

**PS/RWR-4  
(RAL9016)**

- Swirl diffusers
- Circular
- Steel
- White, RAL 9016



## Variable swirl diffusers type PS/RWR-4 (RAL9016)

Circular adjustable swirl ceiling diffuser for high ceiling

### Brand

- Cairox

### Application

- For air supply in ventilation and air conditioning systems

### Material

- Steel and aluminium combination

### Colour

- Standard colour white, RAL 9016
- Other colours available upon request

### Composition

- Manually adjustable blades with  $\alpha$  = blade angle
- Perforated plate in the collar of the diffuser

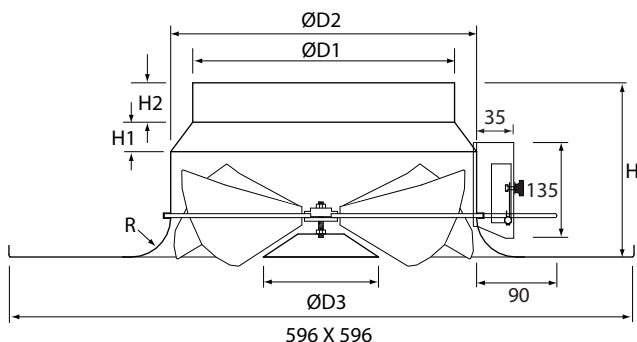
### Order example

- PS/RWR-4, 315

Explanation

**PS/RWR-4** = Diffuser type

**315** = Neck size of diffuser



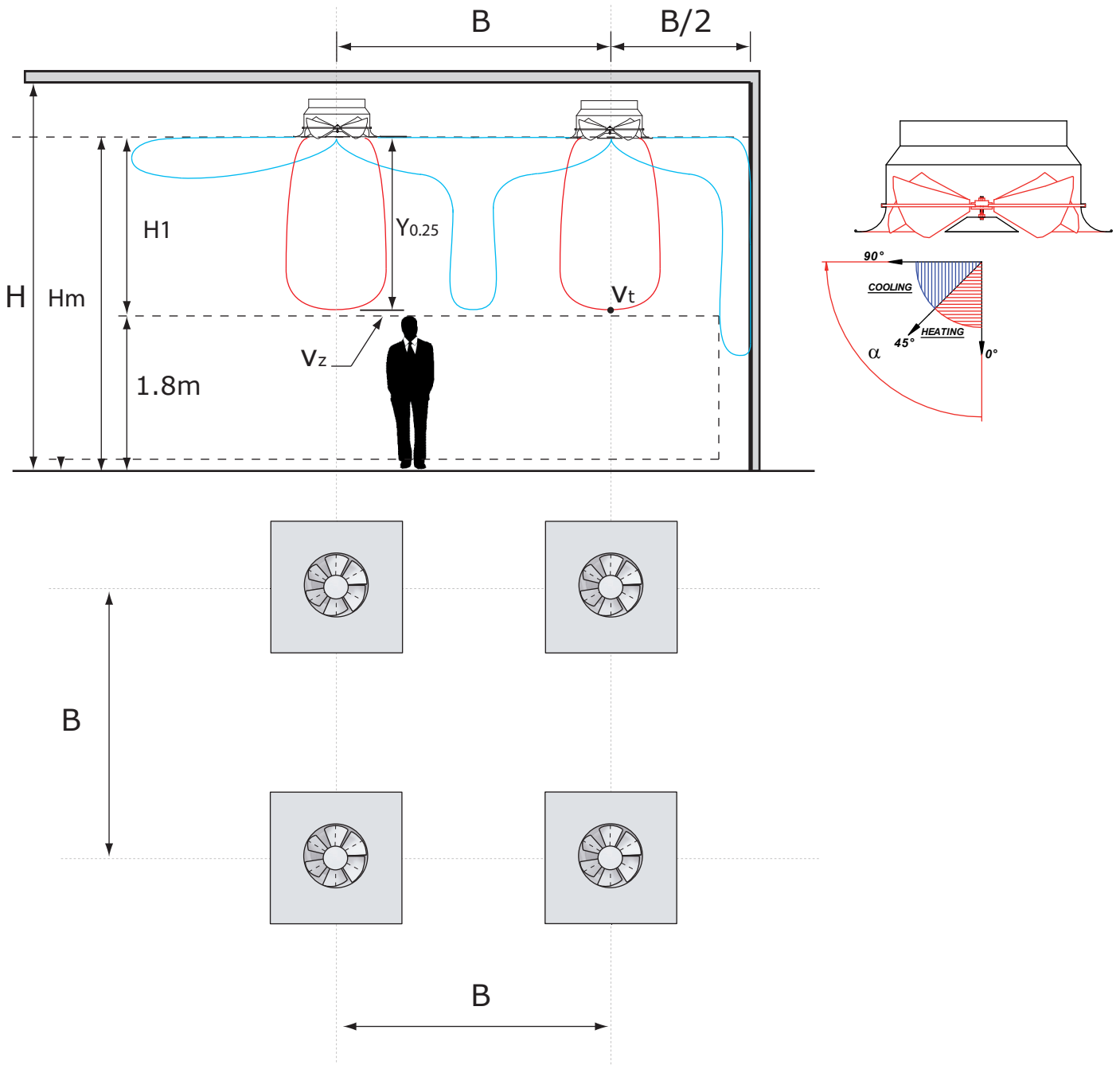
Type	Dimensions						
	D1 [mm]	D2 [mm]	D3 [mm]	H [mm]	H1 [mm]	H2 [mm]	R [mm]
PS/RWR-4 200	198	248	96	180	20	40	30
PS/RWR-4 250	248	298	133	205	30	40	30
PS/RWR-4 315	313	398	175	230	30	40	30

PS/RWR-4	Quick selection	200	250	315
		Q	Ak	0.0305
	Hm	2,5 - 3,8	3,0 - 5,3	3,3 - 6
300	B(min)	2.4	1.6	
	Vk	2.7	1.7	
	Ps	13	5	
	Lw(A)	35	24	
400	B(min)	3	2.2	2
	Vk	3.6	2.3	1.5
	Ps	22	9	4
	Lw(A)	44	32	22
500	B(min)	3.8	2.8	2
	Vk	4.6	2.9	1.8
	Ps	34	13	5
	Lw(A)	51	39	24
600	B(min)		3.4	2.4
	Vk		3.5	2.2
	Ps		20	7
	Lw(A)		44	29
800	B(min)			3
	Vk			2.9
	Ps			14
	Lw(A)			38
1000	B(min)			3.8
	Vk			3.6
	Ps			22
	Lw(A)			45

### Symbols and specifications

- Q = Air Volume in m<sup>3</sup>/h
  - Ak = Effective surface (free area) of the neck of the diffuser in m<sup>2</sup>
  - Hm = Advised minimum - maximum mounting height in m
  - Bmin = Advised minimum distance between diffusers in m
  - Vk = Air velocity trough the neck of the diffuser in m/s
  - Ps = Static pressure loss in Pa
  - Lw(A) = Acoustic power in dB(A)
- The values are given for isothermal supply air without Coanda effect.
  - The values in the table are given at an inclination angle  $\alpha$  of the vanes of the diffuser set at 45°.
  - In order to achieve a high comfort level, the angle of the blades can be set according to the temperature difference  $\Delta t$  between the supply air and room air temperature. (see selection graphs)
  - Acoustic powers below 20dB(A) are mentioned as "<20" in the tables.
  - For all special requirements, please contact our engineering office.

Placement instruction

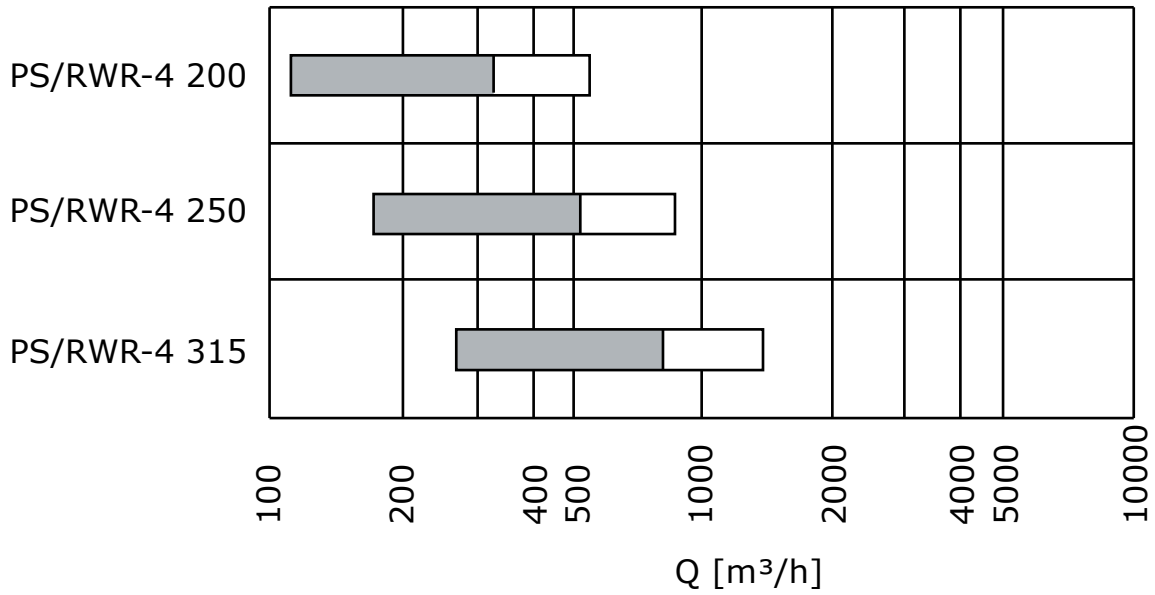


Noise selection table

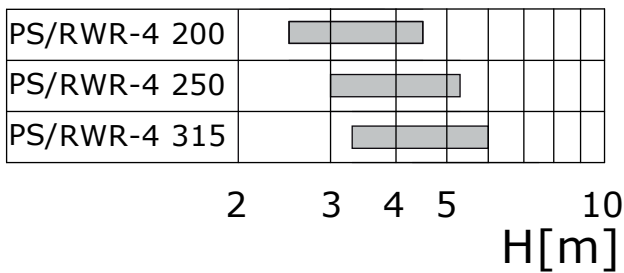
$\alpha = 45^\circ$

■  $35 < (LwA [dB(A)]) < 20$

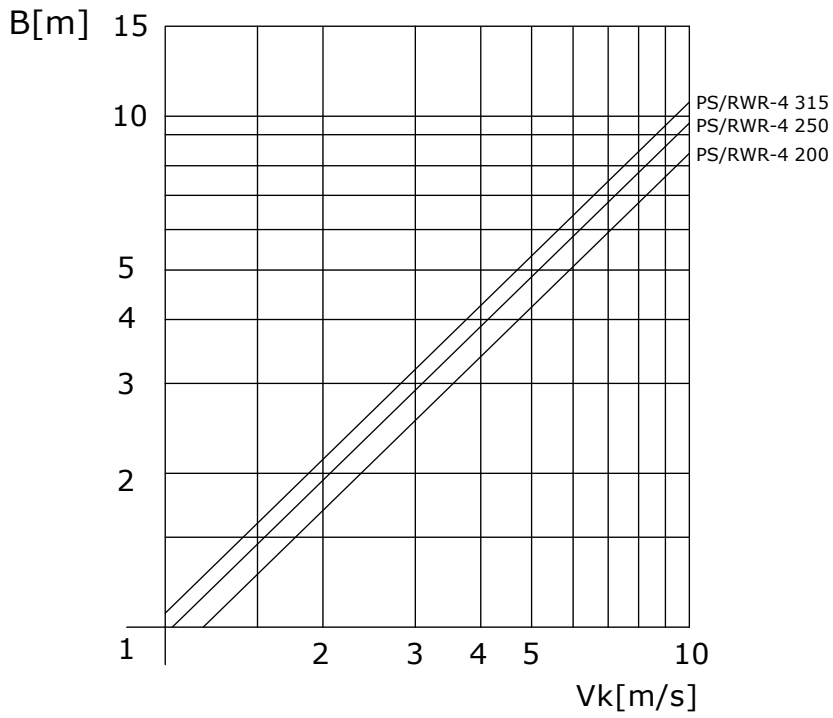
□  $50 < (LwA [dB(A)]) < 35$



Placement height selector



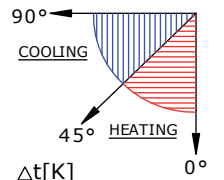
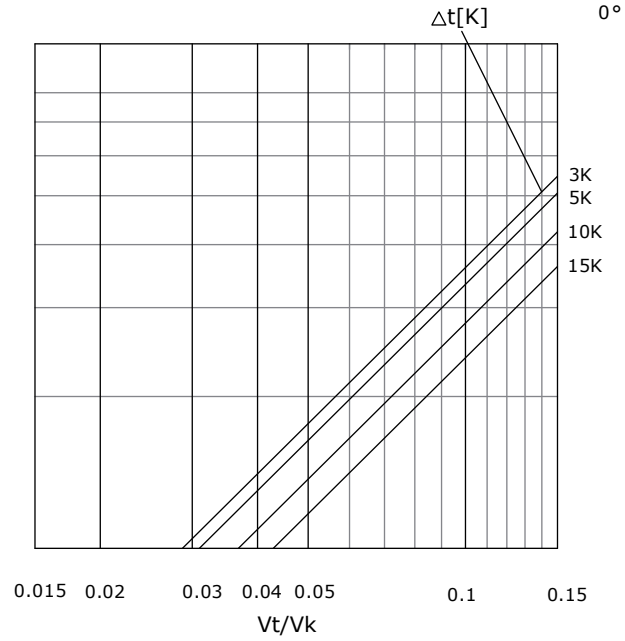
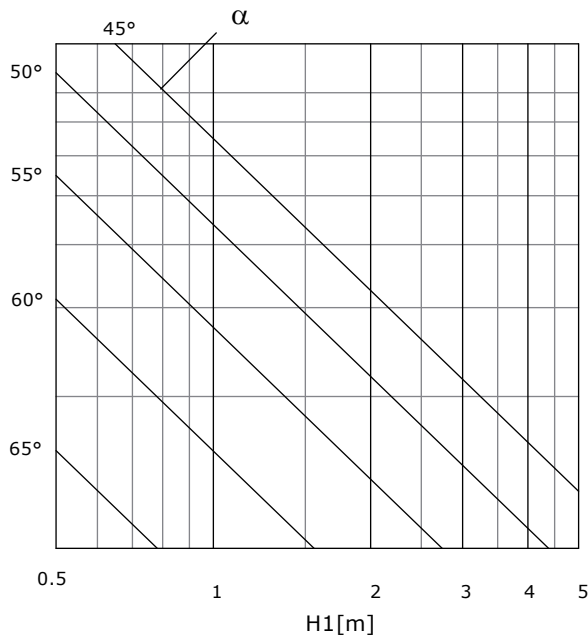
## Minimum distance selection



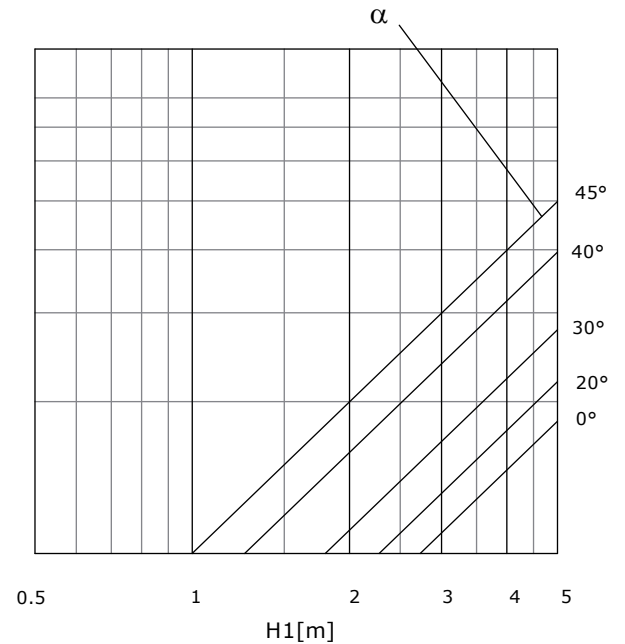
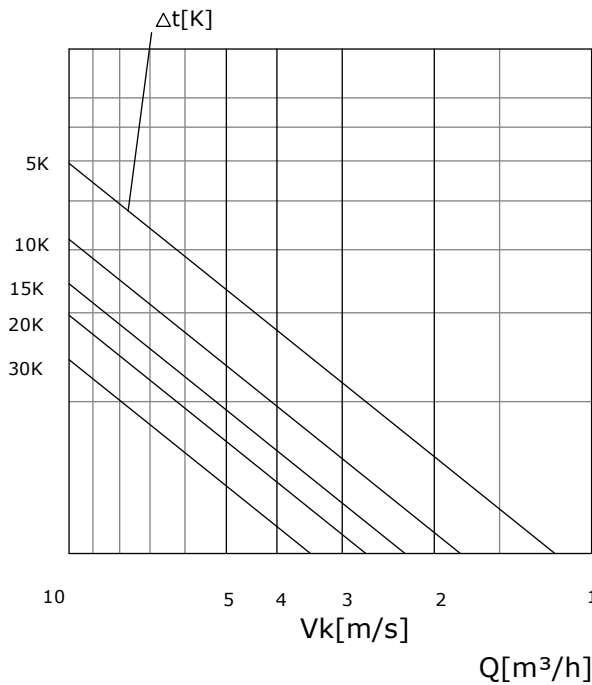
**Angle setting size 200**

$\alpha$  -setting PS/RWR-4 200

COOLING



HEATING



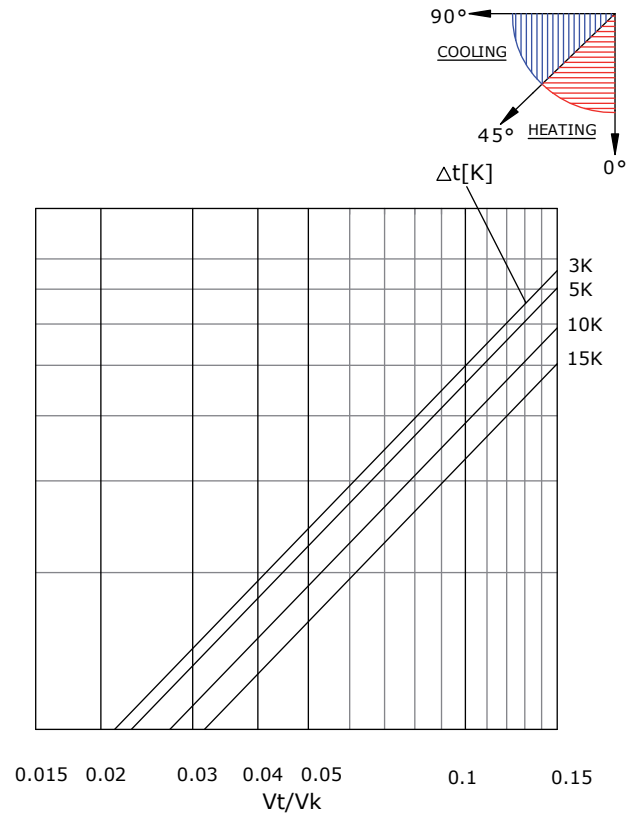
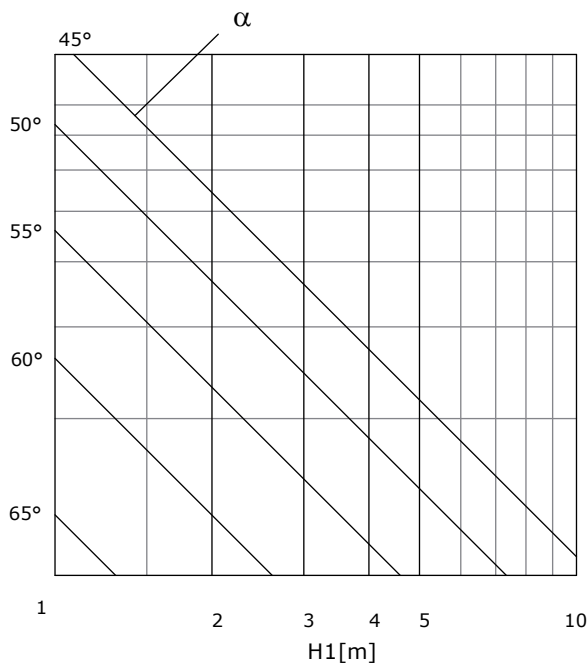
$Q$  [m<sup>3</sup>/h]

**Angle setting size 250**

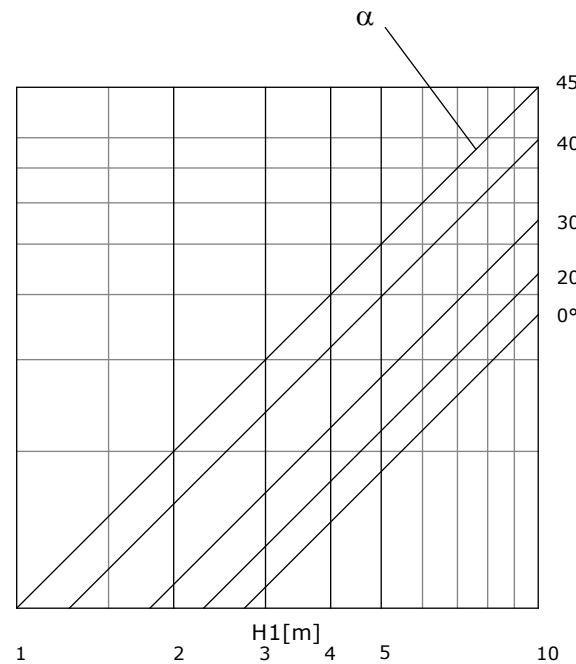
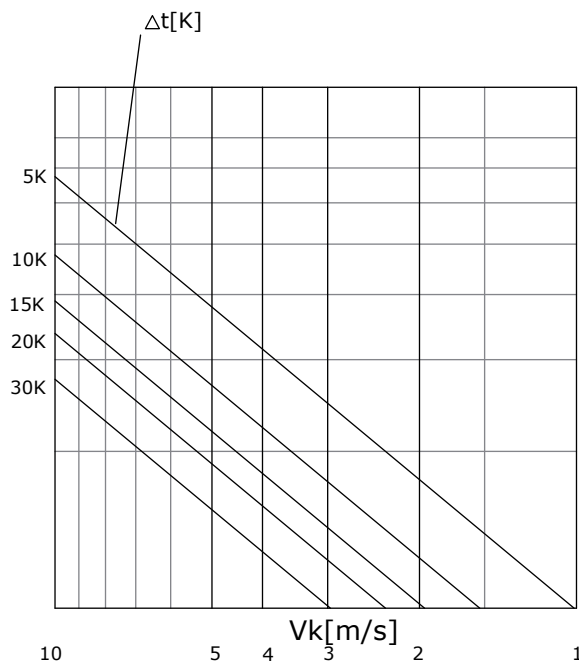


$\alpha$  -setting PS/RWR-4 250

COOLING



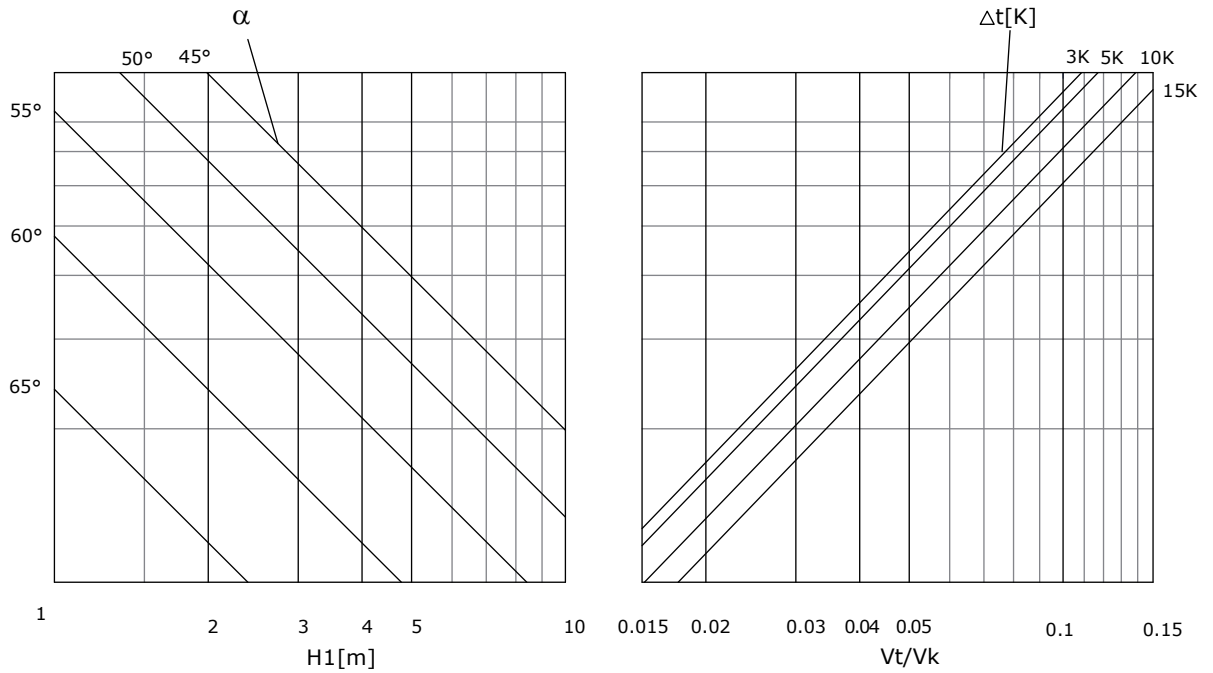
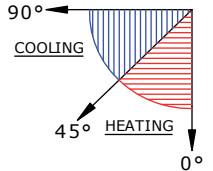
HEATING



**Angle setting size 315**

$\alpha$  -setting PS/RWR-4 315

COOLING



HEATING

