



# WEEE TEST REPORT

European Directive 2012/19/EU

Evaluation of WEEE Requirements for Electrical and Electronic Equipment

Test report No.....: RE-P-240000-1-001

Date of receipt .....: Aug. 00, 2024

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Test of period .....: Aug. 00, 2024 ~ Sep. 00, 2024

Applicant's name .....

Address.....

Manufacturer's name .....

Address.....

Factory's name .....

Address.....

Product name .....

Basic Model.....: U0000

Series Model.....: -

Test Specifications :

Directive..... Directive 2012/19/EU, Article 11 - Recovery targets

Test Standard/..... IEC TR 62632-2

Test Method..... SEL Incorporated Association

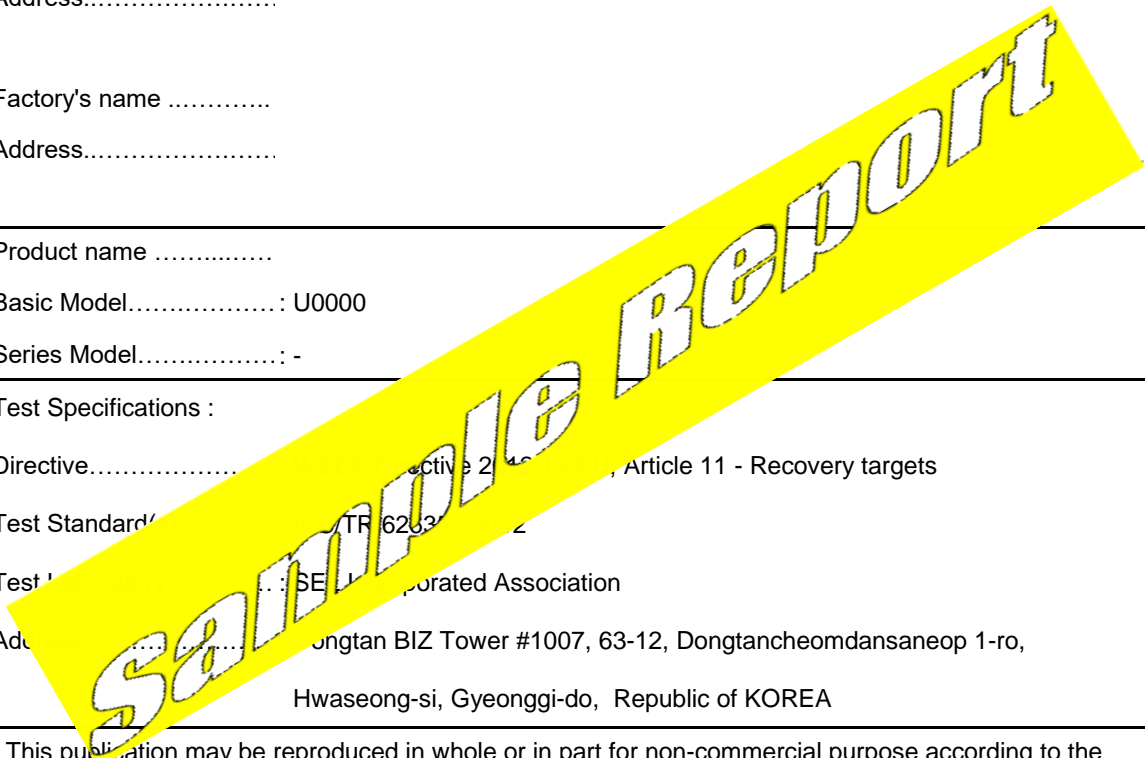
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Also this publication represents for the evaluation results of the issued test item only - any type of EEE

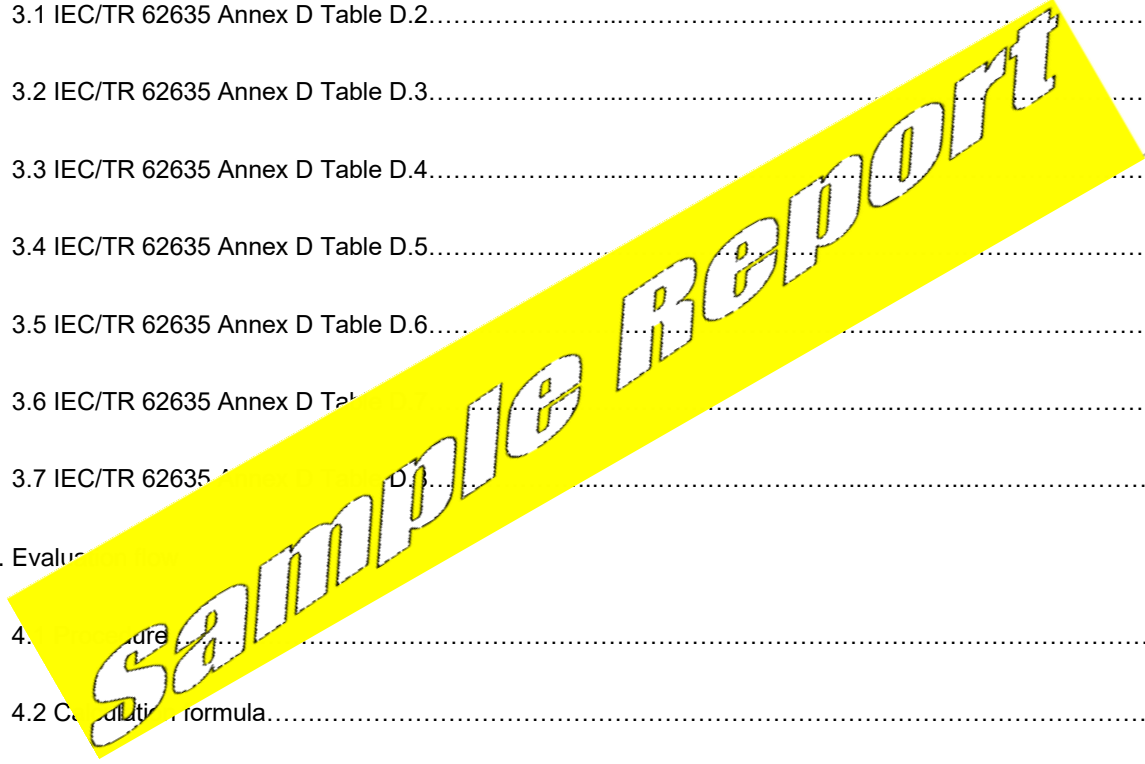
The evaluation results mean only the tested item is evaluated with recovery requirement of the WEEE Directive according to the evaluation procedures which is described in this publication.

Tested by : \_\_\_\_\_ Reviewed by : \_\_\_\_\_

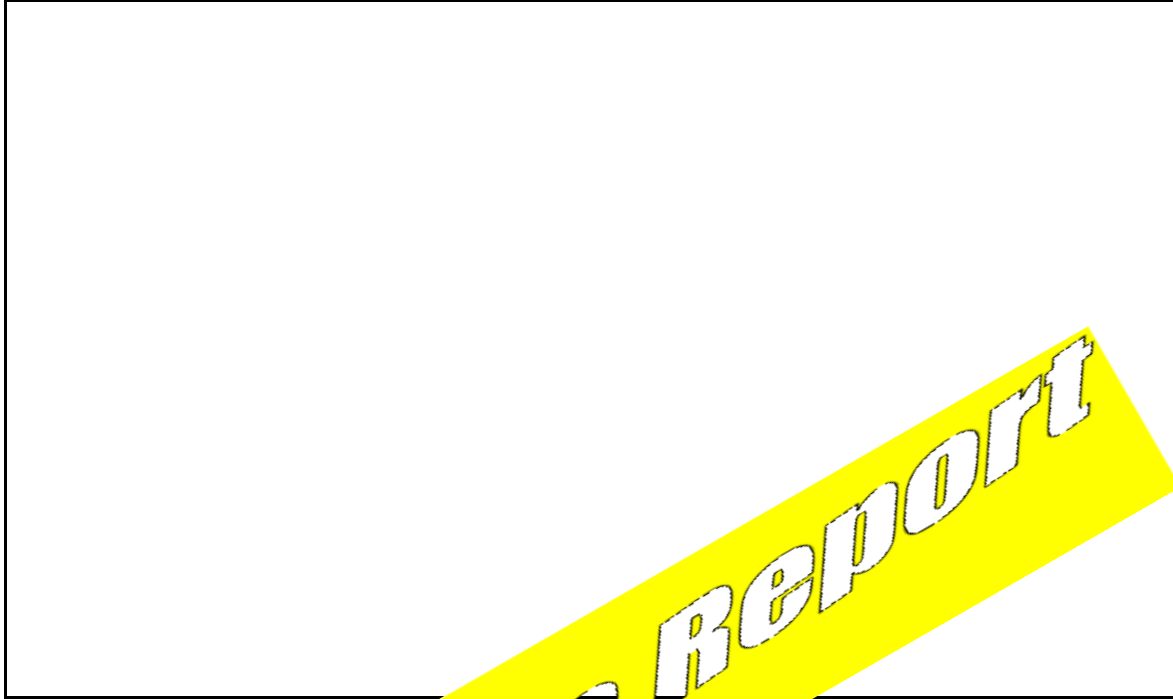


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# 1. General product information



DASH CAM REAR VIEW

## 1. General product information



ACCESARRIES ITEMS VIEW

# 1. General product information

Product Category according to Annex III of 2012/19/EU	
Type of Category	: Category 5. Small equipment
Total weight (g)	207.19
Connection technique	<ul style="list-style-type: none"> <li>▶ Screw</li> <li>▶ Bonding</li> <li>▶ Soldering</li> <li>▶ Cable connector</li> </ul>
Disassembly tools	<ul style="list-style-type: none"> <li>▶ Screw driver</li> <li>▶ Flat-head screwdriver</li> <li>▶ Long nose pliers</li> <li>▶ Wire cutters</li> <li>▶ Wrench</li> <li>▶ Utility knife</li> <li>▶ Cutting pliers</li> <li>▶ Nipper</li> </ul>
Disassembly instructions	
For information only	Annex 3 Recycling and recovery rate of calculation table
Recycling rate (%)	: 55.0
Recovery rate (%)	: 75.0

- SEL tested the Car Black Box was selected by applicant.
- The model U0000 is the basic model that was tested.

## 2. 2012/19/EU Summary

### 2.1 WEEE Directive 2012/19/EU, Article 11 - Recovery targets

Classification	Recycling rate (%)	Recovery rate (%)
<ul style="list-style-type: none"> <li>▶ Temperature exchange equipment</li> <li>▶ Large equipment</li> </ul>	80	85
<ul style="list-style-type: none"> <li>▶ Screens, monitors, and equipment containing screens having a surface greater than 100 cm<sup>2</sup></li> </ul>	70	80
<ul style="list-style-type: none"> <li>▶ Small equipment</li> <li>▶ Small IT and telecommunication equipment (no external dimension more than 50 cm)</li> </ul>	55	

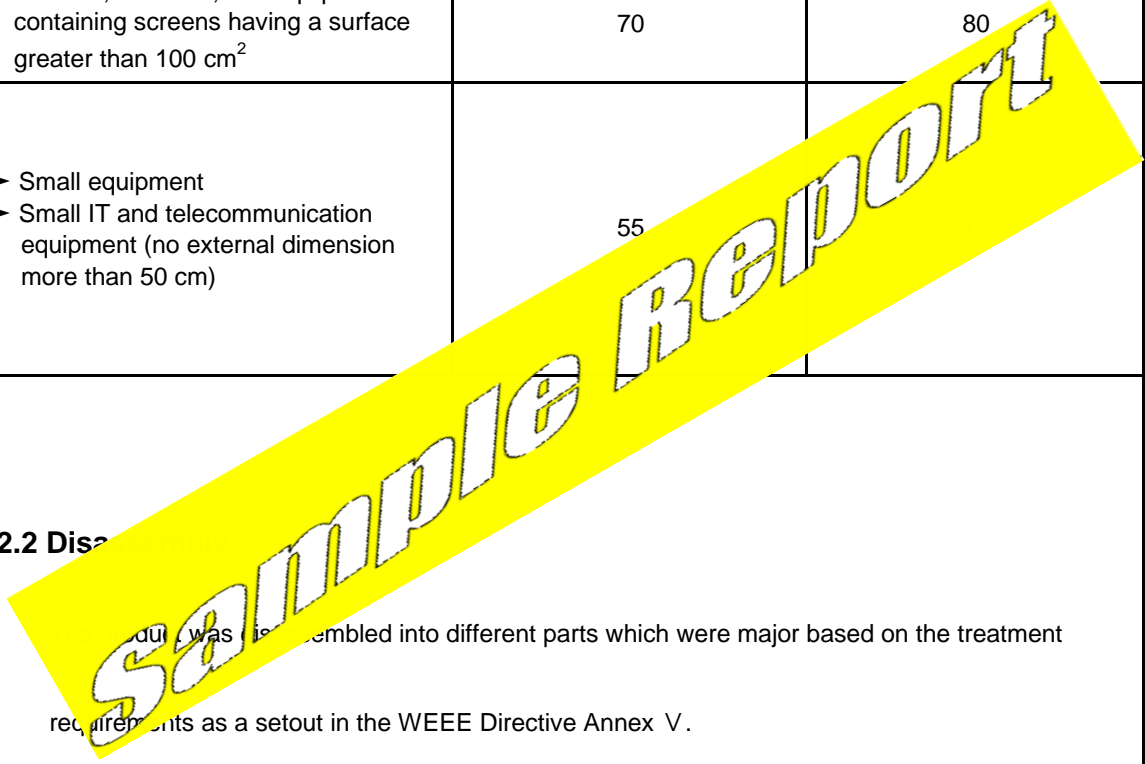
### 2.2 Disposal

The product was disassembled into different parts which were major based on the treatment requirements as a setout in the WEEE Directive Annex V.

Material, of which a recycling technology is not available or the recycling is not

economy and feasible at present, is assumed to be shredded, incinerated or disposed

for landfill without further usage.



## 2. 2012/19/EU Summary

### 2.3 Selective treatment

As a minimum the following substances, preparations and components have to be removed from any separately collected WEEE :

- ▶ Polychlorinated biphenyls (PCBs) containing capacitors in accordance with Council Directive 96/59/EC of 16 September 1996 on the disposal of polychlorinated biphenyls and polychlorinated terphenyls (PCBs/PCTs)
- ▶ Mercury containing components, such as switches or blacklighting lamps
- ▶ Batteries
- ▶ Printed circuit boards of mobile phones generally, and of other devices, where the surface area of the circuit board is greater than 10 square centimeters
- ▶ Toner cartridges, liquid and pasty, as well as colour toners
- ▶ Plastic containing brominated flame retardants
- ▶ Asbestos waste and components containing asbestos
- ▶ Cathode ray tube
- ▶ Chlorofluorocarbons (CFCs), hydrochlorofluorocarbons (HCFCs) or hydrocarbons (HCs)
- ▶ Gas discharge lamps (including those with their casing where appropriate) of a surface greater than 10 square centimeters and all those back-lighted with gas discharge lamps
- ▶ External electric cables
- ▶ Components containing refractory ceramic fibres as described in Commission Directive 97/69/EC of 5 December 1997 adapting to technical progress Council Directive 67/548/EEC relating to the classification, packaging and labeling of dangerous substances
- ▶ Components containing radioactive substances with the exception of component that are below the exemption thresholds set in Article 3 of and Annex I to Council Directive 96/29/Euratom
- ▶ Electrolyte capacitors containing substances of concern ( Height > 25 mm, Diameter > 25 mm )

### 3. Recycling and recovery rate of calculation table

#### 3.1 IEC/TR 62635 Annex D Table D.2

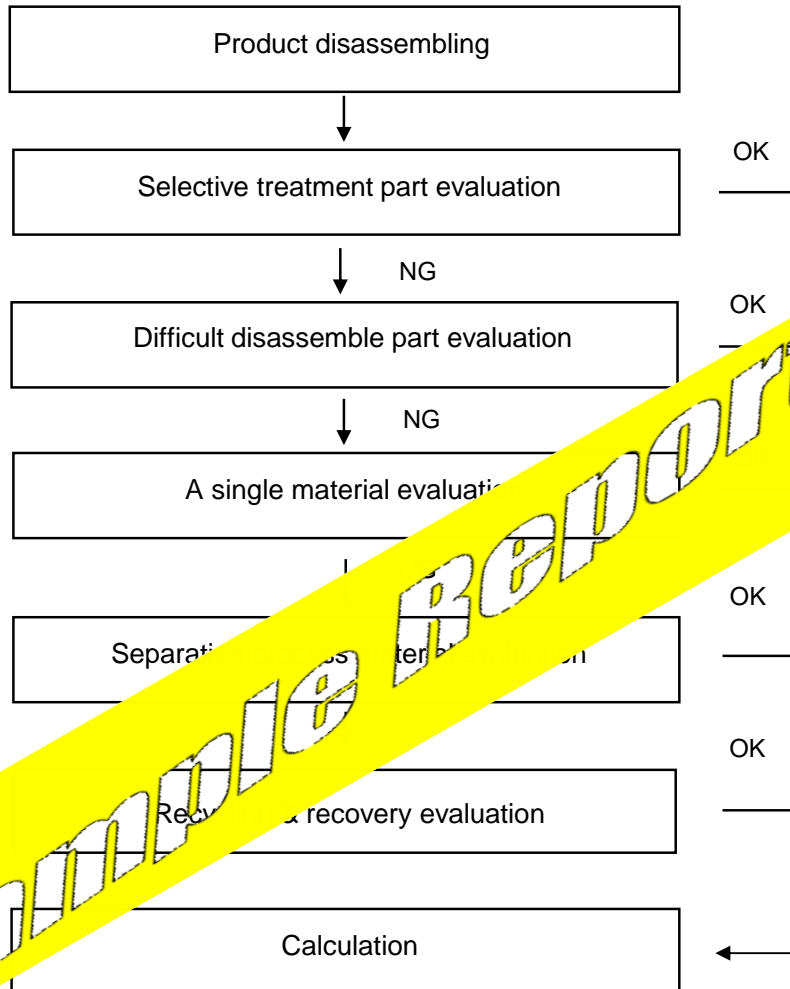
#### - Recycling and recovery rate of product parts with a single recyclable material

Material name	Recycling rate RCR (%)	Recovery rate RVR (%)
ABS (acrylonitrile butadiene styrene)	90	90
PP (polypropylene)	90	90
HIPS (high impact polystyrene)	90	90
GPPS (general purpose polystyrene)	98	98
SAN (styrene acrylonitrile)	98	98
PC (polycarbonate)	90	90
Steel (general)	95	95
Stainless steel (magnetic)	5	5
Stainless steel (non-magnetic)	5	95
Aluminum		95
Copper	98	98
Nickel pure	95	95
Zinc die cast	95	95
	95	95
EP (Epoxy resin)	0	90
PF (phenol formaldehyde resin)	0	90
PUR (polyurethane foam)	0	90
Glass (door panel)	0	0
Glass (shelf)	0	0



## 4. Evaluation flow

### 4.1 Procedure





### 4.2 Calculation formula

Recycling Rate (%)	=	$\frac{\text{Recycling total weight}}{\text{Product total weight}} \times 100$
Recovery Rate (%)	=	$\frac{\text{Recovery total weight}}{\text{Product total weight}} \times 100$

## 5. Disassembling results

### 5.1 Component detailed information (THINKWARE DASH CAM REAR Ass'y of U1000)

2-1		Part name		REAR COVER ASS'Y	Connection type	-
		Material type		-	Evaluation	Further disassembly
		Disassembly tools		-	Disassembly time (sec)	-
		Weight (g)	Recycling rate (%)	Recycling weight (g)	Recovery rate (%)	Recovery weight (g)
		-	Not applicable	-	Not applicable	-
2-1-1		Part name		REAR COVER ASS'Y	Connection type	-
		Material type		PC	Evaluation	Table D.6
		Disassembly tools		Screwdriver	Disassembly time (sec)	5
		Weight (g)	Recycling rate (%)	Recycling weight (g)	Recovery rate (%)	Recovery weight (g)
		11.41	100	13.61	95	13.76
2-1-2		Part name		REAR COVER DECO	Connection type	Grip
		Material type		PC	Evaluation	Table D.8
		Disassembly tools		Awl	Disassembly time (sec)	2
		Weight (g)	Recycling rate (%)	Recycling weight (g)	Recovery rate (%)	Recovery weight (g)
		0.69	94	0.65	95	0.66
2-1-3		Part name		REC BUTTON	Connection type	Putting
		Material type		OTHER POLYMERS	Evaluation	Table D.6
		Disassembly tools		Awl	Disassembly time (sec)	5
		Weight (g)	Recycling rate (%)	Recycling weight (g)	Recovery rate (%)	Recovery weight (g)
		0.45	0	0.00	5	0.02



## 5. Disassembling results

### 5.2 Calculation

Information	Weight (g)	Weight (%)
1. Product total	#REF!	100
2. Recycling	#REF!	#REF!
3. Recovery	#REF!	#REF!
4. Disposal	0.0	#REF!

#### Other information

Recycling Rate (%)

$$= \frac{\text{Recycling total weight}}{\text{Product total weight}} \times 100$$

Recovery Rate (%)

$$= \frac{\text{Recovery total weight}}{\text{Product total weight}} \times 100$$

### 5.3 Test results

Item	Target	Test result
Recycling Rate (%)	55	#REF!
Recovery Rate (%)	75	#REF!

- End of Report -