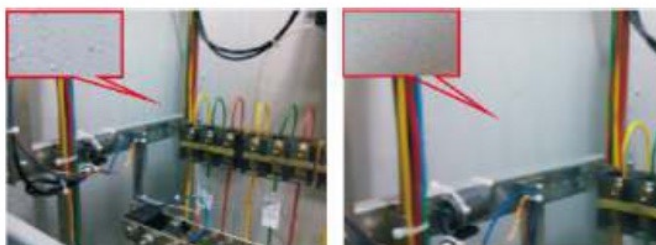## Peltier Condenser

EnergoM-DH series peltier condenser using semiconductor technology, in a certain place of cabinet to lead controlled condensation, make the interior enviorment humidity fall to safe value. It is refrigerant-free cooling device, can used in switchgear, electrical cabinet, exchange control cabinets, outdoor terminal boxes etc.

It designed ultra-small install size, high efficiency energy-saving, do not need extra heater and fan wiring. And comes with the data acquisition module for remote monitoring, It's an efficient and reliable device to replace the old thermostat and heater / fan combination.

Main Features

- Small size, easy for cabinet inside installation.
- Quickly reduce the switchgear internal humidity, exclude water out of air.
- Condensate water will be drained directly to the outside of the cabinet by the aqueduct.
- Automatic & manual dehumidification free to change, temperature start value and dehumidification start value adjustable.
- Real-time sampling temperature and humidity, support automatically working mode, do not extra sensor and probe.
- Build in memory to record settings, can keep original working mode after power recover.
- With diagnosis function, user can quickly find failure point to debug.
- Shell and internal components are well isolation design, can work in high humidity and strong electromagnetic field.
- Optional passive output node.
- Optional RS485 port.
- Optional external heater.

Dehumidification effect contrast

Before- Water on the wall

After- No water on the wall

Typical wiring

EnergoM-DH 8000

1	Reserved
2	Reserved
3	Reserved
4 / 5	Alarm NC
6 / 7	Heater NO
8	GND
9 / 10	AUX
11	
12	Probe
13	
14 / 15	Reserved
16 / 17	RS-485

Notes: Wiring according to different product specifications are subject to change. Please reference to the label on product body!

Technical characteristics

	8000B	8000L	6001	6002	105
Working power					
Power supply		85V~265VAC/DC 50Hz			
Peltier rated power[1]		30W, 40W, 60W optional			15W
Dehumidifying capacity	350ml in 24h Test in 60W @35C, 90%RH	350ml in 24h Test in 60W @35C, 90%RH	300ml in 24h Test in 30W @35C, 90%RH	300ml in 24h Test in 30W @35C, 90%RH	100ml in 24h Test in 15W @35C, 90%RH
Measurement and ability					
Humidity monitor range		20%RH~98%RH			
Sensor accuracy[2]		±5%RH			
Dehumidify start threshold		45%RH~98%RH, Default 65%RH			
Envoirment temperature		5~60°C			
Temperature monitor range		-40~80°C			/
Sensor accuracy		±1.0°C			/
Heater start threshold		1~55°C, Default 5°C			/
Heater power[3]		50~500W optional			/
Other					
Physical dimension	130*243*60	134.5*130*68.5	100*174*70	100*144*60	73*88*52
Enclosure material	Sheet metal with anti-rust spray	Aluminum alloy	ABS	ABS	ABS
Screen	2*3 digital LED	2digital LED	2*3 digital LED	2*3 digital LED	2digital LED
Standards		IEC60255-22-1			
Comm interface		RS485, modbus-RTU			
Style image					

Notes:
1. The choice of rated power is related to the cabinet inner volume and airtightness, and the general reference value is:
   0.5cubic meter cabinet choose 15W
   1.0cubic meter cabinet choose 30W
   1.5cubic meter cabinet choose 40W
   2.0cubic meter cabinet choose 60W
   Cabinet volume are calculated according to the inner diameter, Length*Width*Height
2. Sensor accuracy 5% is test with inside probe, products optional external cable type sensor. Please contact sales team before order.
3. Device provide passive NO contact for external heater connection, capacity is AC250V5A. User can free to order heater or purchase with DH series.