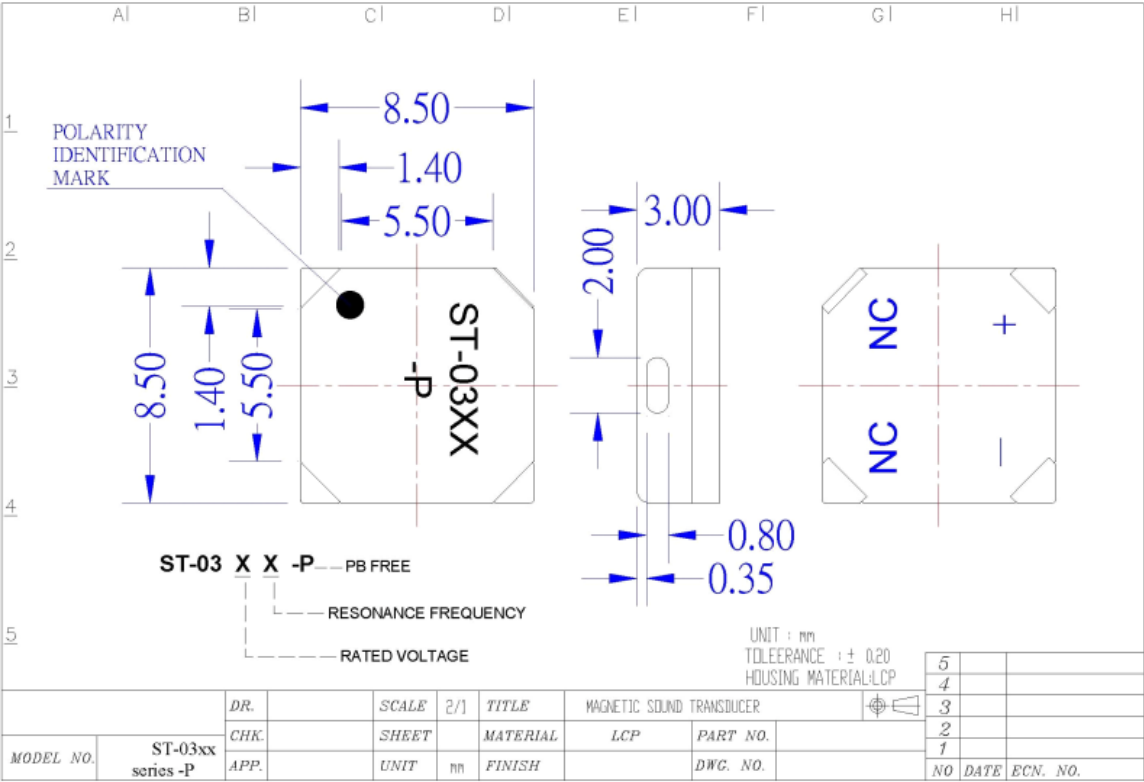




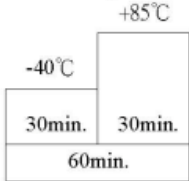
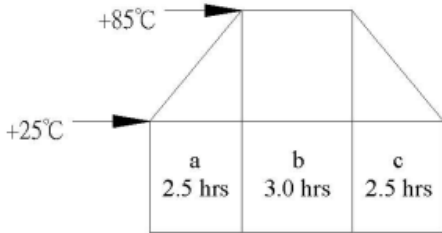
Product Data Sheet



RELIABILITY TEST

ST-03xx Series -P

Note: No voltage is applied to the part during reliability test No. 1~4

| Item | Test Conditions | Evaluation Standard |
|----------------------------------|---|--|
| 1 Temp. test | <p>(1) High temp. storage life test: The part shall be capable of withstanding a storage temperature of +85°C for 96 hours.</p> <p>(2) Low temp. storage life test: The part shall be capable of withstanding a storage temperature of -40°C for 96 hours.</p> <p>(3) Temp. cycle: The part shall be subjected to 10 cycles. One cycle shall consist of ;</p>  | <p>After the test the part shall meet specifications without any degradation in appearance and performance except SPL.</p> <p>SPL. shall be 87 dB or more.</p> |
| 2 Temp. / Humidity cycle test | <p>The part shall be subjected to 10 cycles. One cycle shall be 8 hours and consist of ;</p>  <p>a , b : 90 ~ 98% RH c : 80 ~ 98% RH</p> | |

RELIABILITY TEST

ST-03xx Series -P

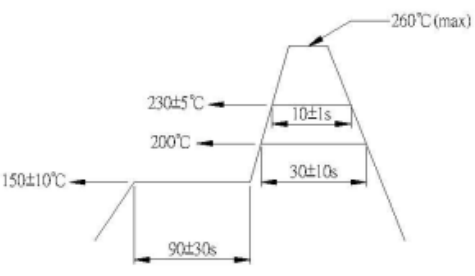
Note: No voltage is applied to the part during reliability test No. 1~4

| Item | | Test Conditions | Evaluation Standard |
|------|---------------------|---|---|
| 3 | Vibration Test | The part shall be subjected to a vibration cycle of 10Hz to 55Hz to 10Hz in a period of 1 minute. Total peak amplitude shall be 1.52mm(9.3G). The vibration test shall consist of 2 hours per plane in each three mutually perpendicular planes for a total time of 6 hours. | After the test the part shall meet specifications without any degradation in appearance and performance except SPL. SPL. shall be 87 dB or more. |
| 4 | Dropping Test | (1) Fixed drop : The part shall be mounted on 100g jig(standard pcboard) and dropped from a height of 152cm onto a concrete floor 5 times in each 6 planes. (a total of 30 times.) (2) Free drop : The part only shall be dropped from a height of 75cm onto a 40mm thick wooden board 3 times in 3 axes (X.Y.Z). (a total of 9 times.) | |
| 5 | Operating life test | (1) Ordinary temperature : The part shall be subjected to 1000 hours at room temperature (25±10℃) with rated voltage & resonance frequency applied. (2) High temperature : The part shall be subjected to 500 hours at +70℃ with rated voltage & resonance frequency applied. (3) Low temperature : The part shall be subjected to 500 hours at -30℃ with rated voltage & resonance frequency applied. | |

RELIABILITY TEST

ST-03xx Series -P

Note: No voltage is applied to the part during reliability test No. 1~4

| Item | | Test Conditions | Evaluation Standard |
|------|--------------------------|---|--|
| 6 | Solderability | <p>The part shall be dipped into the soldering bath conditioned as follows ;</p> <p>Solder temp. : $260 \pm 5^{\circ}\text{C}$</p> <p>Soaking time : 10 - 11 seconds</p> | 95% surface of lead pins must be covered with fresh solder and soldering balls should be found. |
| 7 | Pin lead strength | 3 lead pins shall be solder on the pc board , and the force (10n) shall be applied behind the part for 10 ± 1 seconds. | |
| 8 | For infrared reflow oven | <p><Recommended temperature profile for reflow oven> (Reference standard ; EIAJ ED-4702)</p>  | <p>After the test the part shall meet specifications without any degradation in appearance and performance except SPL.</p> <p>SPL. shall be 87 dB or more.</p> |