



**BUREAU
VERITAS**

Test Report No.: FS160603N045

RF EXPOSURE REPORT

| | |
|-----------|--|
| Applicant | Armour Home Electronics Limited |
| Address | Units 7/8 Stortford Hall Industrial Park, Dunmow Road, BISHOPS STORTFORD, CM23 5GZ, UK |



| | |
|-------------------------------------|--|
| Manufacturer or Supplier | Armour Home Electronics Limited |
| Address | Units 7/8 Stortford Hall Industrial Park, Dunmow Road, BISHOPS STORTFORD, CM23 5GZ, UK |
| Product | Q Acoustics M3 Soundbar |
| Brand Name | Q Acoustics |
| Model | M3 Soundbar |
| Additional Model & Model Difference | N/A |
| Date of tests | Jun. 03, 2016 ~ Jun. 27, 2016 |

☒ **FCC Part 2 (Section 2.1091)**

☒ **KDB 447498 D01**

☒ **IEEE C95.1**

CONCLUSION: The submitted sample was found to COMPLY with the test requirement

| | |
|---|--|
| Tested by Breeze Jiang Project Engineer / EMC Department | Approved by Chris Chen Manager / EMC Department |
|  |  Date: Jun. 28, 2016 |

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RELEASE CONTROL RECORD

| ISSUE NO. | REASON FOR CHANGE | DATE ISSUED |
|--------------|-------------------|---------------|
| FS160603N045 | Original release | Jun. 28, 2016 |

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1. CERTIFICATION

| | |
|------------------------|---------------------------------|
| FCC ID: | YGM-M3 |
| PRODUCT: | Q Acoustics M3 Soundbar |
| BRAND NAME: | Q Acoustics |
| MODEL NO.: | M3 Soundbar |
| ADDITIONAL NO.: | N/A |
| TEST SAMPLE: | Engineering Sample |
| APPLICANT: | Armour Home Electronics Limited |
| STANDARDS: | FCC Part 2 (Section 2.1091) |
| | KDB 447498 D01 |
| | IEEE C95.1 |



2. RF EXPOSURE LIMIT

LIMITS FOR MAXIMUM PERMISSIBLE EXPOSURE (MPE)

| FREQUENCY RANGE (MHz) | ELECTRIC FIELD STRENGTH (V/m) | MAGNETIC FIELD STRENGTH (A/m) | POWER DENSITY (mW/cm ²) | AVERAGE TIME (minutes) |
|---|-------------------------------|-------------------------------|-------------------------------------|------------------------|
| LIMITS FOR GENERAL POPULATION / UNCONTROLLED EXPOSURE | | | | |
| 300-1500 | ... | ... | F/1500 | 30 |
| 1500-100,000 | ... | ... | 1.0 | 30 |

F = Frequency in MHz

3. MPE CALCULATION FORMULA

$$P_d = (P_{out} \cdot G) / (4 \cdot \pi \cdot r^2)$$

where

P_d = power density in mW/cm²

P_{out} = output power to antenna in mW

G = gain of antenna in linear scale

π = 3.1416

R = distance between observation point and center of the radiator in cm

4. CLASSIFICATION

The antenna of this product, under normal use condition, is at least 20cm away from the body of the user. So, this device is classified as **Mobile Device**.



5. ANTENNA GAIN

The antennas provided to the EUT, please refer to the following table:

| Transmitter Circuit | Peak Gain (dBi) | Antenna Type |
|---------------------|-----------------|----------------------|
| Chain 0 | 2.12 | Integral PCB Antenna |

6. CALCULATION RESULT OF MAXIMUM CONDUCTED POWER

| FREQUENCY BAND (MHz) | MAX POWER (mW) | ANTENNA GAIN (dBi) | DISTANCE (cm) | POWER DENSITY (mW/cm ²) | LIMIT (mW/cm ²) |
|----------------------|----------------|--------------------|---------------|-------------------------------------|-----------------------------|
| 2402-2480 | 2.523 | 2.12 | 20 | 0.00081795 | 1.0 |

--- END ---