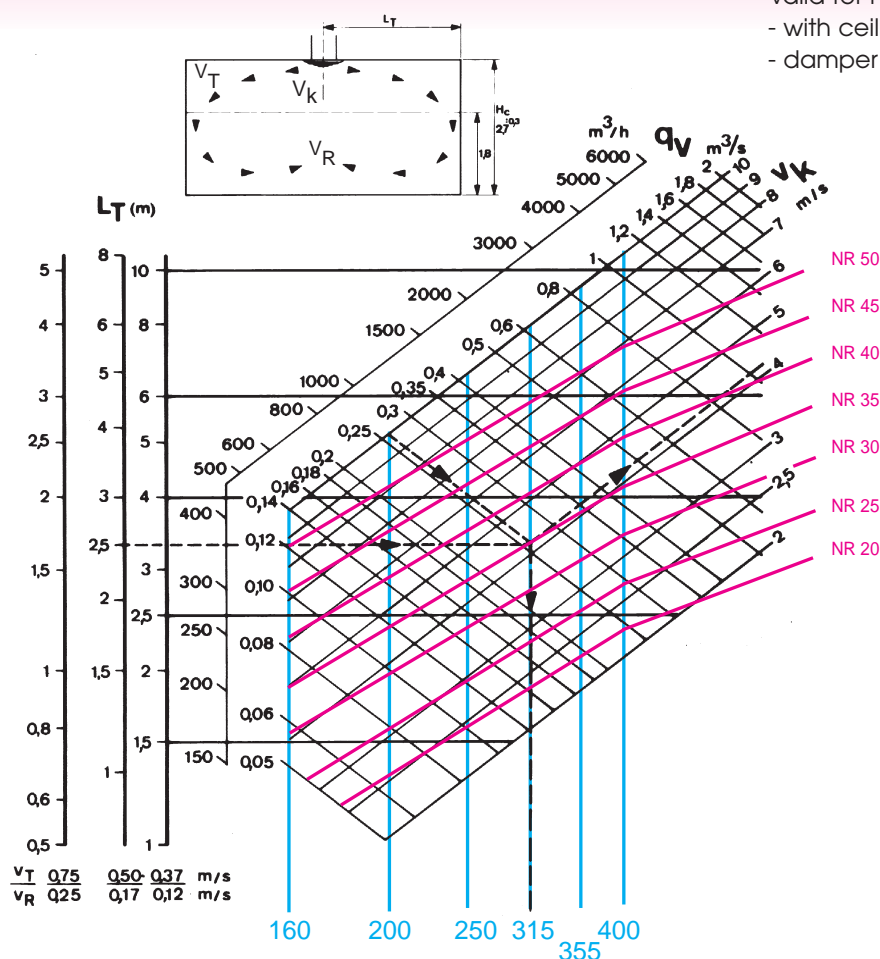


# CIRCULAR DIFFUSER WITH ADJUSTABLE AIR PATTERN DE100

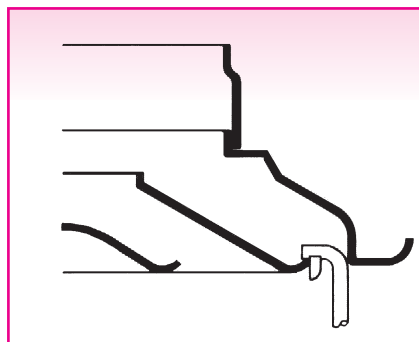
## Selection diagram - supply

Type DE100

Valid for cooling up to  $\Delta t_s = -16\text{ K}$   
Valid for heating up to  $\Delta t_s = +30\text{ K}$   
- with ceiling effect  
- damper completely open



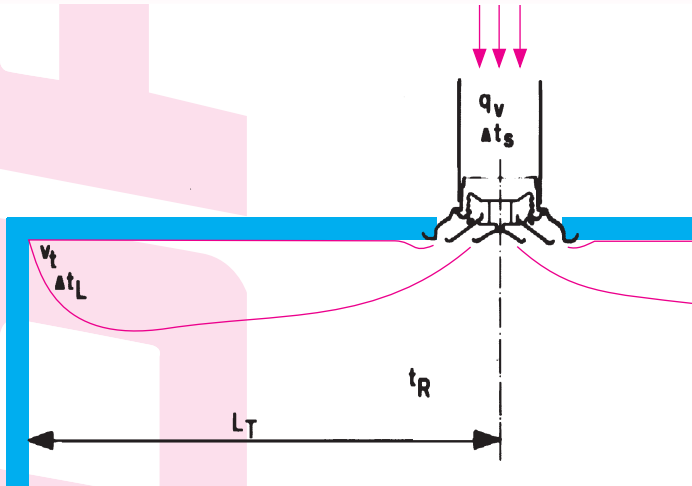
## Air flow rate measurement - supply



Velometer jet: 2220 A or 6070

$A_k$ - and $A_n$ - values ( $\text{m}^2$ )						
Size	160	200	250	315	355	400
$A_k$ hor.	0,014	0,026	0,042	0,062	0,085	0,112
$A_k$ vert.	0,011	0,019	0,027	0,043	0,058	0,080
$A_n$	0,020	0,031	0,049	0,078	0,099	0,126

## Example



### Selection data:

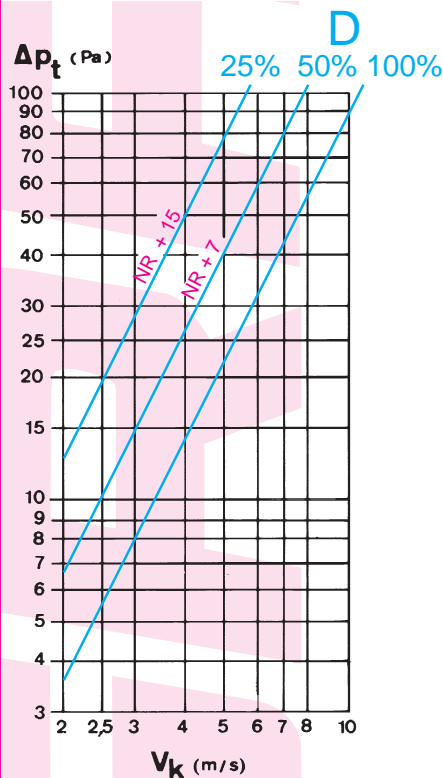
- Air flow rate  $q_v = 0,25 \text{ m}^3/\text{s}$
- Throw  $L_T = 2,5 \text{ m}$  at  $v_T = 0,50 \text{ m/s}$

### Solution:

- Size 315 mm
- Supply air velocity  $v_k = 4 \text{ m/s}$
- Noise level NR 35
- Total pressure loss with damper DT004 100 % open:  $\Delta p_t = 14 \text{ Pa}$

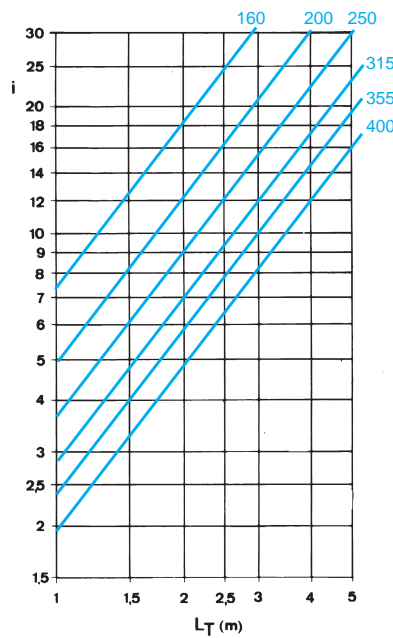
## Pressure loss

with damper type DT004



## Induction and temperature quotient with ceiling effect

### Induction



### Temperature quotient

