

WUCA

Wall/duct diffuser Supply Adjustable vane

Available types

W U - A - O

- W** wall/duct diffuser
- U** universal application

- Vanes

- A** vertical vanes
- B** horizontal vanes
- C** horizontal and vertical vanes

- A** frame 30 mm, fixed internal unit

- Accessories

- O** none
- V** volume unit
- B** volume unit and deflector 15°

- O** not applicable

SA-Select

Check SA-Select to create extended order codes and selection details online. **NB!** At this moment, SA-Select is only available in Dutch. But it is possible to create extended order codes and selection details online.

Use

The WUCA (WUAA, WUBA) wall diffuser is suitable for supplying cooled or heated air with a large temperature difference. The diffuser can be fitted in a wall or a duct. The horizontal and/or vertical vanes can be adjusted manually.

Characteristics

Max. number of air changes:	up to 8 x
Undertemperature:	up to 10 K
Overttemperature:	up to 15 K
Free flow:	70 %

Version

Wall diffuser

Frame and vanes:	anodised aluminium
Post-treatment:	none, optional RAL colour of your choice

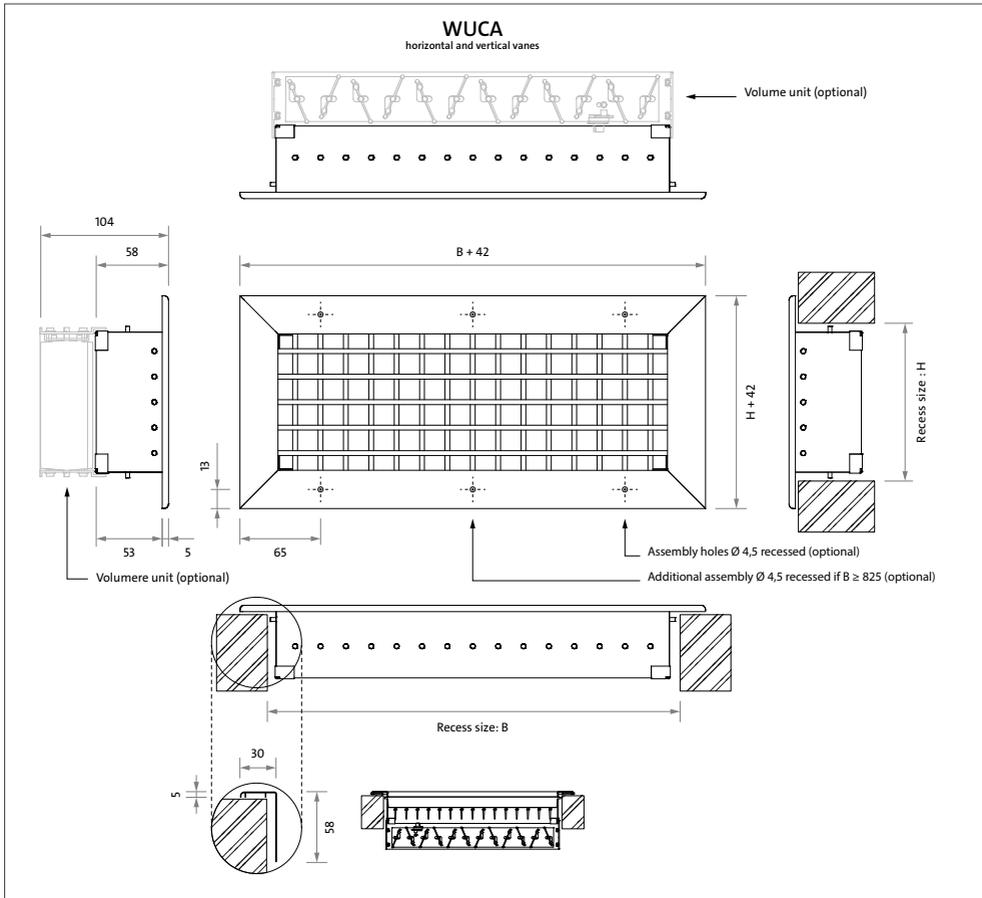
Volume unit

Frame and vanes:	anodised aluminium
Post-treatment:	none

Optional

Click frame:	WOOOKW available up to W x H: 625 x 325 mm the diffuser has spring clips when used with a click frame. See documentation.
Plenum boxes:	WTO/WRO, insulated or uninsulated
Mounting holes:	in frame

Dimensions



Standard dimensions

H	B							
	225	325	425	525	625	825	1025	1225
85	■	■	■	■	■	■	■	■
125	■	■	■	■	■	■	■	■
225	■	■	■	■	■	■	■	■
325	■	■	■	■	■	■	■	■
425	■	■	■	■	■	■	■	■

The available models marked in grey are not preferable from an air-distribution point of view, and therefore they are not included as standard in SA-Select. These selection details are available on request.

Available dimensions

- Width min. 225, max. 1225.
- Height min. 85, max 425.
- Interim widths and heights available in increments of 20 mm.

Note

- The listed dimensions are in mm.
- Recess size: $W \times H$.

Selection details

WUCA

air volume			B																												
			225			325			425			525			625			825			1025			1225							
m ³ /s	m ³ /h	H	W	Δp _i	L _{pa}	W	Δp _i	L _{pa}	W	Δp _i	L _{pa}	W	Δp _i	L _{pa}	W	Δp _i	L _{pa}	W	Δp _i	L _{pa}	W	Δp _i	L _{pa}	W	Δp _i	L _{pa}	W	Δp _i	L _{pa}		
		m	Pa	dB(A)	m	Pa	dB(A)	m	Pa	dB(A)	m	Pa	dB(A)	m	Pa	dB(A)	m	Pa	dB(A)	m	Pa	dB(A)	m	Pa	dB(A)	m	Pa	dB(A)	m	Pa	dB(A)
0.015	54	85																													
0.020	72	85	2.2	2	-																										
0.025	90	85	2.7	2	-	2.2	1	-																							
0.030	108	85	3.3	3	-	2.7	2	-																							
0.040	144	85	4.3	6	12	3.6	3	-	3.1	2	-	2.8	1	-																	
		125	3.2	2	-																										
0.050	180	85	5.4	10	18	4.5	4	9	3.8	2	-	3.5	2	-	3.2	1	-														
		125	4.0	3	5	3.3	1	-																							
0.060	216	85				5.4	6	14	4.7	4	8	4.2	2	-	3.8	2	-														
		125	4.8	4	10	4.0	2	-	3.4	1	-																				
0.070	252	85				6.3	9	18	5.4	5	12	4.9	3	7	4.5	2	-														
		125	5.6	6	13	4.6	3	-	4.0	1	-																				
0.080	288	85				7.2	11	21	6.2	6	15	5.6	4	11	5.1	3	7														
		125	6.4	7	17	5.3	3	8	4.6	2	-	4.1	1	-																	
0.100	360	85				7.8	10	21	7.0	7	16	6.4	5	13																	
		125	8.0	11	23	6.6	5	14	5.7	3	8	5.1	2	-	4.7	1	-														
0.125	450	85										8.7	10	22	8.0	7	18														
		125				8.3	8	20	7.2	5	14	6.4	3	9	5.9	2	5	5.1	1	-											
0.150	540	85										9.6	10	23																	
		125				9.9	12	25	8.6	7	19	7.7	4	14	7.1	3	10	6.1	2	-	5.5	1	-								
0.200	720	125							11.5	12	26	10.3	8	21	9.4	5	17	8.2	3	11	7.3	2	7								
		225							8.3	3	12	7.5	2	7	6.8	1	-														
0.300	1080	125													14.1	12	28	12.3	7	22	11.0	4	17								
		225							12.5	7	23	11.2	5	18	10.2	3	14	8.9	2	8	7.9	1	3								
		325													8.4	2	6														
0.400	1440	125																16.3	12	29	14.6	8	25								
		225										14.9	9	25	13.6	6	21	11.8	3	15	10.6	2	11								
		325													11.2	3	13														
0.500	1800	225													17.0	9	27	14.8	5	21	13.2	3	16	12.1	2	12					
		325													14.0	4	19	12.2	2	13	10.9	2	8	10.0	1	-					
		425													12.2	2	13	10.6	1	7											
0.600	2160	225													20.4	13	32	17.7	8	26	15.9	5	21	14.5	3	17					
		325													16.8	6	24	14.6	3	17	13.1	2	13	11.9	2	9					
		425													14.6	4	18	12.7	2	11	11.4	1	7								
0.700	2520	225																20.7	10	30	18.5	7	25	16.9	5	21					
		325													19.6	8	28	17.0	5	21	15.3	3	17	13.9	2	13					
		425													17.1	5	22	14.8	3	15	13.3	2	11	12.1	1	7					
0.800	2880	225																			21.2	9	29	19.3	6	25					
		325													22.4	11	31	19.5	6	25	17.4	4	20	15.9	3	16					
		425													19.5	6	25	16.9	4	19	15.2	2	14	13.8	2	10					
1.000	3600	225																						24.2	9	30					
		325																			24.3	10	31	21.8	6	26	19.9	4	22		
		425														24.4	10	31	21.2	6	25	18.9	4	20	17.3	2	16				

General

- The throw is given for a straight discharge pattern and fitting up to 0.6 m below a flat, closed ceiling. For a maximum spread, the given throw x 0.65 applies.
- With a setting to the left or the right, the given throw x 0.8 applies.
- The pressure loss applies to a fully opened volume unit and a vane setting for a straight discharge pattern.
- The assumed room attenuation is 10 dB.
- It is permitted to interpolate the interim values.

Note

- When fitted < 0.3 m below the ceiling, it is recommended to have an upward inflow at an angle of approximately 5°.
- When fitted 0.3 - 0.6 m below the ceiling, it is recommended to have an upward inflow at an angle of approximately 15°.
- This does not have a measurable impact on the throw length.
- If the distance below the ceiling is greater, the Coanda effect will be small during cooling and this may create an unstable air pattern.