ROOM THERMOSTATS, WITH FIXED AND ADJUSTABLE DIFFERENTIAL, IP65   DBET

FUNCTION

Room temperature control in:
- single or multi-stage heating systems;
- single or multi-stage cooling systems;
- single or two-stage heating and cooling systems.

Models with setpoint adjustment by knob on or under the cover and range calibration.

APPLICATIONS

Well-suited for heating, cooling and air conditioning systems in dusty, damp and strong polluted areas: industrial areas, commercial buildings, storage room, garages, machine rooms, factories, greenhouses and agricultural installations.

TYPE	RANGE °C	STAGES	DIFFERENTIAL IN THE STAGE K	DIFFERENTIAL BETW. THE STAGES K	MAX. BULB TEMP. °C
DBET-22	-30...+30	1	2...15		65
DBET-22U	-30...+30	1	2...15		65
DBET-22/2	-30...+30	2	1	2...5	65
DBET-22/2U	-30...+30	2	1	2...5	65
DBET-23	-30...+30	1	1		65
DBET-23U	-30...+30	1	1		65
DBET-26	0...+60	1	2...15		65
DBET-26U	0...+60	1	2...15		65
DBET-26/2	0...+60	2	1	2...5	65
DBET-26/2U	0...+60	2	1	2...5	65
DBET-27	0...+60	1	1		65
DBET-27U	0...+60	1	1		65

U   models with range under the cover

TECHNICAL DATA

Sensitive element:	liquid-filled coiled copper bulb
Contacts:	dust-tight microswitches with SPDT contacts (heat/cool)
Switch capacity:	15 (8) A, 24...250 Vac
Differentials:	fixed or adjustable (see schedule)
Working:	-35...+65 °C
	10...90% r.h. (without condensing)
Storage:	-40...+60 °C
	< 95% h.r.
Housing:	Bayblend base, ABS cover
Protection:	IP65, class I
Size:	108 x 70 x 72 mm
Weight:	450 g

NOTE
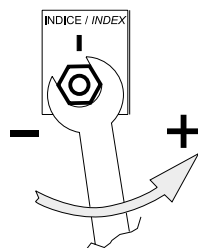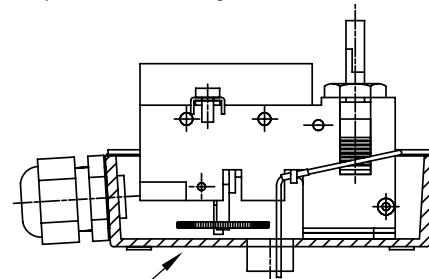The range can be calibrated by tuning carefully the hexagon nut under the knob (fig. 1).
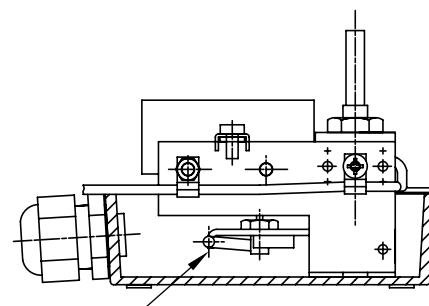

fig. 1

DIFFERENTIAL ADJUSTMENT

Differential adjustment in the stage

regulation from 2...15 K

Differential adjustment between the stage

regulation from 2...5 K

WIRING DIAGRAM

Single-stage models:

Heating
Connect to red and to blue terminal; the contact opens during the temperature rising (fig. 2).

Cooling
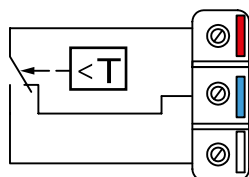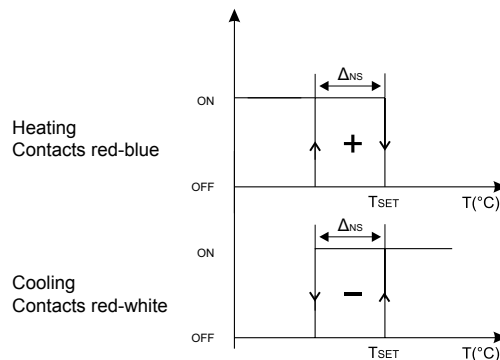Connect to red and to blue terminal; the contact opens during the temperature droping (fig. 2).

fig. 2

Logic activation single-stage models:

Heating
Contacts red-blue

Cooling
Contacts red-white

Δ_{NS}: differential in the stage
T_{SET}: setting setpoint
ON: closed contact
OFF: open contact

Two-stage models:

Heating
Connect to red and to blue terminal; the contact opens during the temperature rising (fig. 3), see logic activation.

Cooling
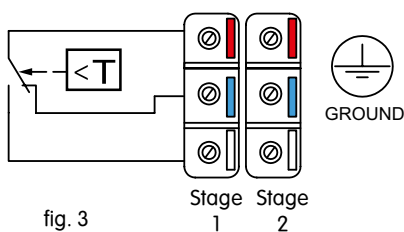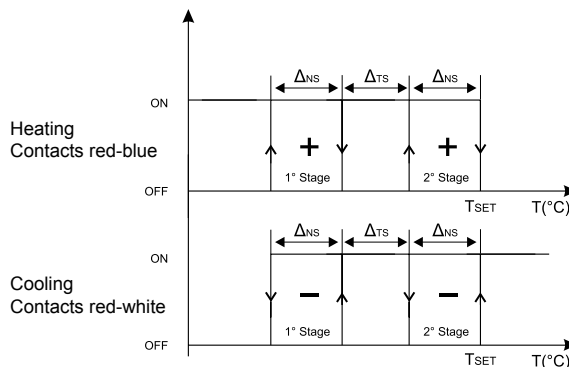Connect to red and to blue terminal; the contact opens during the temperature droping (fig. 3), see logic activation.

GROUND

Stage 1   Stage 2

fig. 3

Logic activation two-stage models:

Heating
Contacts red-blue

1° Stage   2° Stage

Cooling
Contacts red-white

1° Stage   2° Stage

Δ_{NS}: differential in the stage
Δ_{TS}: differential between the stage
T_{SET}: setting setpoint
ON: closed contact
OFF: open contact

DIMENSIONS (mm)

108   21
90
70   52
M20
26
ø5
158

72   88
M20
20