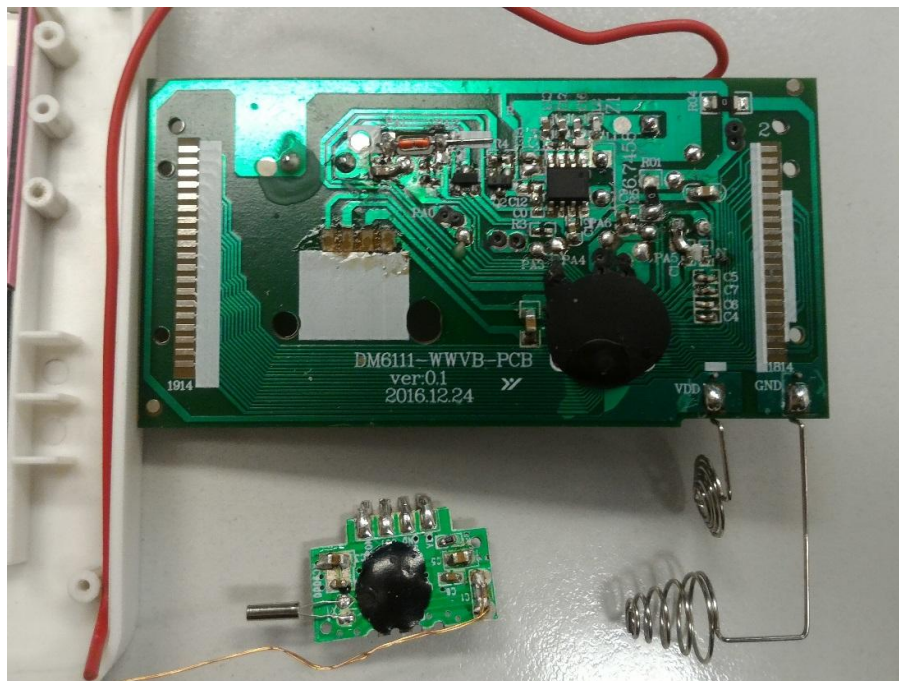


Appendix A

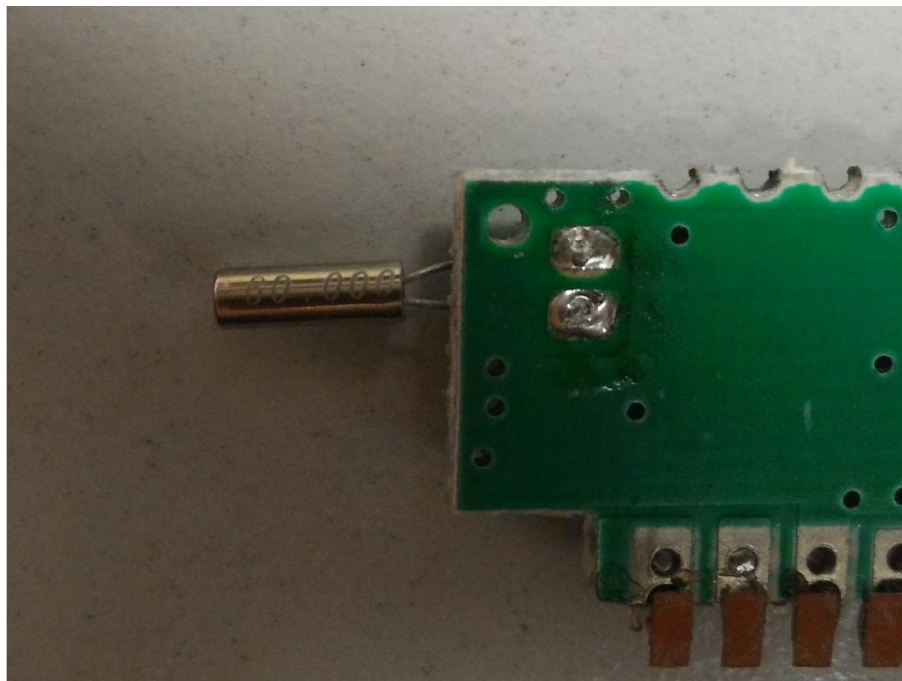
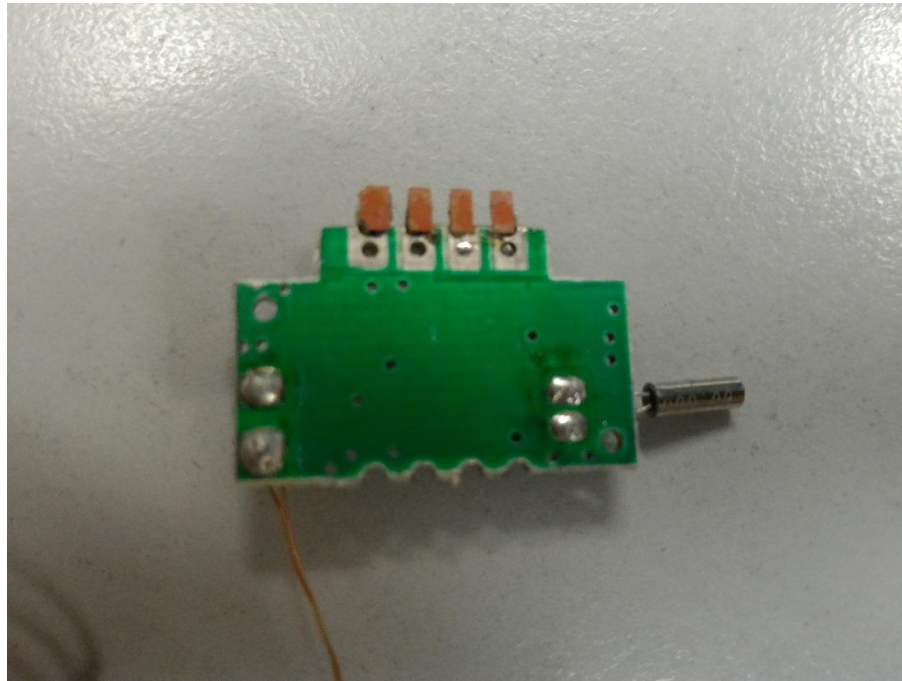




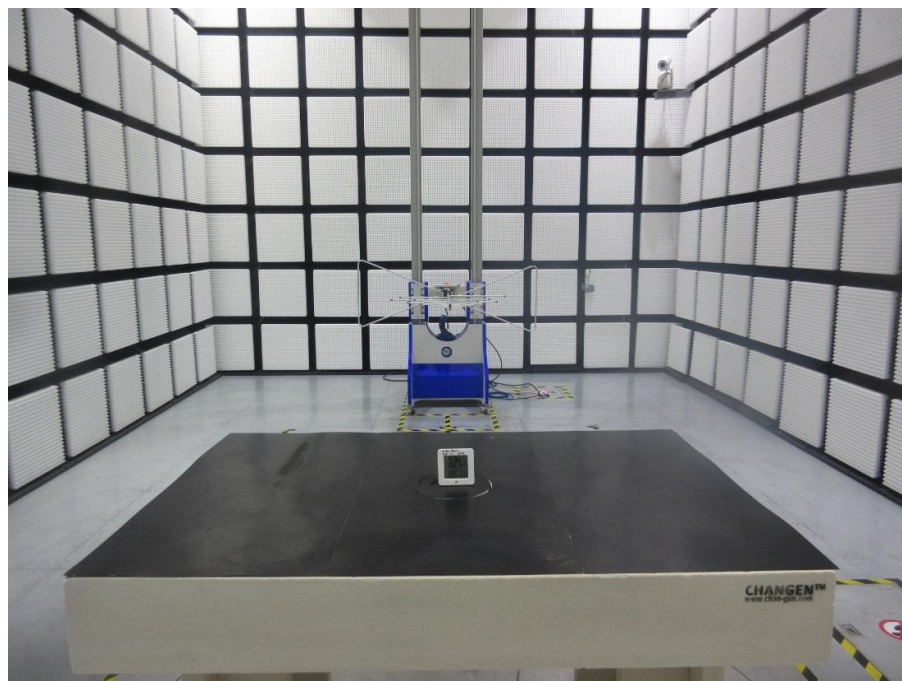
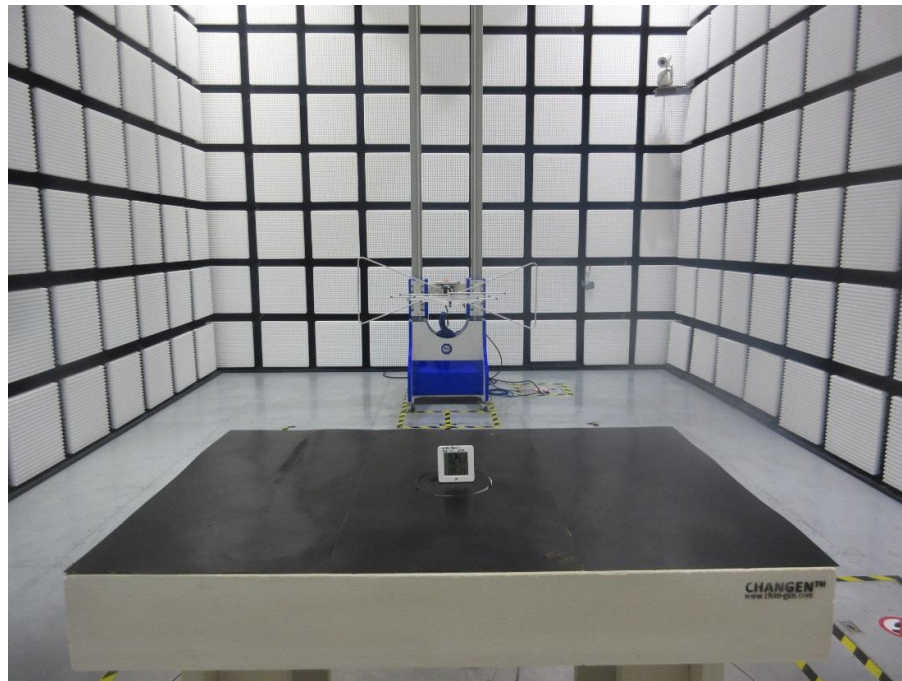
Appendix A



Appendix A



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 19:43:04'00