

Walk-in Type Rapid Rate Temperature & Humidity Test Chamber



Related Standard Test Requirements

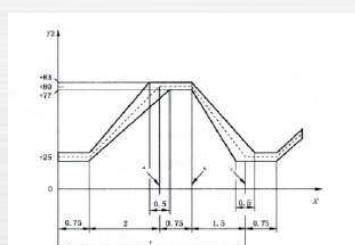
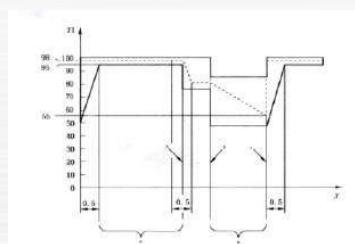
1. Temperature shock

- 1.1 Test Object: Battery storage pack or system.
- 1.2 Li-ion battery pack or system placed in $(-40 \pm 2)^\circ\text{C} \sim (85 \pm 2)^\circ\text{C}$ alternation temperature, the conversion time of two extreme temperatures is less than 30 minutes. Place the test objects into each extreme temperature keep 8h, test 5 cycles.
- 1.3 Observe for 2 hours under the room temperature after testing.

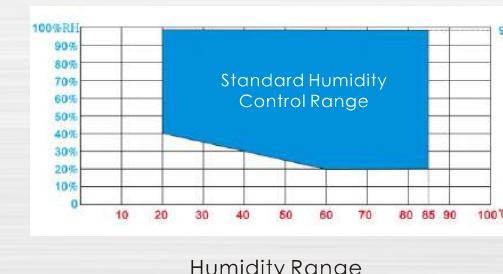
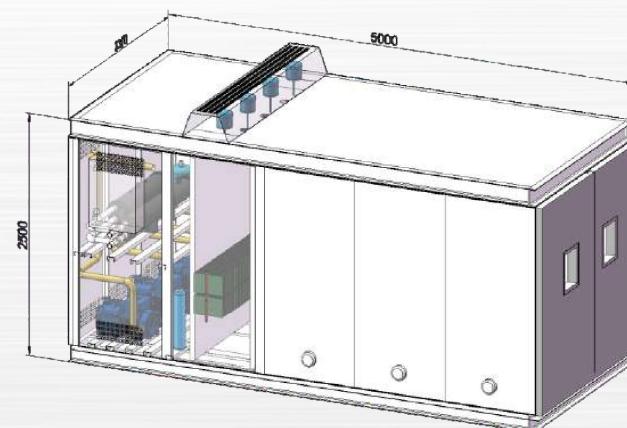


2. Humidity & Temperature Cycling

- 2.1 Test Object: Battery storage pack or system.
- 2.2 Refer the GB/T2423.4 Test Db, variable refer the Graph 4, the highest temperature is $+80^\circ\text{C}$, 5 cycles. Observe for 2h under the room temperature.



Y1: Relative humidity %RH;
 Y2: Temperature, $^\circ\text{C}$;
 X: Time, h;
 a: end of the heating; m
 b: cooling start;
 c: recommended temperature and humidity values;
 d: condensation;
 e: desiccation; f: 1 cycle.



Performance parameters

Model	BTKS5-12m³-C
Internal Dimension	W2000 X D3000 X H2000mm
External Dimension	W2400 X D4500 X H2940mm
Temperature Range	-50°C ~ +150°C (Adjustable)
Humidity Range	20%RH-98%RH (Limit temperature section, see the Humidity Range figure)
Temperature Fluctuation	$\pm 0.5^\circ\text{C}$
Humidity Fluctuation	$\pm 2.0\%$ RH
Temperature Deviation	2.0°C
Humidity Deviation	$\leq +2, -3\%$ RH(Humidity > 75%RH), $\leq \pm 5\%$ RH(Humidity < 75%RH).
Heating Rate	$\geq 5^\circ\text{C}/\text{min}$ (From -40°C up to $+80^\circ\text{C}$, Non-linear, load 800kg)
Cooling Rate	$\geq 5^\circ\text{C}/\text{min}$ (From -40°C up to $+80^\circ\text{C}$, Non-linear, load 800kg)
Temperature overshoot	$\leq \pm 2^\circ\text{C}$
Weight	Approx 5 Tons
Power Supply	AC 380V, 50HZ, 127KW
Noise	$\leq 70\text{dB}$ (A Level)
External Material	Galvanized sheet with high temperature electrostatic resin coating at both sides.
Internal Material	1.2 mm thickness SUS # 304 heat and cold resistant stainless steel with seal welding.
Controller	24 bit high accuracy 7 inch TFT true colors LCD touch screen.
Compressor	Semi-Hermetic Compressors BOCK / BITZER (Germany)
Cooling Type	Air cooling or water cooling (Optional)
Other Requirement	<ul style="list-style-type: none"> *Main-subsidiary type trolley for specimen in and out of the test chamber. *Explosion-proof lighting system. *Explosion-proof pressure relief system. *Smoke exhaust system. *Automatic Water Supply System. *Fire extinguishing device; spray device; smoke alarm device;