

For quality control purposes, the following tests are carried out on statistical samples from every batch of ElectrosPELL LEDs.

TEST	CONDITIONS
THERMAL SHOCK TEST	LEDs placed in a chamber (-35 °C) for 20 minutes, temperature then increased instantaneously to +85 °C for 20 minutes. The duration of the test is 10 complete cycles. (MIL-STD-202:107D)
HUMIDITY RESISTANCE TEST	LEDs placed in a humidity chamber which is maintained at 65 °C, RH = 95%. The duration of the test is 96 hours. (MIL-STD-202:103D)
AGEING TEST	LEDs connected to a source of power and run at full rated current at room temperature (25 °C) for 1000 hours. (MIL-STD-750: 1026)
SOLDERABILITY TEST	LED pins (1.6 mm from body) dipped into tin which is maintained at 260 °C. The duration of the test is 5 seconds. (MIL-std-202:208D)
VIBRATION TEST	LEDs paced on a vibrator which is maintained at 10-55 Hz/minute, 0.82mm amplitude.
PACKING TEST	LEDs packed in a corrugated fiber-board box and made to fall freely on all 6 faces at a diagonal angle to the ground. The altitude of the fall being in the range of 229-609 mm.
ELECTROSTATIC DISCHARGE TEST	LEDs tested with 5 kV electrostatic discharge (human body model).
REVERSE VOLTAGE TEST	LEDs tested in reverse bias with twice the specified forward voltage.