TEST REPORT

REPORT No.: DTI2025EE030812 Date: 2025-08-15

Applicant Company Name：Shenzhen Fluence Lighting Technology Co., Ltd.

Applicant Company Address：B701, Building 1, Tian'an Digital City Innovation Park, No.475 Huangge North Road, Huanggekeng Community, Longcheng Street,Longgang District, Shenzhen.

The following sample(s) was/were submitted and identified on behalf of the client as:

Sample Name	:	LED bulb
Model No.	:	See the next page
Manufacturer	:	Shenzhen Fluence Lighting Technology Co., Ltd.
Manufacturer Address	:	B701, Building 1, Tian'an Digital City Innovation Park, No.475 Huangge North Road, Huanggekeng Community, Longcheng Street,Longgang District, Shenzhen.
Sample Receiving Date	:	August 12, 2025
Testing Period	:	From August 12, 2025 to August 15, 2025
Results	:	Please refer to next page(s).

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Summary of Test Results:

TEST REQUEST	**CONCLUSION**
A EU RoHS Directive 2011/65/EU and its amendment directives 2015/863/EU (**RoHS**)	**Pass**

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Shenzhen Deesev Testing International Corp

Approved by: _____
lab manager

TEST REPORT

Model No.

Product Model	Product Model	Product Model
G9S-QZG-03C01-27-G9	C35-QZG-04C01-27-E14	A60-QZG-06F01-27-E27
G9S-QZG-03C01-30-G9	C35-QZG-04C01-30-E14	A60-QZG-06F01-30-E27
G9S-QZG-03C01-35-G9	C35-QZG-04C01-35-E14	A60-QZG-06F01-35-E27
G9S-QZG-03C01-40-G9	C35-QZG-04C01-40-E14	A60-QZG-06F01-40-E27
G9S-QZG-03C01-50-G9	C35-QZG-04C01-50-E14	A60-QZG-06F01-50-E27
G9S-QZG-03C01-60-G9	C35-QZG-04C01-60-E14	A60-QZG-06F01-60-E27
G9S-QZG-03F01-27-G9	C35-QZG-04F01-27-E14	A60-QZG-06C01-27-E27
G9S-QZG-03F01-30-G9	C35-QZG-04F01-30-E14	A60-QZG-06C01-30-E27
G9S-QZG-03F01-35-G9	C35-QZG-04F01-35-E14	A60-QZG-06C01-35-E27
G9S-QZG-03F01-40-G9	C35-QZG-04F01-40-E14	A60-QZG-06C01-40-E27
G9S-QZG-03F01-50-G9	C35-QZG-04F01-50-E14	A60-QZG-06C01-50-E27
G9S-QZG-03F01-60-G9	C35-QZG-04F01-60-E14	A60-QZG-06C01-60-E27
G9L-QZG-04C01-27-G9	T42-N08-WS1-3000K	A60-QZG-08F01-E27
G9L-QZG-04C01-30-G9		A60-QZG-08C01-E27
G9L-QZG-04C01-35-G9	T42-N08-WS1-4000K	A60-QZG-08F01-27-E27
G9L-QZG-04C01-40-G9		A60-QZG-08F01-30-E27
G9L-QZG-04C01-50-G9	T42-N08-WS1-6000K	A60-QZG-08F01-35-E27
G9L-QZG-04C01-60-G9		A60-QZG-08F01-40-E27
G9L-QZG-04F01-27-G9	T42-N08-CS1-3000K	A60-QZG-08F01-50-E27
G9L-QZG-04F01-30-G9		A60-QZG-08F01-60-E27
G9L-QZG-04F01-35-G9	T42-N08-CS1-4000K	A60-QZG-08C01-27-E27
G9L-QZG-04F01-40-G9		A60-QZG-08C01-30-E27
G9L-QZG-04F01-50-G9	T42-N08-CS1-6000K	A60-QZG-08C01-35-E27
G9L-QZG-04F01-60-G9		A60-QZG-08C01-40-E27
		A60-QZG-08C01-50-E27
		A60-QZG-08C01-60-E27

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Results:

1、EU RoHS Directive 2011/65/EU and its amendment directives on XRF

Test method: With reference to IEC 62321-3-1:2013, Screening by X-ray Fluorescence Spectroscopy (XRF)

Seq. No.	Tested Part(s)	Results				
		Pb	Cd	Hg	Cr	Br
1	Transparent Glass	X	BL	BL	BL	BL
2	White Coating	BL	BL	BL	BL	BL
3	Yellow Coating	BL	BL	BL	BL	BL
4	Transparent Glass	BL	BL	BL	BL	BL
5	Gold Metal Pins	BL	BL	BL	BL	N/A
6	Silver Metal Pins	BL	BL	BL	BL	N/A
7	Transparent Soft Plastic	BL	BL	BL	BL	BL
8	MCPCB	BL	BL	BL	BL	N/A
9	LED	BL	BL	BL	BL	BL
10	Silver Metal Case	BL	BL	BL	BL	N/A
11	Yellow Viscose	BL	BL	BL	BL	BL
12	White Plastic Frame	BL	BL	BL	BL	BL
13	Black Plastic	BL	BL	BL	BL	X
14	Silver Metal Needle	BL	BL	BL	BL	N/A
15	Yellow Plastic Sticker	BL	BL	BL	BL	BL
16	Black Square Magnetic Ring	BL	BL	BL	BL	BL
17	Transformer Ceramic Frame	BL	BL	BL	BL	BL
18	Transformer Copper Winding	BL	BL	BL	BL	N/A
19	Electrolytic Capacitor Outer Layer Plastic Leather	BL	BL	BL	BL	BL
20	Electrolytic Capacitor Silver Metal Case	BL	BL	BL	BL	N/A

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Seq. No.	Tested Part(s)	Results				
		Pb	Cd	Hg	Cr	Br
21	Electrolytic Capacitor Internal Sticker	BL	BL	BL	BL	BL
22	Black Heat Shrink Tubing	BL	BL	BL	BL	BL
23	Color Ring Resistance	BL	BL	BL	BL	BL
24	Silver Metal Pin	BL	BL	BL	BL	N/A
25	Black Heat Shrink Tubing	BL	BL	BL	BL	BL
26	Black Plastic Frame	BL	BL	BL	BL	BL
27	Copper Winding	BL	BL	BL	BL	N/A
28	PCB	BL	BL	BL	BL	BL
29	Solder Point	BL	BL	BL	BL	N/A
30	Black Ceramic Body Chip	X	BL	BL	BL	BL
31	Patch Resistor	BL	BL	BL	BL	BL
32	Multiplayer Ceramic Chip Capacitors	BL	BL	BL	BL	BL
33	Transparent Plastic Case	BL	BL	BL	BL	BL
34	Green Capacitor Plastic Skin	BL	BL	BL	BL	BL
35	PCB	BL	BL	BL	BL	X
36	Solder Point	BL	BL	BL	BL	N/A
37	Metal Fuse	BL	BL	BL	BL	N/A
38	Gold Metal Wire	BL	BL	BL	BL	N/A
39	Black Ceramic Body Chip	X	BL	BL	BL	BL
40	Patch Resistor	BL	BL	BL	BL	BL
41	Transparent Glass Case	BL	BL	BL	BL	BL
42	Transparent Glass Case	BL	BL	BL	BL	BL

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Remark:

(1) Results were obtained by XRF for primary screening, and further chemical testing by ICP (for Cd, Pb, Hg), UV-Vis (for Cr(Ⅵ)) and GC-MS (for PBBs, PBDEs) are recommended to be performed, if the concentration exceeds the below warning value according to IEC 62321-3-1:2013.

Element	Unit	Non-metal	Metal	Composite Material
Cd	mg/kg	BL≤70-3σ< X <130+3σ≤OL	BL≤70-3σ< X <130+3σ≤OL	BL≤50-3σ< X <150+3σ≤OL
Pb	mg/kg	BL≤700-3σ< X <1300+3σ≤OL	BL≤700-3σ< X <1300+3σ≤ OL	BL≤500-3σ< X <1500+3σ≤OL
Hg	mg/kg	BL≤700-3σ< X <1300+3σ≤OL	BL≤700-3σ< X <1300+3σ≤OL	BL≤500-3σ< X <1500+3σ≤OL
Cr	mg/kg	BL≤700-3σ< X	BL≤700-3σ< X	BL≤500-3σ< X
Br	mg/kg	BL≤300-3σ< X	--	BL≤250-3σ< X

Note:

BL = Below Limit

OL = Over Limit

X = Inconclusive

N/A = Not Applicable

(2) The XRF screening test for RoHS elements – The reading may be different to the actual content in the sample be of non-uniformity composition.

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(3) The maximum permissible limit is quoted from the document 2011/65/EU and its amendment directives 2015/863/EU:

RoHS Restricted Substances	**Maximum Concentration Value (mg/kg) (by weight in homogenous materials)**
Cadmium (Cd)	≤100
Lead (Pb)	≤1000
Mercury (Hg)	≤1000
Hexavalent Chromium (Cr(VI))	≤1000
Polybrominated biphenyls (PBBs)	≤1000
Polybrominate ddiphenylethers (PBDEs)	≤1000
Di-2-ethylhexyl phthalate (DEHP)	≤1000
Benzyl-n-butyl phthalate (BBP)	≤1000
Di-n-butyl phthalate (DBP)	≤1000
Di-iso-butyl phthalate (DIBP)	≤1000

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2、The Test Results of Chemical Method:

Test method:

Lead, Cadmium, Mercury Content:
With reference to IEC 62321-5:2013 and IEC 62321-4:2013+AMD1:2017, by acid digestion and analysis was performed by Inductively Coupled Plasma- Optical Emission Spectrophotometer (ICP-OES)

Hexavalent Chromium Content (For metal material):
With reference to IEC 62321-7-1:2015, by boiling-water-extraction and analysis was performed by UV-visible spectrophotometer (UV-Vis)

Hexavalent Chromium Content (For non-metal material):
With reference to IEC 62321-7-2:2017, by alkaline digestion and analysis was performed by UV-visible spectrophotometer (UV-Vis)

PBBs & PBDEs Content:
With reference to IEC 62321-6:2015, by solvent extraction and analysis was performed by gas chromatographic/ mass spectrometer (GC-MS)

DEHP, BBP, DBP&.DIBP content:
With reference to IEC 62321-8:2017 by solvent extraction and analysis was performed by gas chromatographic -mass spectrometer (GC-MS)

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1) The test results of Pb

Item	Unit	MDL	Results			Limit
			1	30	39	
Lead(Pb)	mg/kg	2	ND	28101*	28163*	≤1000
Conclusion	/	/	**Pass**	**Pass**	**Pass**	/

Note:

- ND = Not Detected
- MDL = Method Detection Limit
- mg/kg = ppm
- *=According to the declaration from the client, Lead (Pb) in the sample is exempted by EU RoHS Directive 2011/65/EU based on 7(c)-I:Electrical and electronic components containing lead in a glass or ceramic other than dielectric ceramic in capacitors.

2) The test results of PBBs & PBDEs

Item	Unit	MDL	Results		Limit
			13	35	
Polybrominated Biphenyls (PBBs)					
Monobromobiphenyl	mg/kg	5	ND	ND	/
Dibromobiphenyl	mg/kg	5	ND	ND	/
Tribromobiphenyl	mg/kg	5	ND	ND	/
Tetrabromobiphenyl	mg/kg	5	ND	ND	/
Pentabromobiphenyl	mg/kg	5	ND	ND	/
Hexabromobiphenyl	mg/kg	5	ND	ND	/
Heptabromobiphenyl	mg/kg	5	ND	ND	/
Octabromobiphenyl	mg/kg	5	ND	ND	/
Nonabromodiphenyl	mg/kg	5	ND	ND	/
Decabromodiphenyl	mg/kg	5	ND	ND	/
Total content	mg/kg	/	ND	ND	≤1000
Polybrominated Diphenylethers (PBDEs)(Mon-Deca)					
Monobromodiphenyl ether	mg/kg	5	ND	ND	/
Dibromodiphenyl ether	mg/kg	5	ND	ND	/
Tribromodiphenyl ether	mg/kg	5	ND	ND	/
Tetrabromodiphenyl ether	mg/kg	5	ND	ND	/
Pentabromodiphenyl ether	mg/kg	5	ND	ND	/
Hexabromodiphenyl ether	mg/kg	5	ND	ND	/
Heptabromodiphenyl ether	mg/kg	5	ND	ND	/
Octabromodiphenyl ether	mg/kg	5	ND	ND	/
Nonabromodiphenyl ether	mg/kg	5	ND	ND	/
Decabromodiphenyl ether	mg/kg	5	ND	ND	/
Total content	mg/kg	/	ND	ND	≤1000
Conclusion	/	/	**Pass**	**Pass**	/

Note:

- ND = Not Detected
- mg/kg = ppm
- MDL = Method Detection Limit

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3) The test results of DEHP, BBP, DBP & DIBP

Item	Unit	MDL	Results					Limit
			1	2	3	4	7	
Di-2-ethylhexyl phthalate (DEHP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Benzyl-n-butyl phthalate (BBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-n-butyl phthalate (DBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-iso-butyl phthalate (DIBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Conclusion	/	/	**Pass**	**Pass**	**Pass**	**Pass**	**Pass**	/

Item	Unit	MDL	Results					Limit
			9	11	12	13	15	
Di-2-ethylhexyl phthalate (DEHP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Benzyl-n-butyl phthalate (BBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-n-butyl phthalate (DBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-iso-butyl phthalate (DIBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Conclusion	/	/	**Pass**	**Pass**	**Pass**	**Pass**	**Pass**	/

Item	Unit	MDL	Results					Limit
			16	17	19	21	22	
Di-2-ethylhexyl phthalate (DEHP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Benzyl-n-butyl phthalate (BBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-n-butyl phthalate (DBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-iso-butyl phthalate (DIBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Conclusion	/	/	**Pass**	**Pass**	**Pass**	**Pass**	**Pass**	/

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Item	Unit	MDL	Results					Limit
			23	25	26	28	30	
Di-2-ethylhexyl phthalate (DEHP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Benzyl-n-butyl phthalate (BBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-n-butyl phthalate (DBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-iso-butyl phthalate (DIBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Conclusion	/	/	**Pass**	**Pass**	**Pass**	**Pass**	**Pass**	/

Item	Unit	MDL	Results					Limit
			31	32	33	34	35	
Di-2-ethylhexyl phthalate (DEHP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Benzyl-n-butyl phthalate (BBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-n-butyl phthalate (DBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Di-iso-butyl phthalate (DIBP)	mg/kg	30	ND	ND	ND	ND	ND	≤1000
Conclusion	/	/	**Pass**	**Pass**	**Pass**	**Pass**	**Pass**	/

Item	Unit	MDL	Results				Limit
			39	40	41	42	
Di-2-ethylhexyl phthalate (DEHP)	mg/kg	30	ND	ND	ND	ND	≤1000
Benzyl-n-butyl phthalate (BBP)	mg/kg	30	ND	ND	ND	ND	≤1000
Di-n-butyl phthalate (DBP)	mg/kg	30	ND	ND	ND	ND	≤1000
Di-iso-butyl phthalate (DIBP)	mg/kg	30	ND	ND	ND	ND	≤1000
Conclusion	/	/	**Pass**	**Pass**	**Pass**	**Pass**	/

Note:

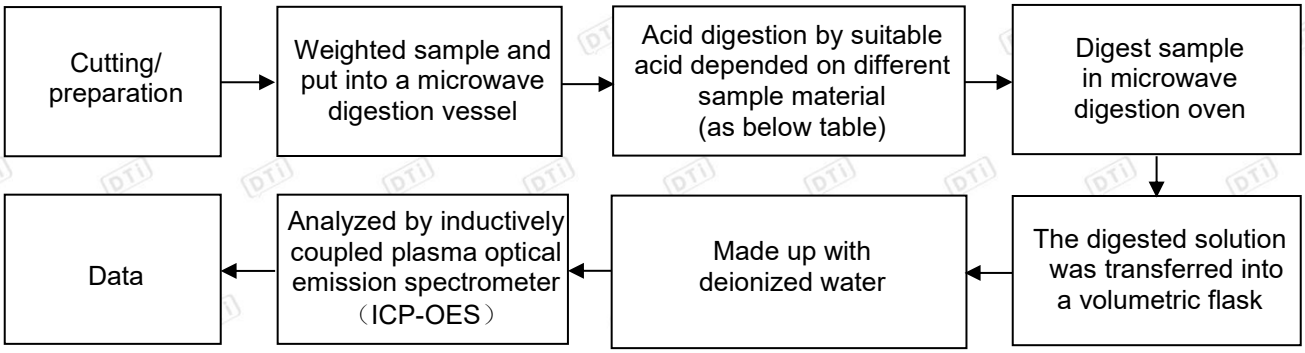
- ND = Not Detected
- 0.1%=1000mg/kg
- mg/kg = ppm
- MDL = Method Detection Limit
- Decision rule: According to DTI-CX-39《Decision rule for conformity of the test results》
- Flow chart appendix is included.
- Photo appendix is included.

Appendix I

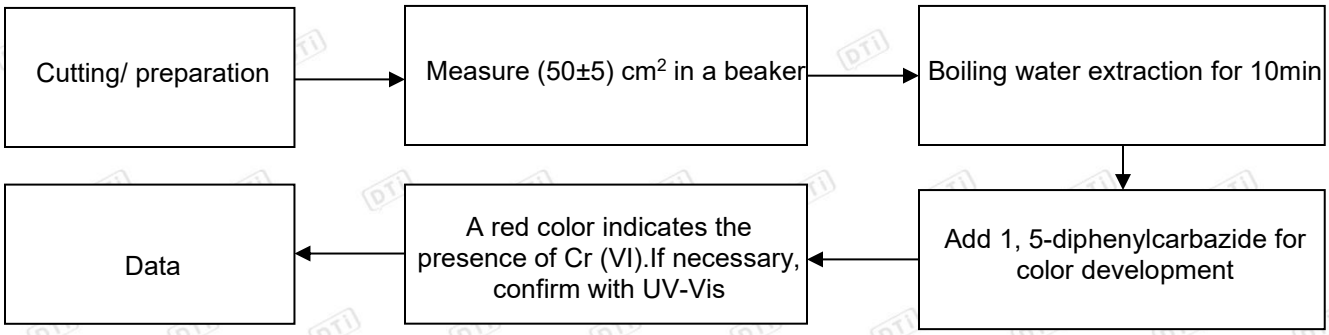
Test Flow chart

1. Test Flowchart for Cd / Pb /Hg content

These samples were dissolved totally by pre-conditioning method according to below flow chart.



2. Test Flowchart for Cr^{6+} content (Metal material)



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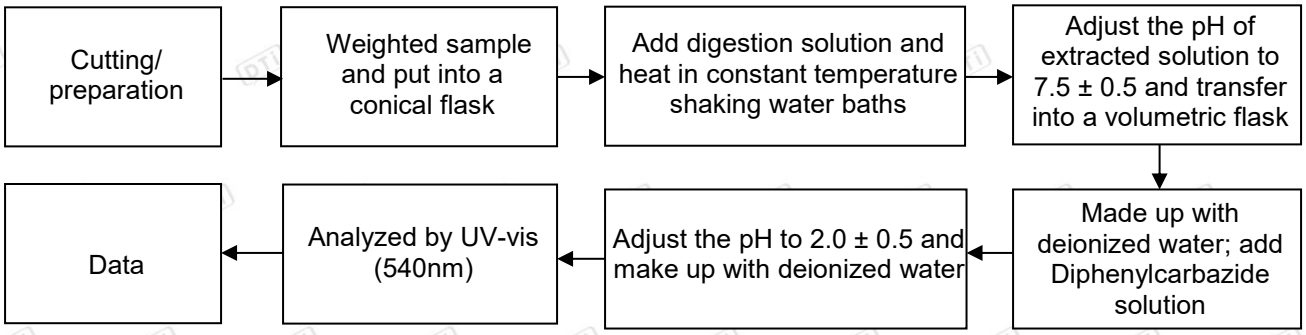
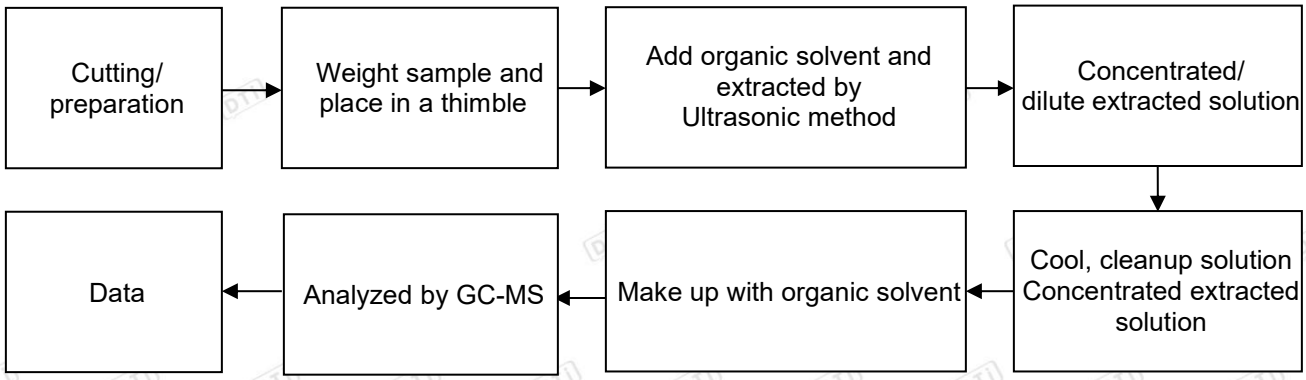
3. Test Flowchart for Cr^{6+} content (Non-metal material)



4. Test Flowchart for PBBs & PBDEs content



5. Test Flowchart for DEHP, BBP, DBP & DIBP content

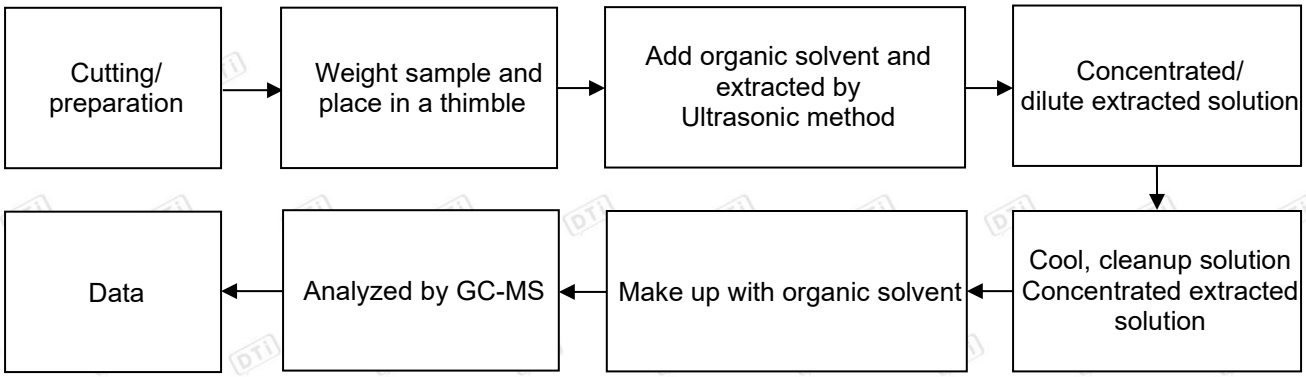


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Table:

Sample material	Digestion Acid
Steel, copper, aluminum, solder	Aqua regia, HNO_3, HCl, HF, H_2O_2
Glass	HNO_3/HF
Gold, platinum, palladium, ceramic	Aqua regia
Silver	HNO_3
Plastic	H_2SO_4, H_2O_2, HNO_3, HCl

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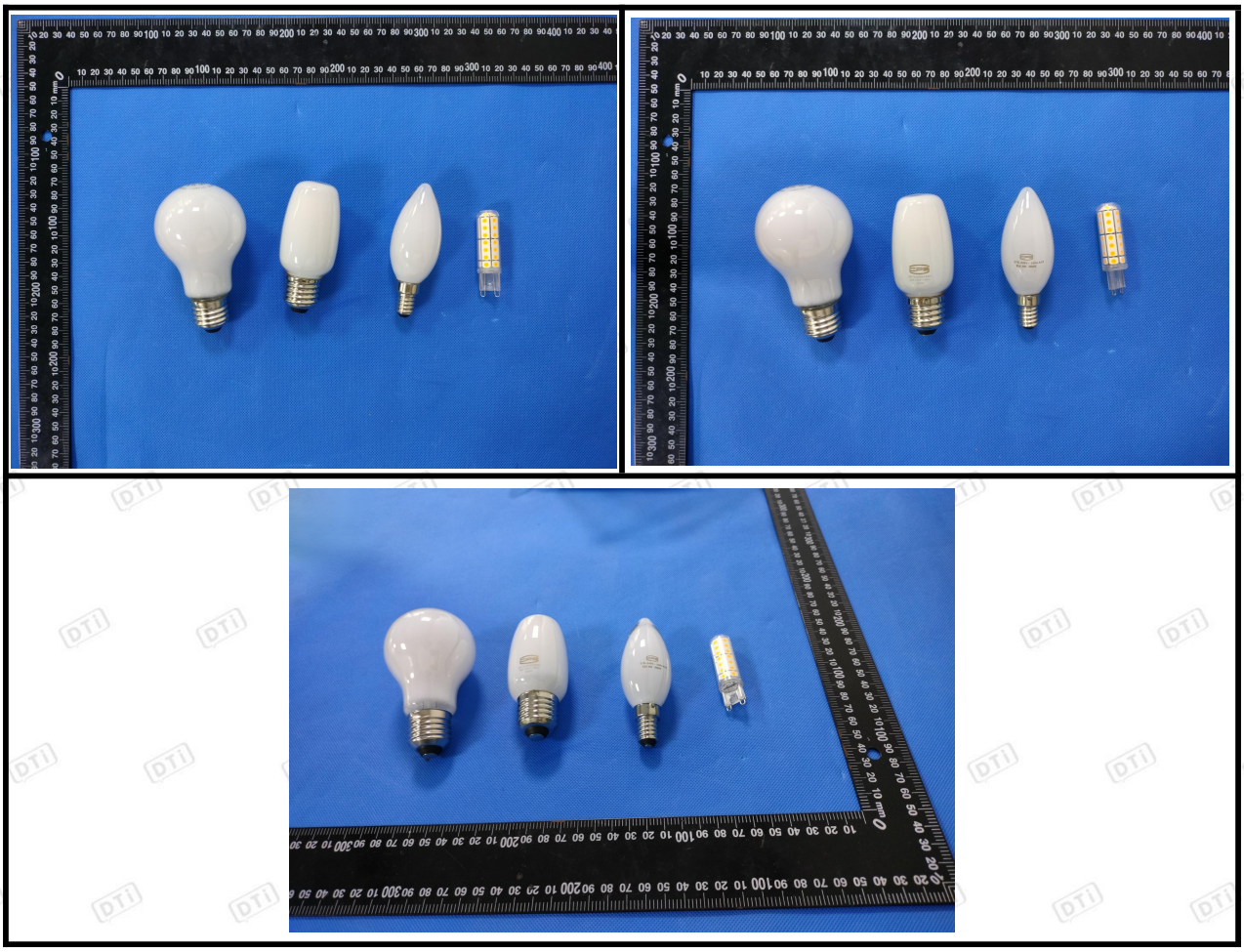
Appendix II

Photograph of Sample



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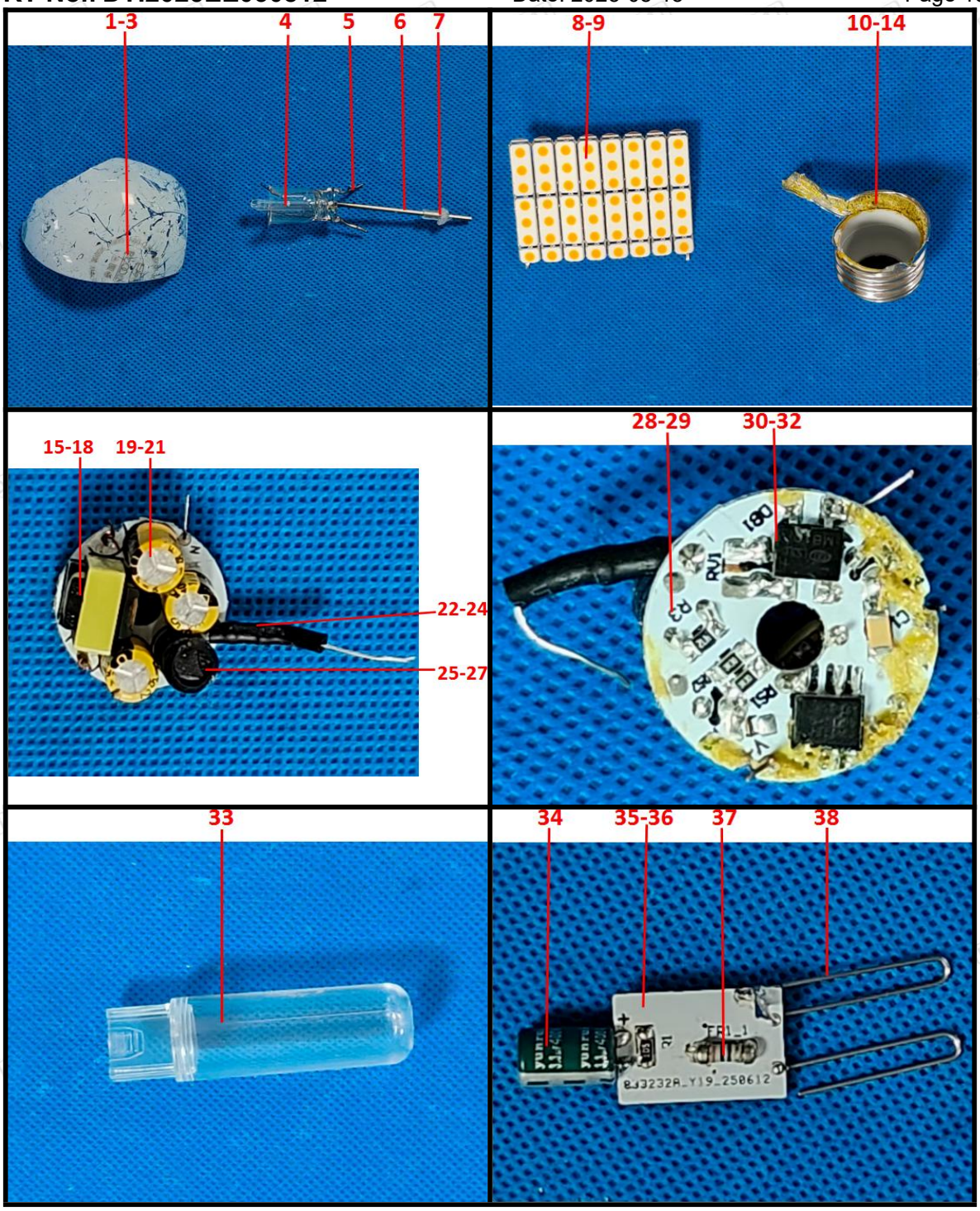

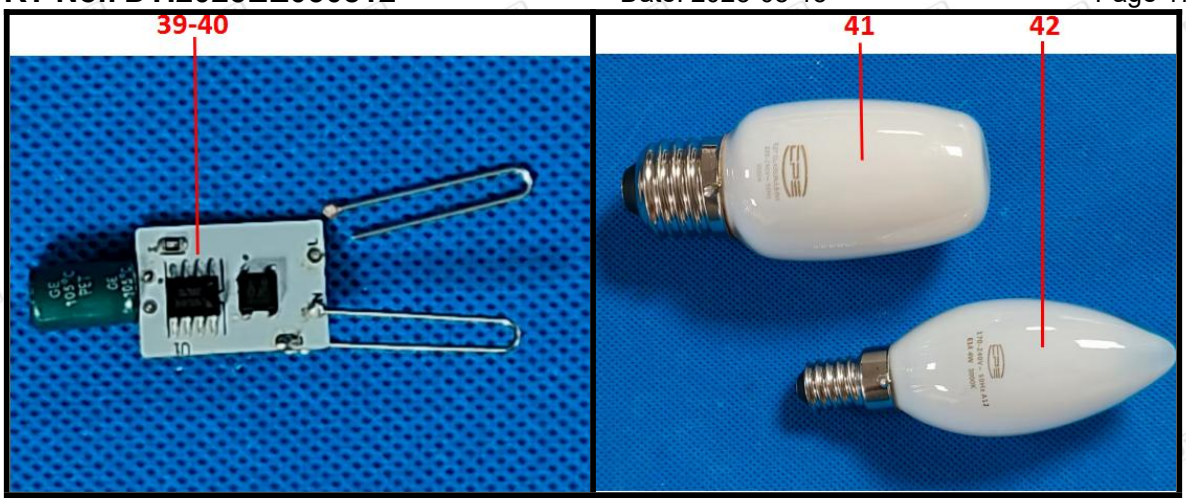

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