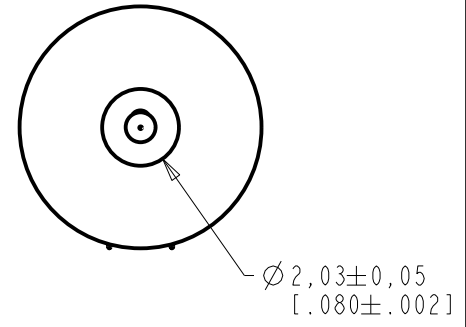
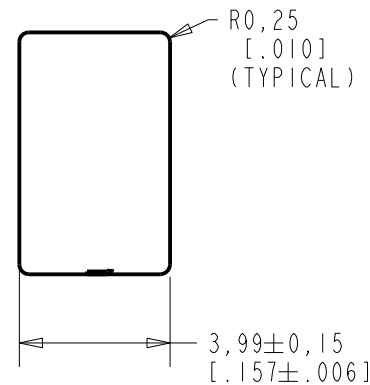
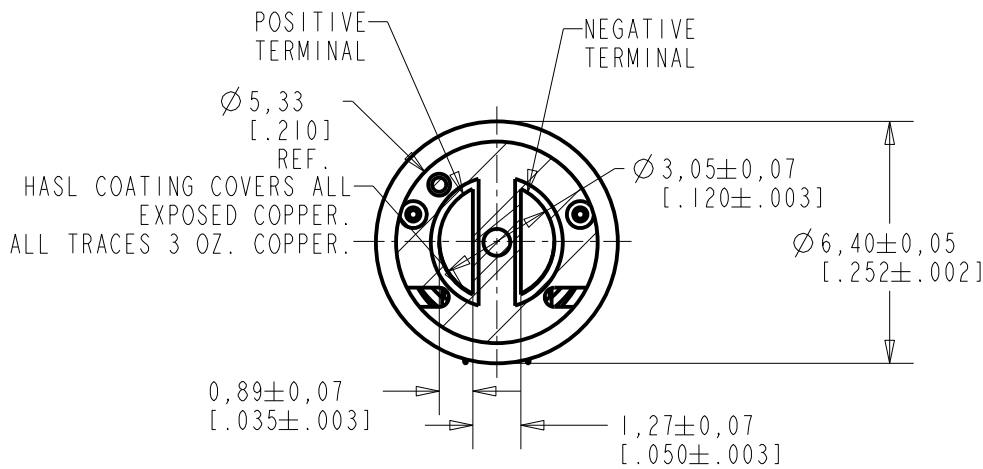


SR6438NWS-000

SHT 1.1

NOTES:

 A POSITIVE GOING VOLTAGE AT THE POSITIVE TERMINAL, RELATIVE TO NEGATIVE TERMINAL, CAUSES A DECREASE IN PRESSURE AT THE SOUND OUTLET.



SCALE 2:1

NOMINAL WEIGHT
0.25 GRAMS

DIMENSIONS IN MILLIMETERS [INCHES]

| Revision | C.O. # | Implementation Date | RELEASE LEVEL | REVISION |
|----------|-----------|---------------------|---------------|----------|
| | | | Active | J |
| J | C10116253 | 9-25-14 | | |

| | | |
|----------------------|--|---------------|
| SCALE: 5:1 | | DR. BY: DATE |
| DO NOT SCALE DRAWING | | MMM 7-5-07 |
| TITLE: RECEIVER | | CK. BY: DATE |
| OUTLINE DRAWING | | GJP 7-12-07 |
| SR6438NWS-000 | | APP. BY: DATE |
| SHT 1.1 | | GJP 7-12-07 |

KNOWLES ELECTRONICS
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THE SIRENS SR6438NWS-000 IS A MAGNETIC BALANCED ARMATURE RECEIVER OPTIMIZED FOR USE IN EARPHONES.

NO DAMPING

SR6438NWS-000

SHEET 2.1

NOTE: SPECIFICATIONS FOLLOWED BY AN ASTERISK (*) ARE 100 % TESTED



ACOUSTICAL

SENSITIVITY

DEVICE WILL PRODUCE THE SPL LISTED BELOW UNDER TEST CONDITIONS DESCRIBED IN TABLE 3. NOMINAL SENSITIVITY AT 1kHz IS dB RELATIVE TO 20µPa. ALL OTHER VALUES IN dB RELATIVE TO THE SENSITIVITY AT 1kHz.

| FREQUENCY (Hz) | MINIMUM | NOMINAL | MAXIMUM |
|----------------|---------|---------|---------|
| 200 | -1.0 | +2.0 | +5.0 |
| 500 | -2.0 | +1.0 | +4.0 |
| 1000 | -2.0 | 109.5 | +2.0 |
| 2100-2900 PEAK | +8.0 | +11.0 | +14.0 |
| 8200-9400 PEAK | 0.0 | +3.0 | +6.0 |

TABLE 1

TOTAL HARMONIC DISTORTION

DEVICE WILL NOT EXCEED TOTAL HARMONIC DISTORTION LEVELS LISTED BELOW.

| FREQUENCY (Hz) | AC DRIVE (V rms) | DC BIAS (V) | MAX (%) |
|----------------|------------------|-------------|---------|
| 843 | 0.1 | 0 | 5 |
| 1264 | 0.1 | 0 | 5 |
| 843 | 0.3 | 0 | 10 |
| 1264 | 0.3 | 0 | 10 |

TABLE 2

TEST CONDITIONS

| | |
|------------------------|--------------------------------------|
| NOMINAL SOURCE VOLTAGE | 0.1 V rms, 0 mA DC BIAS |
| SOURCE IMPEDANCE | <1 Ohm |
| TUBING | 7mm [.236"] LONG, 2.2mm [.039"] I.D. |
| COUPLER CAVITY | IEC 60318-4 ("711") COUPLER |

TABLE 3

ELECTRICAL

| | |
|--------------------|-----------------|
| DC RESISTANCE | 25.0 Ohms ± 10% |
| IMPEDANCE @ 500 Hz | 36.5 Ohms ± 15% |
| IMPEDANCE @ 1 KHz | 55.5 Ohms ± 15% |

TABLE 4

ISOLATION: CASE WILL BE ELECTRICALLY ISOLATED FROM THE COIL CIRCUIT.

MECHANICAL CHARACTERISTICS

SOLDER TYPE: SAC305 (LEAD FREE)
 SOLDERING TEMPERATURE: 400°C FOR 2 SECONDS MAX.
 STORAGE TEMPERATURE: -40°C TO 63°C
 OPERATING TEMPERATURE: 0°C TO 63°C

AT EXTREME ENDS OF THE OPERATING TEMPERATURE THE SENSITIVITY WILL NOT VARY MORE THAN ±3 dB FROM ROOM TEMPERATURE

| Revision | C.O. # | Implementation Date | RELEASE LEVEL | REVISION |
|----------|-----------|---------------------|---------------|----------|
| J | CI0116253 | 9-25-14 | Active | J |

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WHEN TEST LIMITS ARE USED TO ESTABLISH INCOMING INSPECTION ACCEPTANCE/REJECTION CRITERIA, CORRELATION OF TEST EQUIPMENT WITH KNOWLES IS ALSO REQUIRED FOR ELIMINATION OF EQUIPMENT AND TEST METHOD VARIATION

TITLE: **RECEIVER** SR6438NWS-000
 PERFORMANCE SPECIFICATION SHT 2.1

| | |
|---------|---------|
| DR. BY | DATE |
| MMM | 7-5-07 |
| CK. BY | DATE |
| GJP | 7-12-07 |
| APP. BY | DATE |
| GJP | 7-12-07 |