

# Test Report

**Report No.** RLSZB000149820001

Page 1 of 8

**Applicant** SHENZHEN ARCHWAY ELECTRIC CO., LTD.

**Address** GONGXIAOSHE INDUSTRIAL ZONE, WEST JIANSHE ROAD, GONGMING TOWN,  
BAO'AN DISTRICT, SHENZHEN

**Report on the submitted sample(s) said to be**

**Sample Name** 热缩套管  
**Sample Description** Black plastic tube with white printing  
**Manufacturer** ARCHWAY  
**Sample Received Date** Mar. 7, 2009  
**Testing Period** Mar. 7, 2009 to Mar. 13, 2009

**Test Requested** As specified by client, to determine the Lead(Pb), Cadmium(Cd), Mercury(Hg), Hexavalent Chromium(Cr(VI)), Polybrominated Biphenyls(PBBs), Polybrominated Diphenyl Ethers(PBDEs), Fluorine(F), Chlorine(Cl), Bromine(Br), Iodine(I), Polycyclic Aromatic Hydrocarbons(PAHs), Phthalates content in the submitted sample and it was tested as a whole.

**Test Method** Please refer to the following page(s).

**Test Result(s)** Please refer to the following page(s).

Tested by



Inspected by



Approved by

Technical Manager

Date

Mar. 13, 2009

No. 82076801

# Test Report

Report No. RLSZB000149820001

Page 2 of 8

**Test Method**

| Test Item(s)                           | Pretreatment Method         | Measured Equipment(s) | Report Limit |
|--|-----------------------------|-----------------------|--------------|
| Lead(Pb)                               | IEC 62321:2008 Ed.1 Sec.8   | ICP-OES               | 2 mg/kg      |
| Cadmium(Cd)                            | IEC 62321:2008 Ed.1 Sec.8   | ICP-OES               | 2 mg/kg      |
| Mercury(Hg)                            | IEC 62321:2008 Ed.1 Sec.7   | ICP-OES               | 2 mg/kg      |
| Hexavalent Chromium(Cr(VI))            | IEC 62321:2008 Ed.1 Annex C | UV-Vis                | 2 mg/kg      |
| Polybrominated Biphenyls(PBBs)         | IEC 62321:2008 Ed.1 Annex A | GC-MS                 | 5 mg/kg      |
| Polybrominated Diphenyl Ethers(PBDEs)  | IEC 62321:2008 Ed.1 Annex A | GC-MS                 | 5 mg/kg      |
| Fluorine(F)                            | Refer to BS EN 14582:2007   | IC                    | 10 mg/kg     |
| Chlorine(Cl)                           | Refer to BS EN 14582:2007   | IC                    | 10 mg/kg     |
| Bromine(Br)                            | Refer to BS EN 14582:2007   | IC                    | 10 mg/kg     |
| Iodine(I)                              | Refer to BS EN 14582:2007   | IC                    | 10 mg/kg     |
| Phthalates                             | Refer to ASTM D3421         | GC-MS                 | 50 mg/kg     |
| Polycyclic Aromatic Hydrocarbons(PAHs) | Refer to US EPA 8270D:2007  | GC-MS                 | 0.2 mg/kg    |

**Test Result(s)**

| Test Item(s)                | Content |
|-----------------------------|---------|
| Lead(Pb)                    | N.D.    |
| Cadmium (Cd)                | N.D.    |
| Mercury(Hg)                 | N.D.    |
| Hexavalent Chromium(Cr(VI)) | N.D.    |

| Test Item(s)                          | Content |
|---------------------------------------|---------|
| <b>Polybrominated Biphenyls(PBBs)</b> |         |
| Monobromobiphenyl                     | N.D.    |
| Dibromobiphenyl                       | N.D.    |
| Tribromobiphenyl                      | N.D.    |
| Tetrabromobiphenyl                    | N.D.    |
| Pentabromobiphenyl                    | N.D.    |
| Hexabromobiphenyl                     | N.D.    |
| Heptabromobiphenyl                    | N.D.    |
| Octabromobiphenyl                     | N.D.    |
| Nonabromobiphenyl                     | N.D.    |
| Decabromobiphenyl                     | N.D.    |

# Test Report

Report No. RLSZB000149820001

Page 3 of 8

| Test Item(s)                                 | Content    |
|--|------------|
| <b>Polybrominated Diphenyl Ethers(PBDEs)</b> |            |
| Monobromodiphenyl ether                      | N.D.       |
| Dibromodiphenyl ether                        | N.D.       |
| Tribromodiphenyl ether                       | N.D.       |
| Tetrabromodiphenyl ether                     | N.D.       |
| Pentabromodiphenyl ether                     | N.D.       |
| Hexabromodiphenyl ether                      | N.D.       |
| Heptabromodiphenyl ether                     | N.D.       |
| Octabromodiphenyl ether                      | N.D.       |
| Nonabromodiphenyl ether                      | N.D.       |
| Decabromodiphenyl ether                      | N.D.       |
| Test Item(s)                                 | Content    |
| <b>Halogen(s)</b>                            |            |
| Fluorine (F)                                 | N.D.       |
| Chlorine (Cl)                                | 944 mg/kg  |
| Bromine (Br)                                 | 1527 mg/kg |
| Iodine (I)                                   | N.D.       |

# Test Report

Report No. RLSZB000149820001

Page 4 of 8

| Test Item(s)                    | Content |
|---------------------------------|---------|
| <b>Phthalates</b>               |         |
| Dimethyl phthalate(DMP)         | N.D.    |
| Diethyl phthalate(DEP)          | N.D.    |
| Dipropyl phthalate(DPRP)        | N.D.    |
| Diisobutyl phthalate(DIBP)      | N.D.    |
| Dibutyl phthalate(DBP)          | N.D.    |
| Dipentyl phthalate(DPP)         | N.D.    |
| Diheptyl phthalate(DHP)         | N.D.    |
| Benzylbutyl phthalate(BBP)      | N.D.    |
| Dicyclohexyl phthalate(DCHP)    | N.D.    |
| Di-2-ethylhexyl phthalate(DEHP) | N.D.    |
| Diisooctyl phthalate(DIOP)      | N.D.    |
| Di-n-octyl phthalate(DNOP)      | N.D.    |
| Diisononyl phthalate(DINP)      | N.D.    |
| Diisodecyl phthalate(DIDP)      | N.D.    |
| Dinonyl phthalate(DNP)          | N.D.    |
| Diisononyl adipate(DINA)        | N.D.    |

| Test Item(s)                                  | Content |
|---|---------|
| <b>Polycyclic Aromatic Hydrocarbons(PAHs)</b> |         |
| Naphthalene                                   | N.D.    |
| Acenaphthylene                                | N.D.    |
| Acenaphthene                                  | N.D.    |
| Fluorene                                      | N.D.    |
| Phenanthrene                                  | N.D.    |
| Anthracene                                    | N.D.    |
| Fluoranthene                                  | N.D.    |
| Pyrene  | N.D.    |
| Benzo[a]anthracene                            | N.D.    |
| Chrysene                                      | N.D.    |
| Benzo[b]fluoranthene                          | N.D.    |
| Benzo[k]fluoranthene                          | N.D.    |
| Benzo[a]pyrene                                | N.D.    |
| Indenol[1,2,3-cd]pyrene                       | N.D.    |
| Dibenz[a,h]anthracene                         | N.D.    |
| Benzo[g,h,i]perylene                          | N.D.    |



# Test Report

**Report No.** RLSZB000149820001

Page 5 of 8

**Note:** **The sample had been dissolved totally tested for Lead, Mercury, Cadmium.**

-N.D. = Not Detected (<Report Limit)

-mg/kg = ppm = parts per million



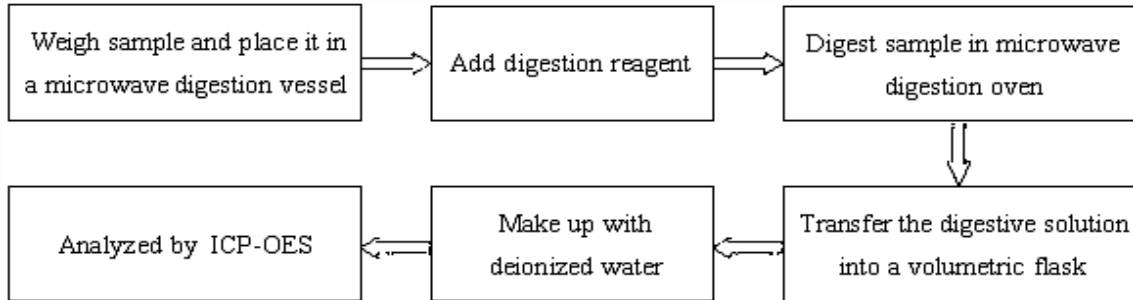
# Test Report

Report No. RLSZB000149820001

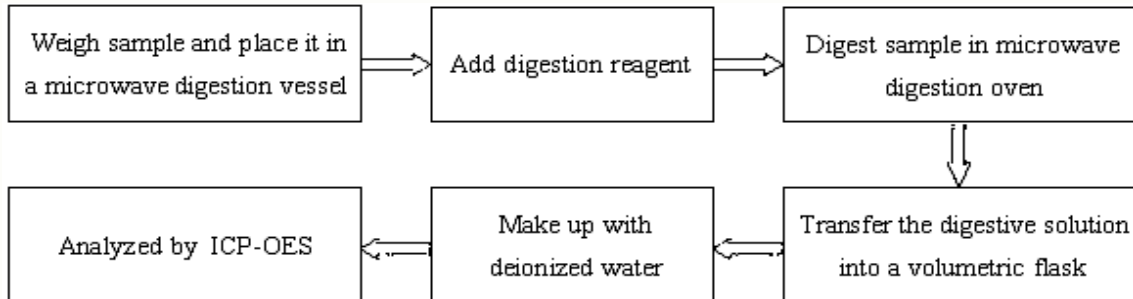
Page 6 of 8

## Test Process

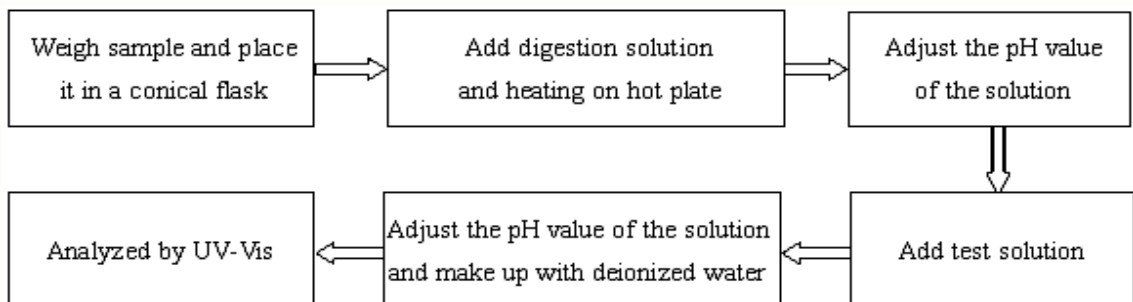
### 1. Lead(Pb), Cadmium(Cd)



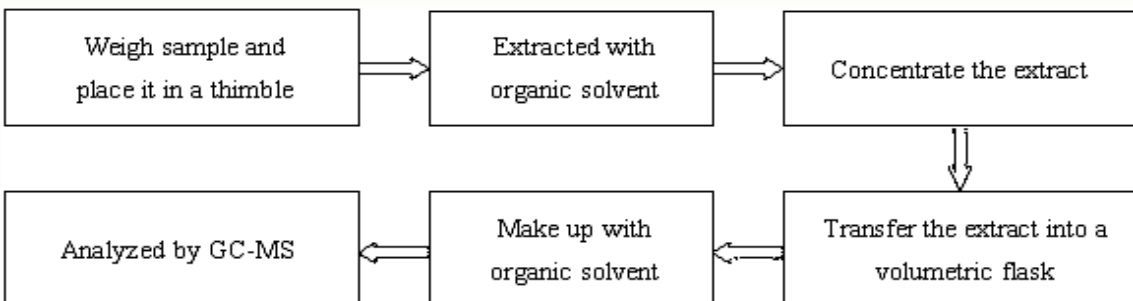
### 2. Mercury(Hg)



### 3. Hexavalent Chromium(Cr(VI))



### 4. Phthalates

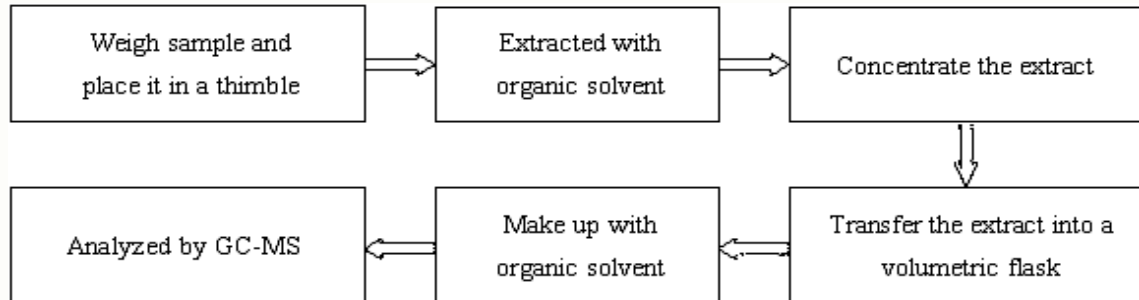


# Test Report

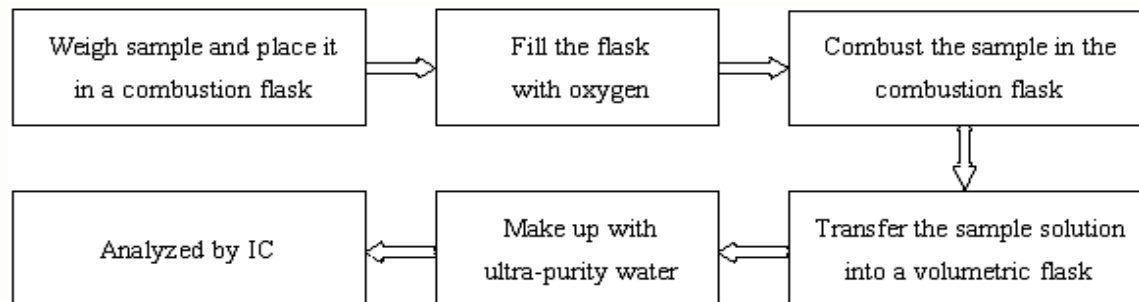
Report No. RLSZB000149820001

Page 7 of 8

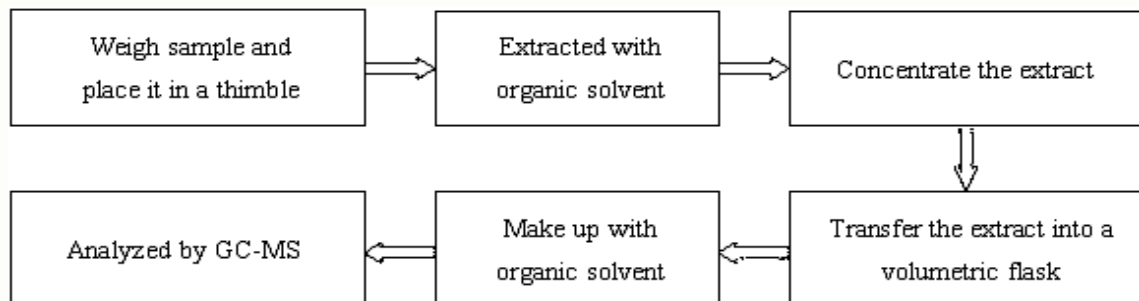
## 5. Polybrominated Biphenyls(PBBs), Polybrominated Diphenyl Ethers(PBDEs)



## 6. Fluorine(F), Chlorine(Cl), Bromine(Br), Iodine(I)



## 7. Polycyclic Aromatic Hydrocarbons(PAHs)

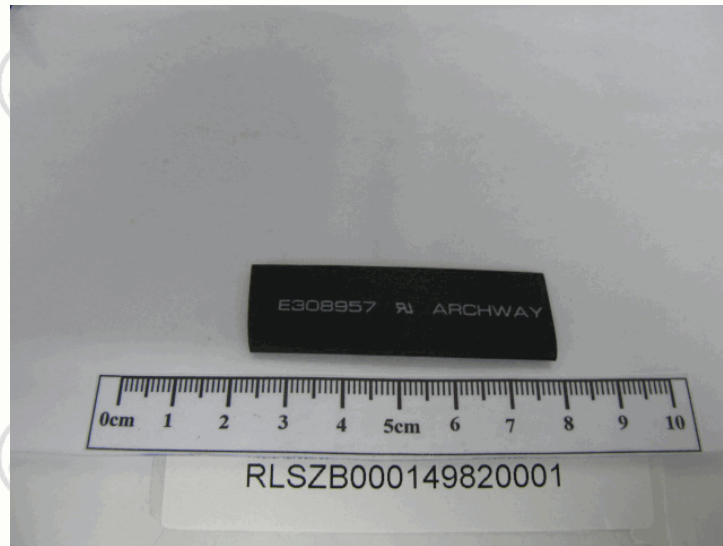


# Test Report

Report No. RLSZB000149820001

Page 8 of 8

## Photo(s) of the sample(s)



\*\*\* End of report \*\*\*

This report is considered invalidated without the Special Seal for Inspection of the CTI. This report shall not be altered, increased or deleted. The results shown in this test report refer only to the sample(s) tested. Without written approval of CTI, this test report shall not be copied except in full and published as advertisement.

Building C, Hongwei Industrial Zone, Baoan 70 District, Shenzhen