

INDULINE 1W / 2W



INDULINE diffusers allow wall air to be distributed with high induction when there are high endogenous loads, even when there is no false ceiling, thanks to the use of special C20 type micro spot diffusers appropriately matched based on the model and length of the diffusers. Ideal for where it is not possible to install a false ceiling, but it is necessary to use high induction components to guarantee obtainment of comfort.

They allow ceiling returns to be achieved on the same wall without creating "short circuits" in the air flows.

The supply diffuser with rectangular section has one or two rows of micro spot diffusers, also with rectangular section, arranged vertically.

The micro spot diffusers are the open type of the return version.

Distribution plenum with fitting:

- circular lateral,
- oval rear.

MATERIAL AND FINISH

- Diffuser, both supply and return, in painted steel white RAL9010
- Diffuser finish in RAL colours (UPON REQUEST)
- Rectangular section micro spot diffusers in black plastic
- Micro spot diffusers available in grey (similar to RAL7035) or white (similar to RAL9010) (UPON REQUEST)

APPLICATION

- Suitable for installations in offices, in the residential sector, in the tertiary sector, in hotels
- Suitable for both VAV and CAV systems, combined with fan-convectors or ducted units, or in direct expansion systems
- Installation height between 2.4 and 6.0 m
- Temperature difference during summer operation ΔT -14 K and during winter operation of maximum ΔT +10 K

FASTENING

Diffuser plate fastened to distribution plenum by concealed screws on brackets

VERSIONS

Supply

- **1W** with single or modular rectangular plate for in-line installation, complete with a row of C20 type micro spot diffusers
- **2W** with single or modular rectangular plate for in-line installation, complete with two rows of C20 type micro spot diffusers

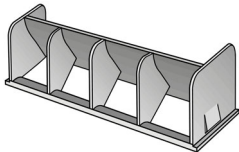
Return

- **1W-R** with single or modular rectangular plate for in-line installation, complete with a row of open type micro spot diffusers
- **2W-R** with single or modular rectangular plate for in-line installation, complete with two rows of open type micro spot diffusers

ACCESSORIES

- Polyethylene C1 6-mm internal insulation
- External insulation (UPON REQUEST)

ELEMENTS



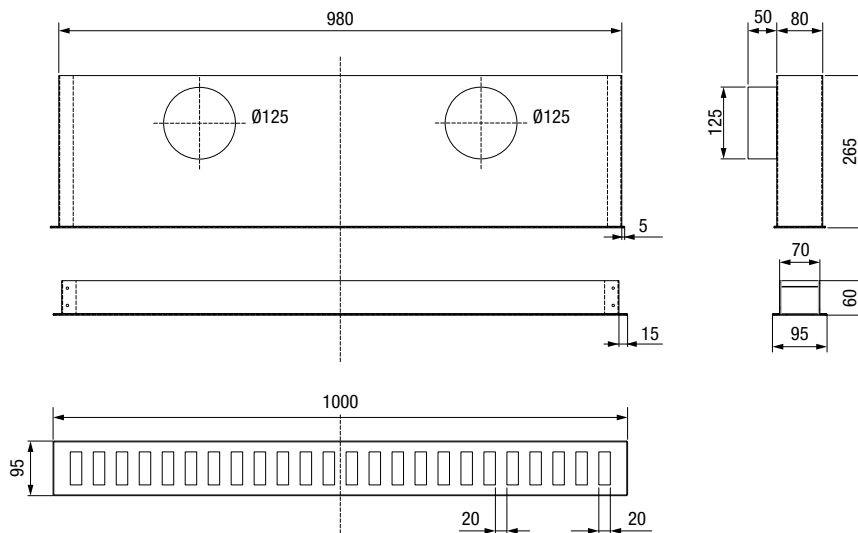
C20

INDULINE 1W

DIMENSIONS

Nr. connections \varnothing 123 mm external based on length

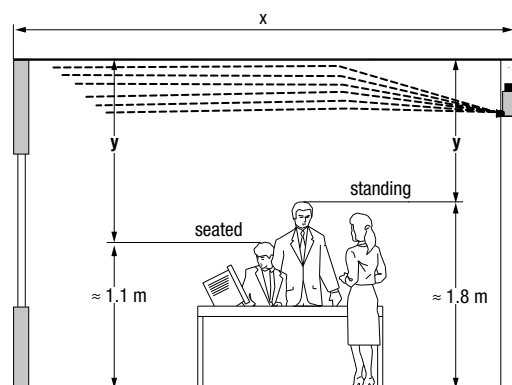
L [mm]	Nr	L [mm]	Nr
500	1	1300	2
600	1	1400	3
700	1	1500	3
800	2	1600	3
900	2	1700	3
1000	2	1800	3
1100	2	1900	4
1200	2	2000	4



Plenums **1W**
Depth **265 mm**
Side connection

Grille INDULINE 1W (L = 1000 mm)

PERFORMANCE



Definition of vertical air throw Y

V_R [m/s]	Q [m ³ /h • m]	ΔP [Pa]	Sound pressure level		
			4 Vol/h L _{pa} [dB(A)]	6 Vol/h L _{pa} [dB(A)]	10 Vol/h L _{pa} [dB(A)]
0.18	145	32	< 30	31	32
	180	49	34	34.5	37
	220	60	38	39.5	41
	245	90	40.5	42.5	44
0.15	120	22	< 30	< 30	< 30
	150	34	30	32	33.5
	185	51	34.5	35	37.5
	205	63	36	38	39.5
0.12	100	15	< 30	< 30	< 30
	125	23	< 30	< 30	< 30
	150	34	30	32	33
	170	43	33	34.5	36

QUICK SELECTION

Values with room height between 2.7 and 3.0 m

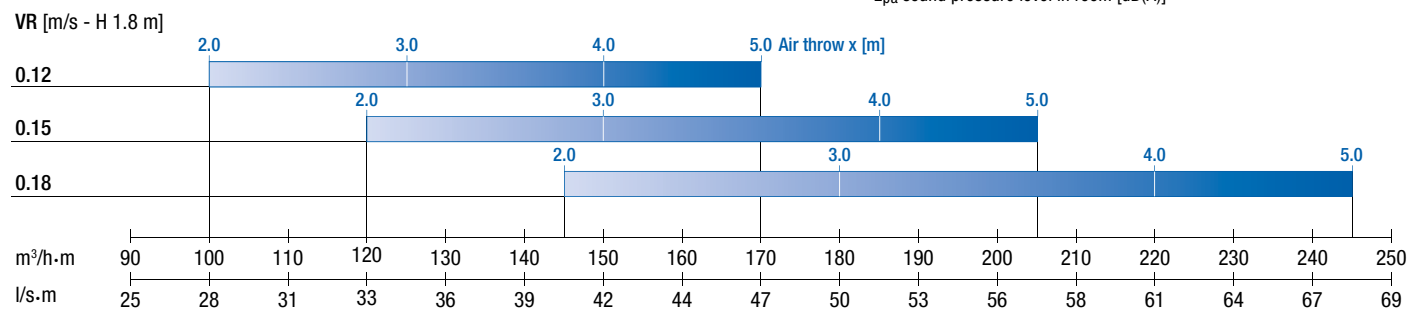
Wall mounting, diffuser positioned between 100 and 300 mm from ceiling

V_R with ΔT -12 K reference height for $V_R = 1.8$ m from ground

Reverberation time 0.6 s

Connection diameter \varnothing 125 mm

L_{pa} sound pressure level in room [dB(A)]



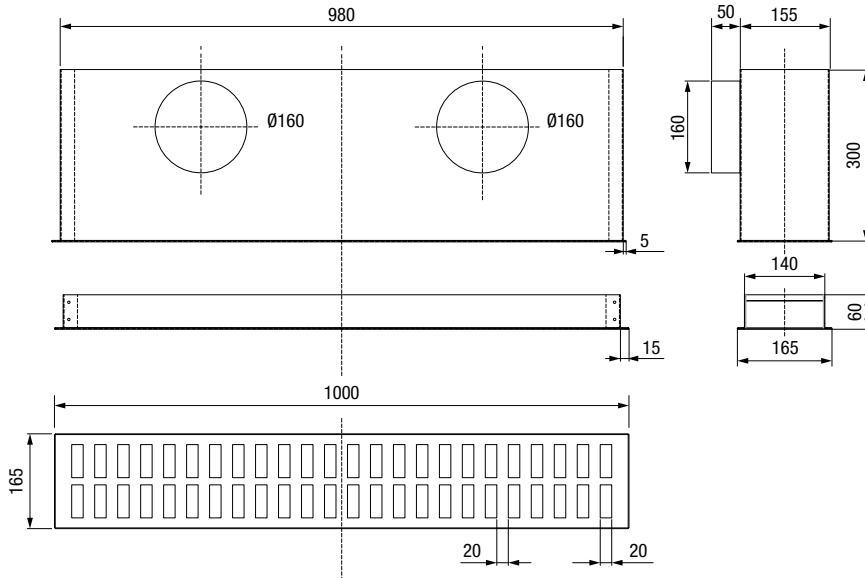
INDULINE 2W

DIMENSIONS

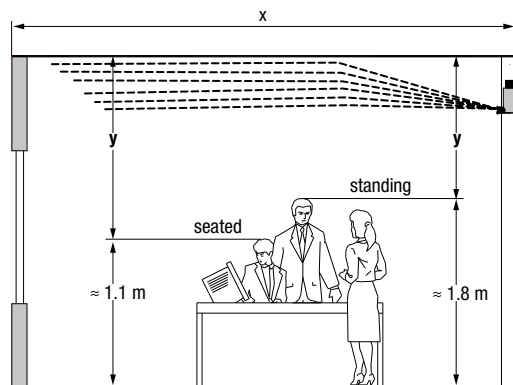
Nr. connections \varnothing 158 mm external based on length

L [mm]	Nr	L [mm]	Nr
500	1	1300	2
600	1	1400	3
700	1	1500	3
800	2	1600	3
900	2	1700	3
1000	2	1800	3
1100	2	1900	4
1200	2	2000	4

Plenums **2W**
 Depth **300 mm**
 Side connection
 Grille INDULINE 2W (L = 1000 mm)



PERFORMANCE



Definition of vertical air throw Y

V_R [m/s]	Q [m ³ /h • m]	ΔP [Pa]	Sound pressure level		
			4 Vol/h L _{pa} [dB(A)]	6 Vol/h L _{pa} [dB(A)]	10 Vol/h L _{pa} [dB(A)]
0.18	220	18	< 30	< 30	< 30
	285	31	30	32	33.5
	340	43	34	35.5	37
	380	55	36.5	38	39.5
0.15	185	13	< 30	< 30	< 30
	240	22	< 30	< 30	< 30
	285	31	30	32	33.5
	320	37	32	34	35.5
0.12	145	8	< 30	< 30	< 30
	185	13	< 30	< 30	< 30
	220	18	< 30	< 30	< 30
	250	24	< 30	< 30	30

QUICK SELECTION

Values with room height between 2.7 and 3.0 m
 Wall mounting, diffuser positioned between 100 and 300 mm from ceiling
 V_R with ΔT -12 K reference height for $V_R = 1.8$ m from ground
 Reverberation time 0.6 s
 Connection diameter $\varnothing 160$ mm
 L_{pa} sound pressure level in room [dB(A)]

