

Description and application

Grille intake and exhaust used in low and medium pressure industrial facilities or public areas where it is necessary to exchange a large amount of air. KSI/D is set installed primarily in the doors wings and garage doors, where is need to mask ventilation hole from one side and the other side the door. Installation is done by using visible screws in stamped holes in the grille frame. On request there is possibility of making the grille with a damper for regulating the air flow.

Grille has Hygienic Certificate HK/K/0522/02/2016

Material and workmanship

In standard grille is made of galvanized steel and expanded metal mesh, the whole grille is powder coated in white color RAL 9016. On request, it is possible to paint in any RAL color and execution of stainless steel or aluminum.

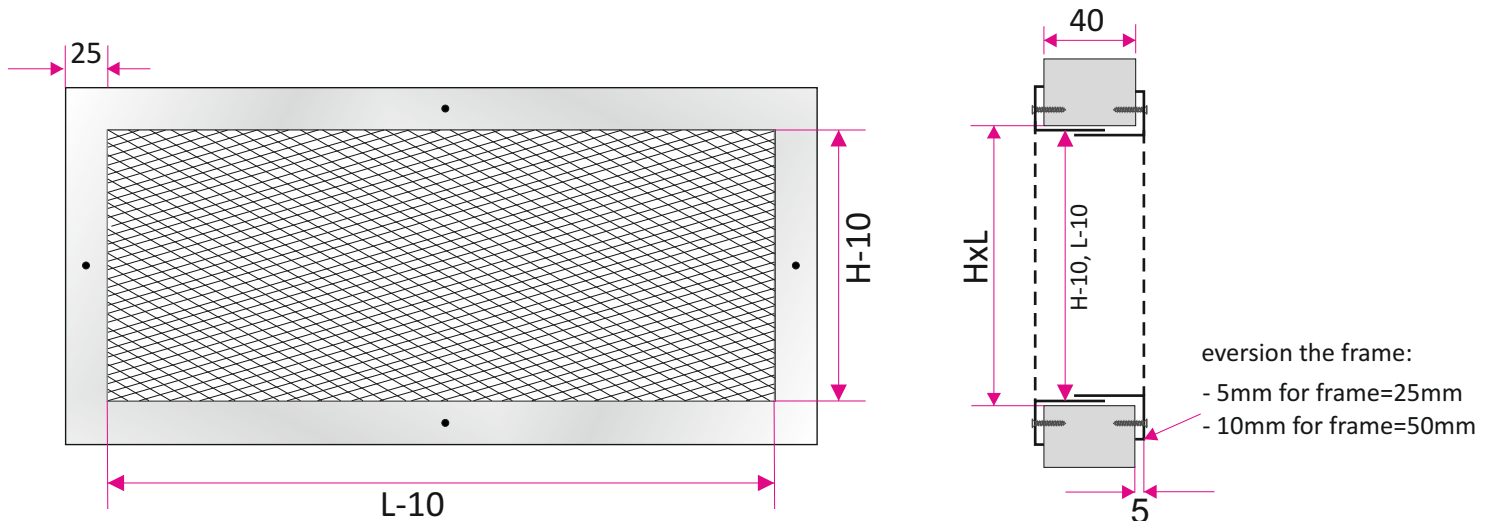
Size

Grilles are manufactured to order. Dimension grilles by the customer request (LxH).

width of the frame for dimensions

L and H < 1000mm = 25mm

L and H > 1000mm = 50mm



Quick selection

There is a possibility to use mesh with different mesh sizes:

- 1) N16-12x7 - clearance 73% (Table 1.)
- 2) N14-10x6 - clearance 75% (Table 2.)
- 4) N8-5x3 - clearance 68% (Table 3.)

For $A_{ef}=0,022$ [m²] the smallest proposed dimensions [LxH] grille:

- N16-12x7 (clearance relative 73%) 525x75, 325x125, 225x225
- N14-10x6 (clearance relative 75%) 525x75, 325x125, 225x225
- N8-5x3 (clearance relative 68%) 525x75, 325x125, 225x225

H [mm] \ L [mm]	125	225	325	425	525	625	825	1025	1225
	$A_{ef} (m^2)$ - powierzchnia efektywna								
75	0,005	0,010	0,015	0,022	0,024	0,029	0,039	0,048	0,058
125	0,010	0,018	0,026	0,035	0,043	0,052	0,068	0,085	0,102
225		0,034	0,049	0,065	0,081	0,097	0,128	0,159	0,191
325			0,072	0,095	0,118	0,141	0,187	0,233	0,279
425				0,126	0,156	0,186	0,246	0,307	0,368
525					0,194	0,231	0,306	0,382	0,457
625						0,276	0,366	0,456	0,545

Table 1.

Effective area to mesh having a mesh N16-12x7 and (73%)

H [mm] \ L [mm]	125	225	325	425	525	625	825	1025	1225
	$A_{ef} (m^2)$ - powierzchnia efektywna								
75	0,006	0,011	0,015	0,020	0,025	0,030	0,040	0,050	0,059
125	0,010	0,019	0,027	0,036	0,044	0,053	0,070	0,088	0,105
225		0,035	0,051	0,067	0,083	0,099	0,131	0,164	0,196
325			0,074	0,098	0,122	0,145	0,192	0,240	0,287
425				0,129	0,160	0,179	0,237	0,295	0,353
525					0,186	0,222	0,294	0,366	0,438
625						0,265	0,351	0,437	0,523

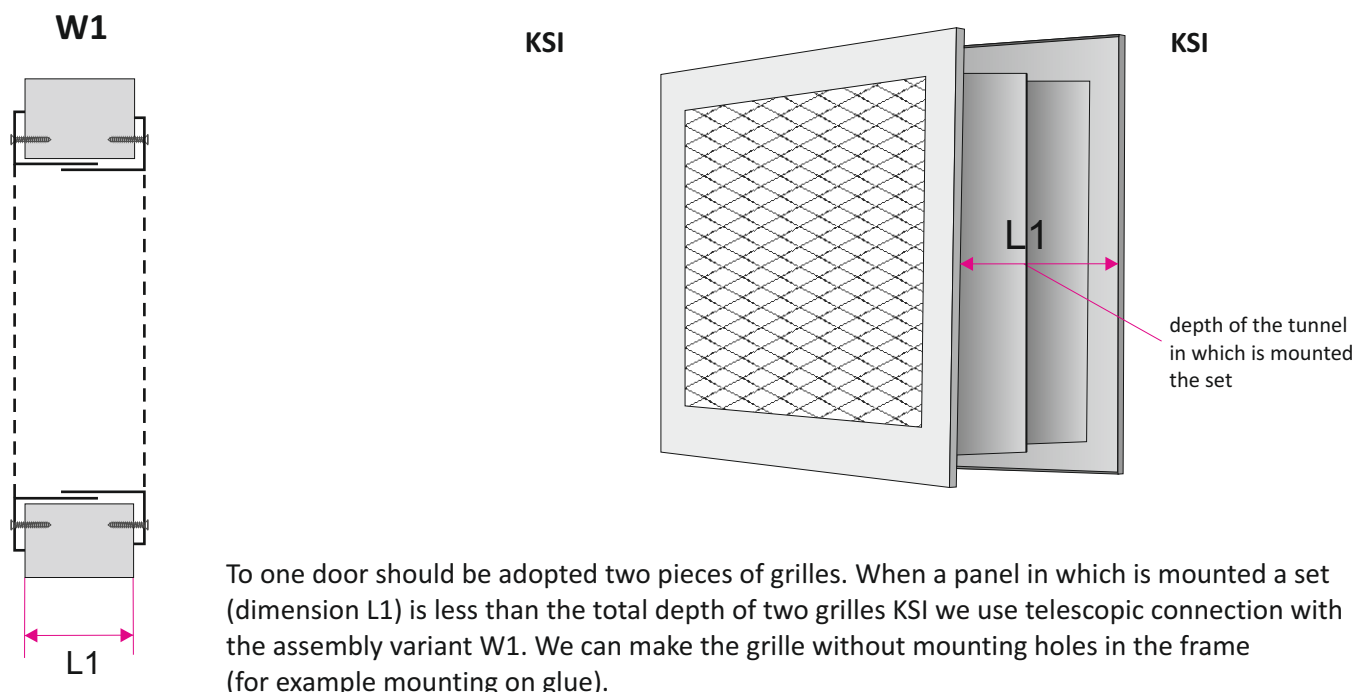
Table 2.

Effective area to mesh having a mesh N14-10x6 (70-75%)
The grille clearance depends on the mesh thickness.
To keep the rigidity of the grille, the mesh for size L, H > 500 has a thicker bridge of mesh.

H [mm] \ L [mm]	125	225	325	425	525	625	825	1025	1225
	$A_{ef} (m^2)$ - powierzchnia efektywna								
75	0,005	0,095	0,014	0,018	0,023	0,027	0,036	0,045	0,054
125	0,009	0,017	0,025	0,032	0,040	0,048	0,064	0,079	0,095
225		0,031	0,046	0,061	0,075	0,090	0,119	0,148	0,178
325			0,068	0,089	0,110	0,132	0,175	0,217	0,260
425				0,117	0,145	0,161	0,213	0,265	0,318
525					0,167	0,200	0,264	0,329	0,394
625						0,238	0,316	0,393	0,471

Table 3.

Effective area to mesh having a mesh N8-5x3 (63-68%)
The grille clearance depends on the mesh thickness.
To keep the rigidity of the grille, the mesh for size L, H > 500 has a thicker bridge of mesh.

Methods of mounting


To one door should be adopted two pieces of grilles. When a panel in which is mounted a set (dimension L1) is less than the total depth of two grilles KSI we use telescopic connection with the assembly variant W1. We can make the grille without mounting holes in the frame (for example mounting on glue).

The method of placing an order

Please make orders according to the following formula:

KSI/D / 'LxH' / 'L1' / 'RAL' / 'M' / 'W'

- 'LxH' - mounting hole size in doors (width x height) in mm
 'L1' - depth of the door panel
 'RAL' - grille color according to RAL palette (standard RAL9016*)
 'M' material:
OC - powder coated steel*
AL - aluminum powder coated
KO - stainless steel / acid proof steel (type 1.4301 or 1.4404)

* - If you don't give the information will be used standard parameters.