



MULTIDIRECTIONAL DIFFUSER WITH CENTRAL PANEL

KNP
SERIES

OVERVIEW TECHNICAL CHARACTERISTICS

OVERVIEW

The KNP450 four-way diffusers presents a solution for the contained air flows and interesting from both the fluid dynamics and in terms of its architecture.

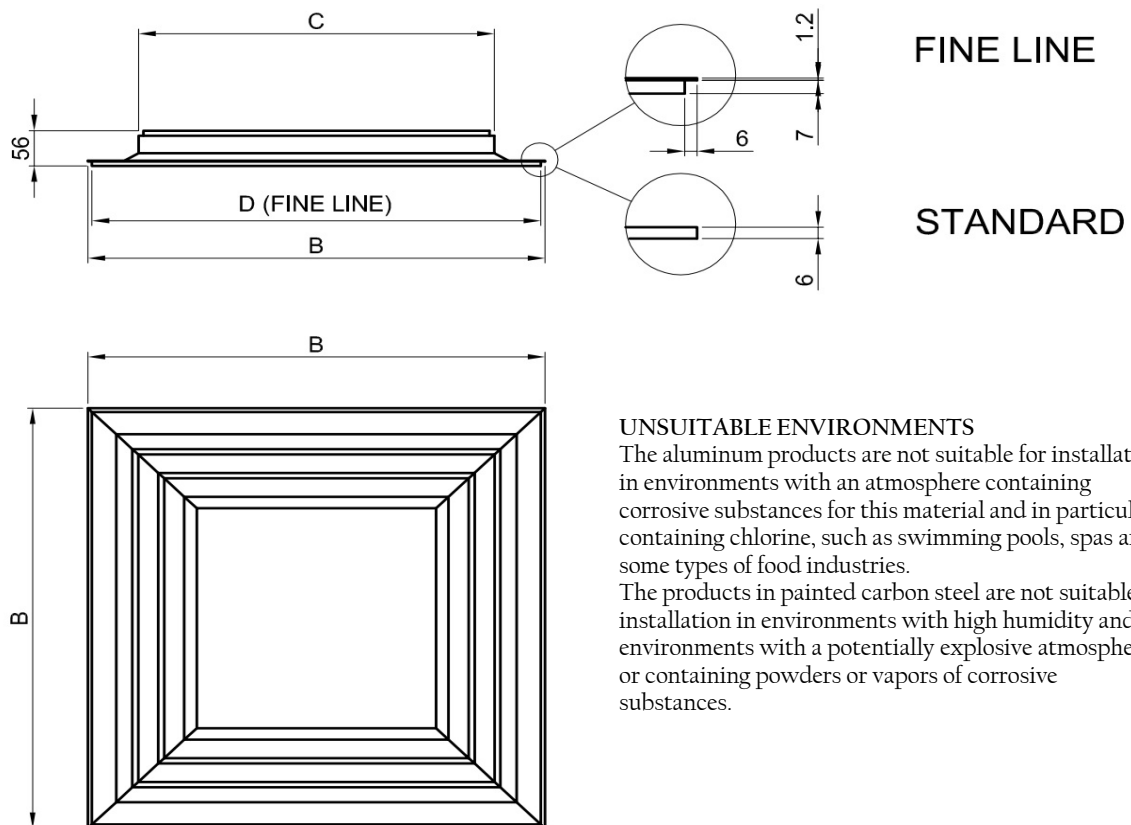
Compared with the traditional small diffuser fitted on the panel, in fact, in the KNP diffuser the flow is distributed on the two outer slots creating a wider throw that favours adherence to the ceiling. The smooth central panel also copies the line of counter ceiling giving the appearance of a very clean and tidy installation.

FIXING

Fixed in modular ceiling or through the hidden screws laterally to the neck of the diffuser. The central part of the diffuser is removable for ease of installation and connection.

MATERIALS AND FINISHES

The KNP diffuser series is made of aluminium with central panel made of carbon steel and painted white RAL 9010



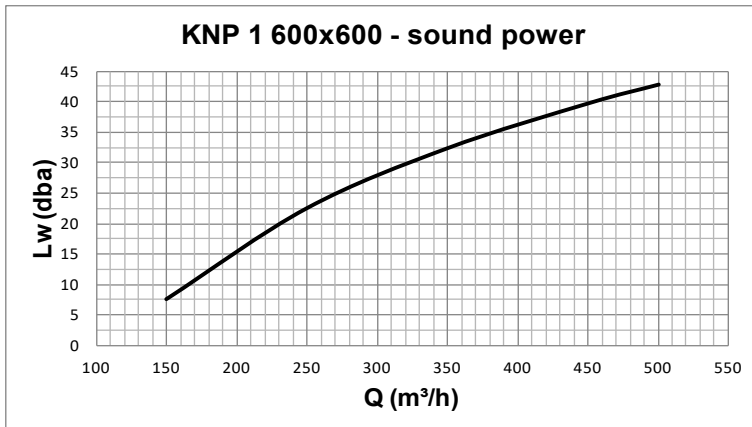
| DIFFUSER | B [mm] | C [mm] | D* [mm] | * FINE LINE ONLY |
|-----------|--------|--------|---------|------------------|
| 600 X 600 | 595 | 448 | 583 | |
| 675 X 675 | 670 | 523 | 658 | |



MULTIDIRECTIONAL DIFFUSER WITH CENTRAL PANEL

KNP
SERIES

KNP 600x600 ONE SLOT TECHNICAL DATA

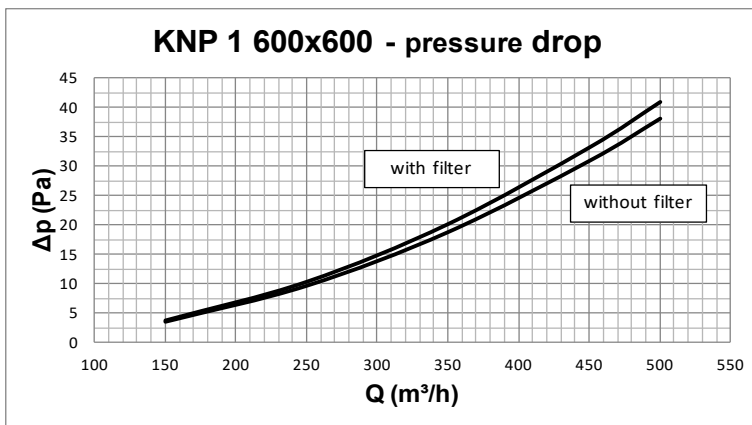


Acoustic data measured in reverberation room in accordance with international standard:

ISO 3741 1999: *Acoustic - determination of sound power levels of noise sources using sound pressure - Precision methods for reverberation rooms*

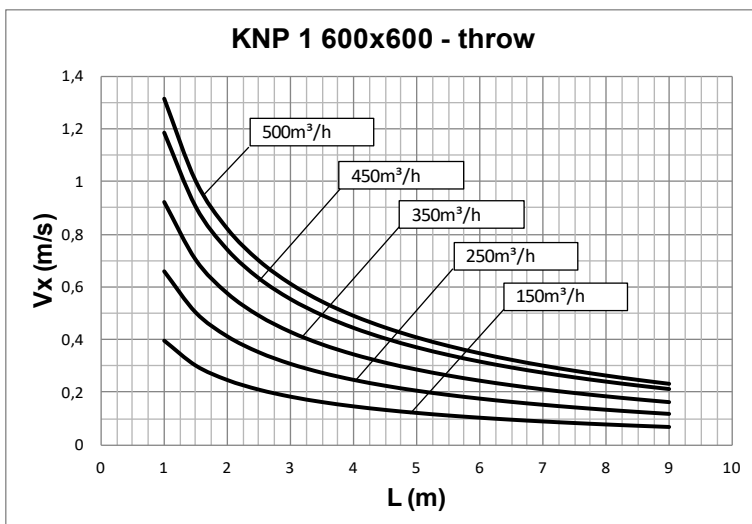
ISO 5135 1997: *Acoustic - determination of sound power levels of noise from air-terminal devices; air terminal units; dampers and valves by measurement in a reverberation room.*

The shown data does not take into consideration the attenuation resulting from the surroundings where the diffuser is installed. Such attenuation is normally included between 6 and 10 dBa and is determined by the size of the surrounding space, its shape and the characteristics of the furniture and room fittings.



Pressure loss measured in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*



Data measured working in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*

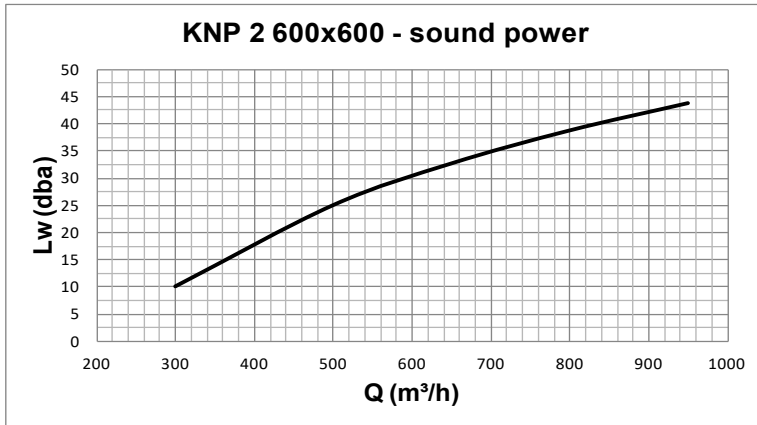
L (m) horizontal distance in metres from the centre of the diffuser
Vx (m/s) maximum speed inside the air stream



MULTIDIRECTIONAL DIFFUSER WITH CENTRAL PANEL

KNP
SERIES

KNP 600x600 TWO SLOTS
TECHNICAL DATA

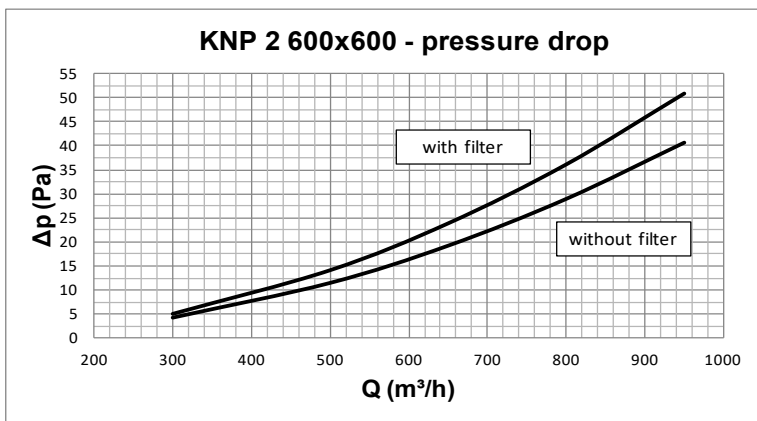


Acoustic data measured in reverberation room in accordance with international standard:

ISO 3741 1999: *Acoustic - determination of sound power levels of noise sources using sound pressure - Precision methods for reverberation rooms*

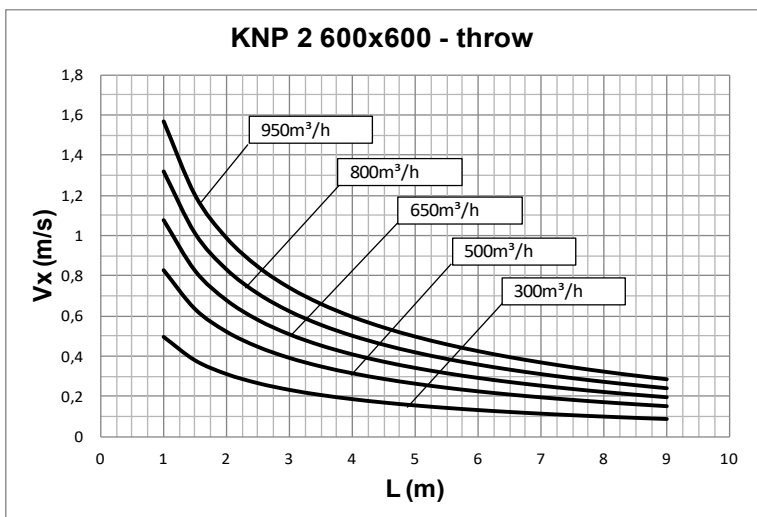
ISO 5135 1997: *Acoustic - determination of sound power levels of noise from air-terminal devices; air terminal units; dampers and valves by measurement in a reverberation room.*

The shown data does not take into consideration the attenuation resulting from the surroundings where the diffuser is installed. Such attenuation is normally included between 6 and 10 dBa and is determined by the size of the surrounding space, its shape and the characteristics of the furniture and room fittings.



Pressure loss measured in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*



Data measured working in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*

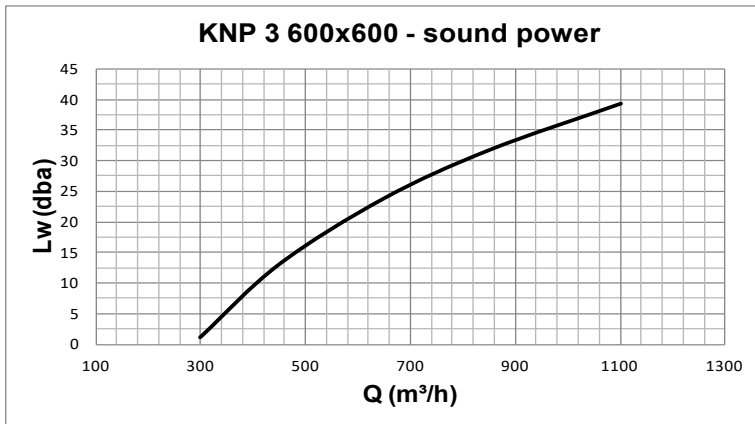
L (m) horizontal distance in metres from the centre of the diffuser
Vx (m/s) maximum speed inside the air stream



MULTIDIRECTIONAL DIFFUSER WITH CENTRAL PANEL

KNP
SERIES

KNP 600x600 THREE SLOTS
TECHNICAL DATA

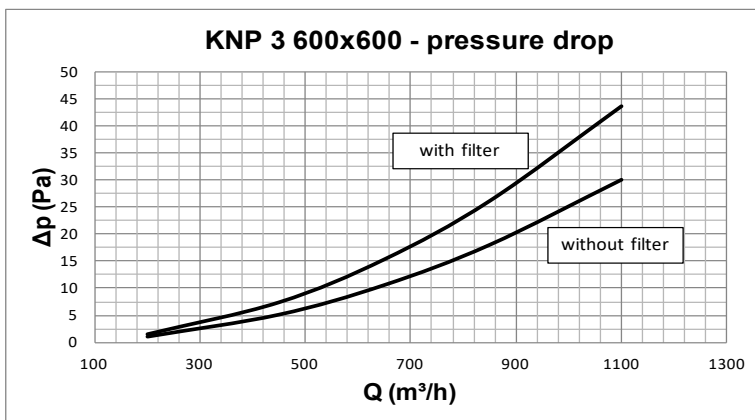


Acoustic data measured in reverberation room in accordance with international standard:

ISO 3741 1999: *Acoustic - determination of sound power levels of noise sources using sound pressure - Precision methods for reverberation rooms*

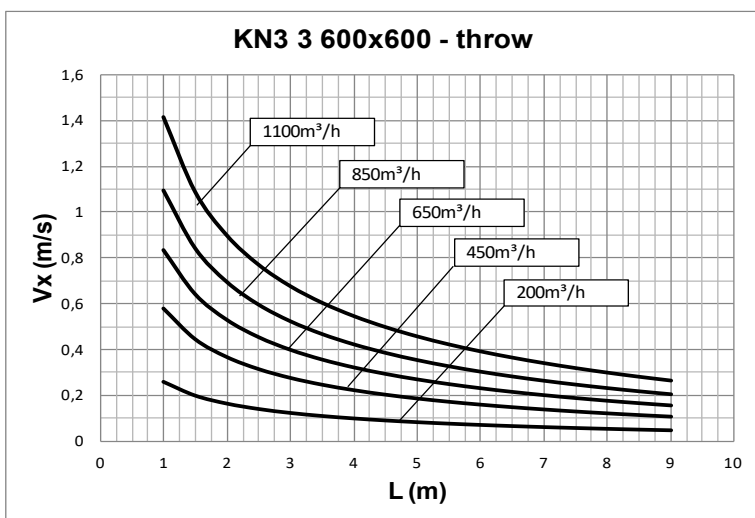
ISO 5135 1997: *Acoustic - determination of sound power levels of noise from air-terminal devices; air terminal units; dampers and valves by measurement in a reverberation room.*

The shown data does not take into consideration the attenuation resulting from the surroundings where the diffuser is installed. Such attenuation is normally included between 6 and 10 dBa and is determined by the size of the surrounding space, its shape and the characteristics of the furniture and room fittings.



Pressure loss measured in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*



Data measured working in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*

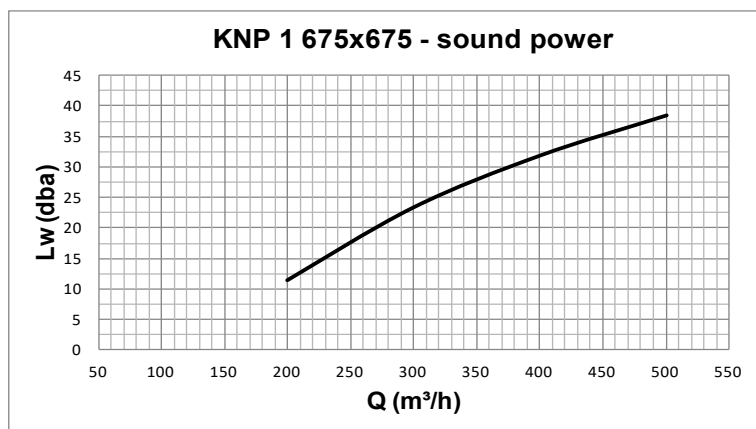
L (m) horizontal distance in metres from the centre of the diffuser
Vx (m/s) maximum speed inside the air stream



MULTIDIRECTIONAL DIFFUSER WITH CENTRAL PANEL

KNP
SERIES

KNP 675x675 ONE SLOT
TECHNICAL DATA

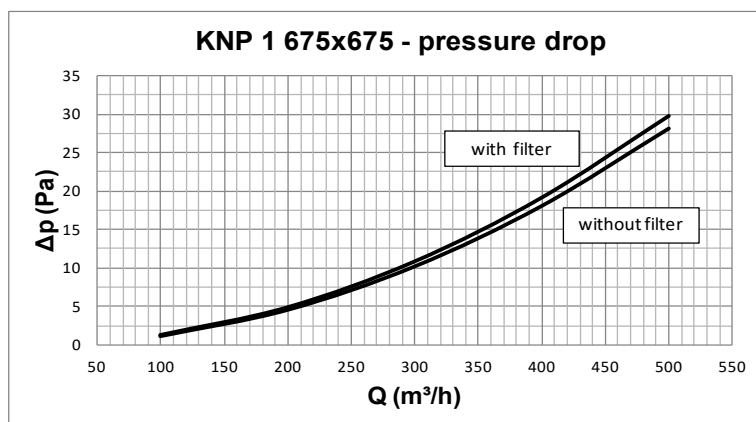


Acoustic data measured in reverberation room in accordance with international standard:

ISO 3741 1999: *Acoustic - determination of sound power levels of noise sources using sound pressure - Precision methods for reverberation rooms*

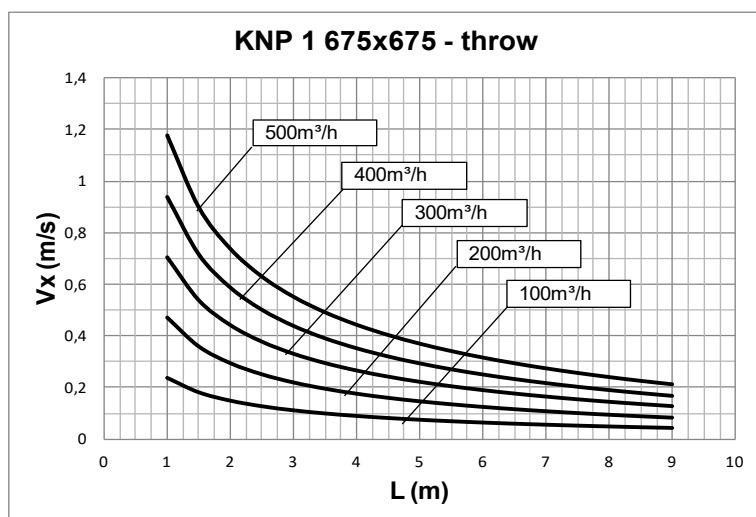
ISO 5135 1997: *Acoustic - determination of sound power levels of noise from air-terminal devices; air terminal units; dampers and valves by measurement in a reverberation room.*

The shown data does not take into consideration the attenuation resulting from the surroundings where the diffuser is installed. Such attenuation is normally included between 6 and 10 dBa and is determined by the size of the surrounding space, its shape and the characteristics of the furniture and room fittings.



Pressure loss measured in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*



Data measured working in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*

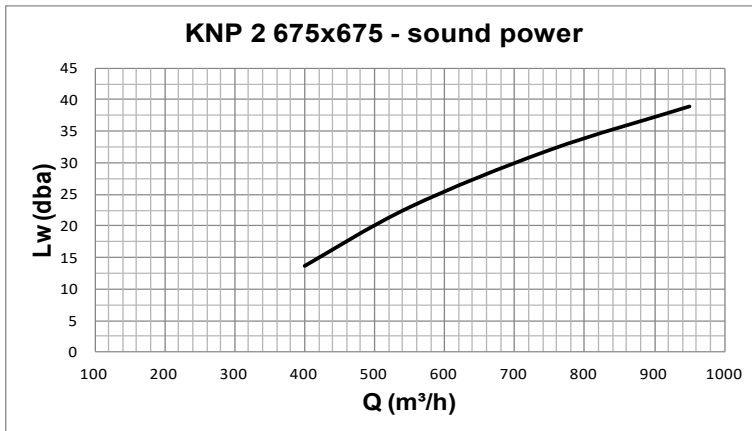
L (m) horizontal distance in metres from the centre of the diffuser
Vx (m/s) maximum speed inside the air stream



MULTIDIRECTIONAL DIFFUSER WITH CENTRAL PANEL

KNP
SERIES

KNP 675x675 TWO SLOTS TECHNICAL DATA

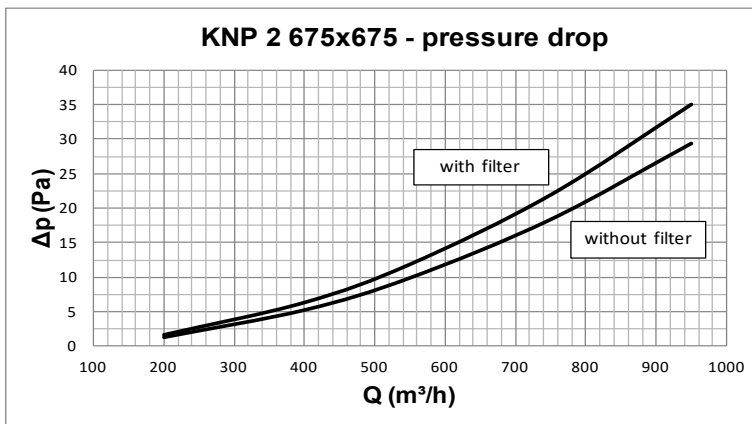


Acoustic data measured in reverberation room in accordance with international standard:

ISO 3741 1999: *Acoustic - determination of sound power levels of noise sources using sound pressure - Precision methods for reverberation rooms*

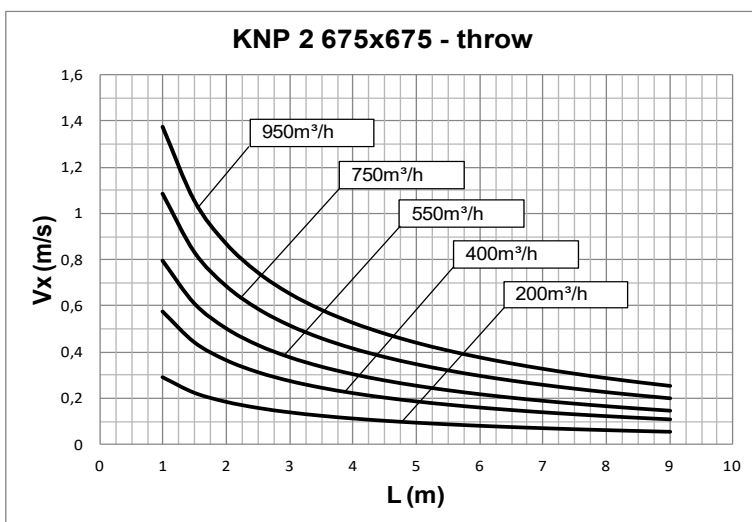
ISO 5135 1997: *Acoustic - determination of sound power levels of noise from air-terminal devices; air terminal units; dampers and valves by measurement in a reverberation room.*

The shown data does not take into consideration the attenuation resulting from the surroundings where the diffuser is installed. Such attenuation is normally included between 6 and 10 dBa and is determined by the size of the surrounding space, its shape and the characteristics of the furniture and room fittings.



Pressure loss measured in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*



Data measured working in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*

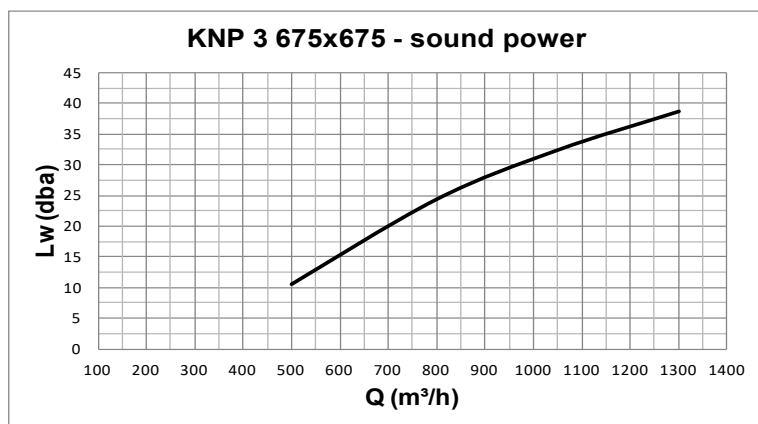
L (m) horizontal distance in metres from the centre of the diffuser
Vx (m/s) maximum speed inside the air stream



MULTIDIRECTIONAL DIFFUSER WITH CENTRAL PANEL

KNP
SERIES

KNP 675x675 THREE SLOTS
TECHNICAL DATA

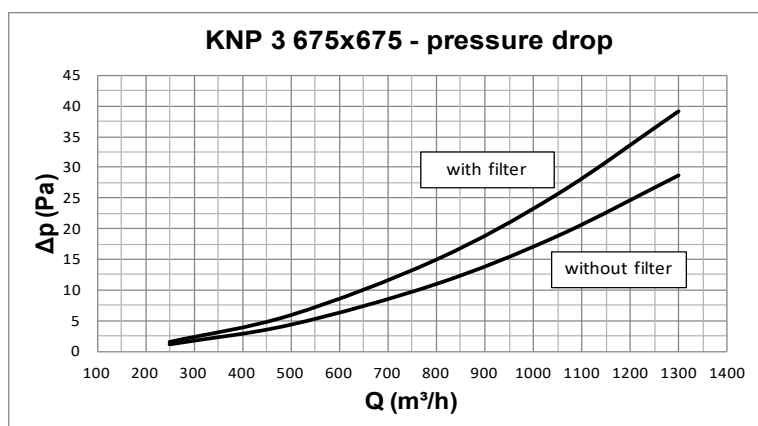


Acoustic data measured in reverberation room in accordance with international standard:

ISO 3741 1999: *Acoustic - determination of sound power levels of noise sources using sound pressure - Precision methods for reverberation rooms*

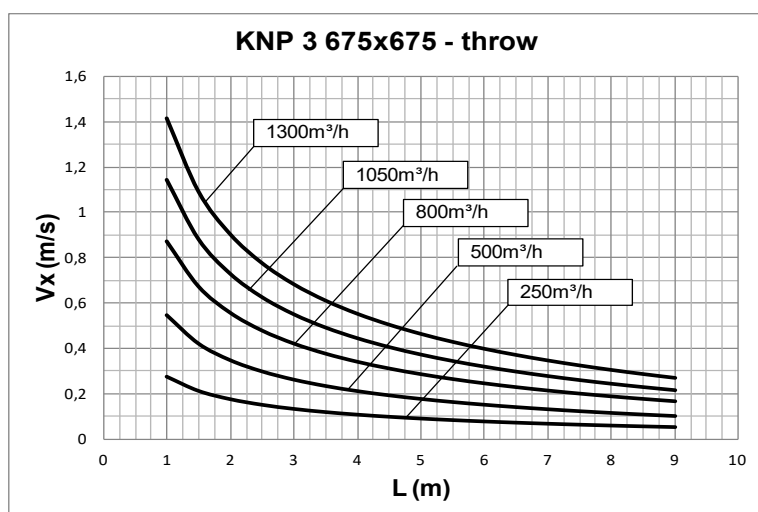
ISO 5135 1997: *Acoustic - determination of sound power levels of noise from air-terminal devices; air terminal units; dampers and valves by measurement in a reverberation room.*

The shown data does not take into consideration the attenuation resulting from the surroundings where the diffuser is installed. Such attenuation is normally included between 6 and 10 dBa and is determined by the size of the surrounding space, its shape and the characteristics of the furniture and room fittings.



Pressure loss measured in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*



Data measured working in isothermal conditions in accordance with international standard:

ISO 5219 1984: *Air distribution and air diffusion - Laboratory. Aerodynamic testing and rating of air terminal devices.*

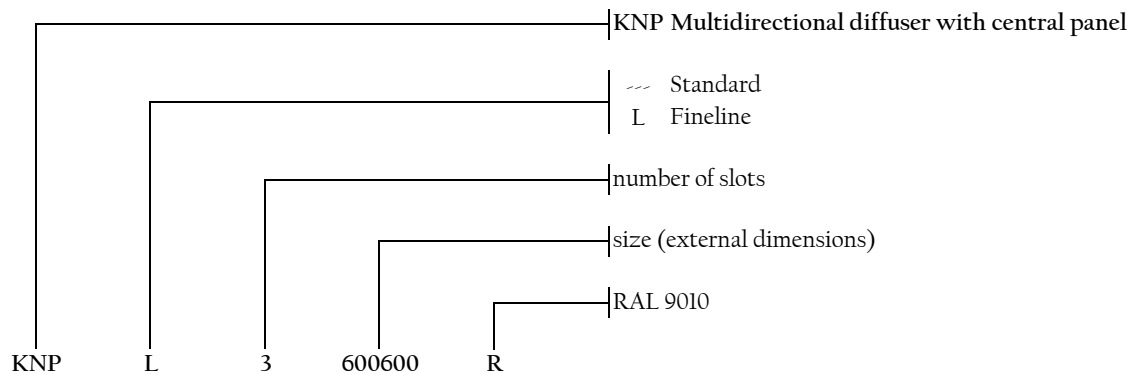
L (m) horizontal distance in metres from the centre of the diffuser
Vx (m/s) maximum speed inside the air stream



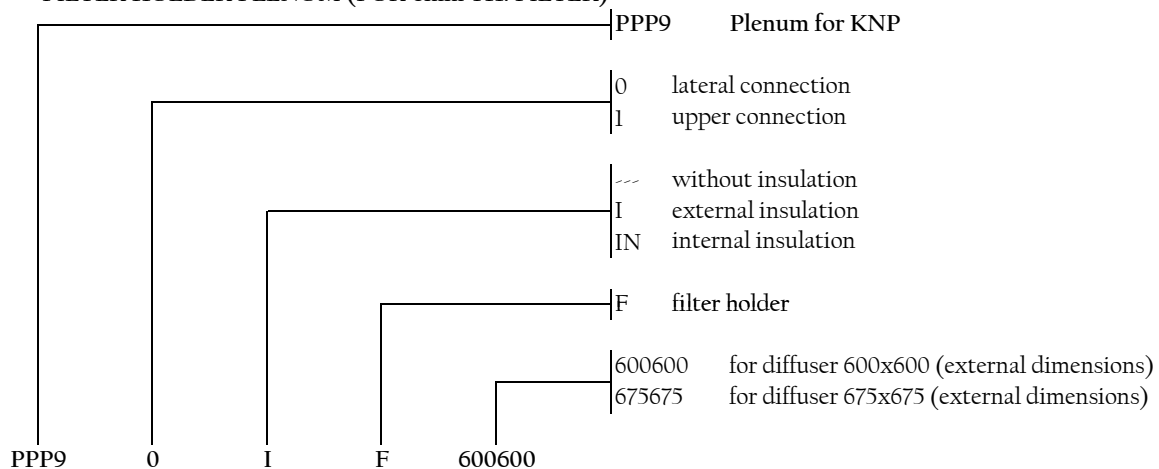
MULTIDIRECTIONAL DIFFUSER WITH CENTRAL PANEL

KNP
SERIES

HOW TO ORDER

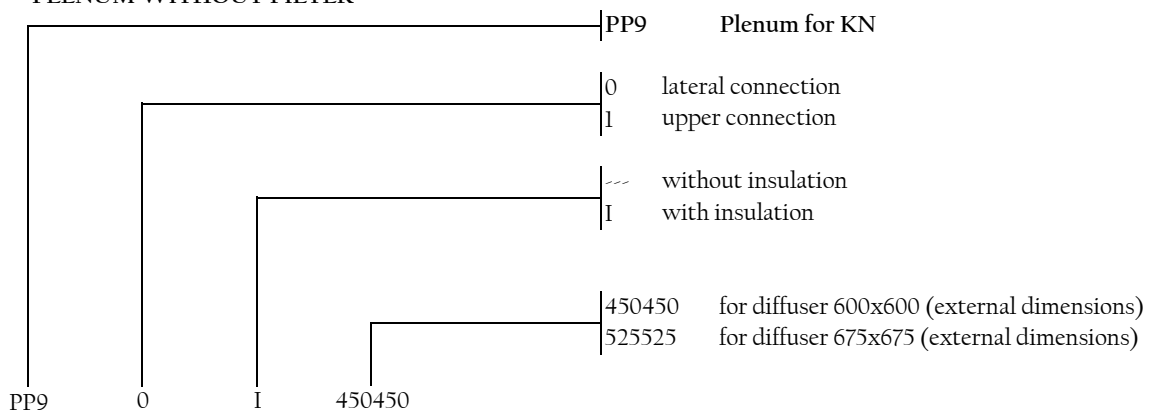


FILTER HOLDER PLENUM (FOR 6mm TH. FILTER)



| DIFFUSER | Filter holder plenum | Filter code (to order separately) |
|-----------|----------------------|--------------------------------------|
| 600 X 600 | PPP9 ... F600600 | FP6390470 |
| 675 X 675 | PPP9 ... F675675 | FP6465530 |

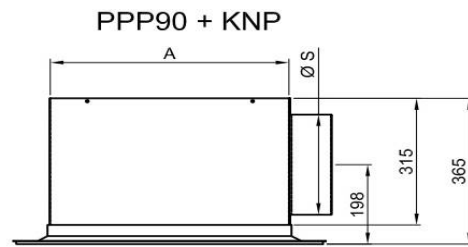
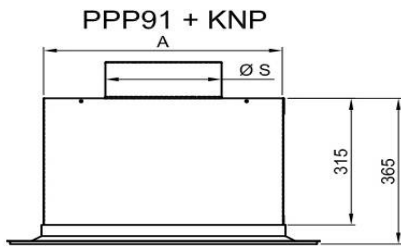
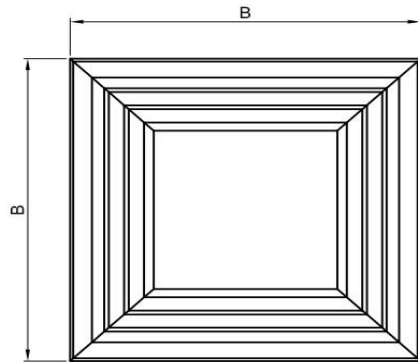
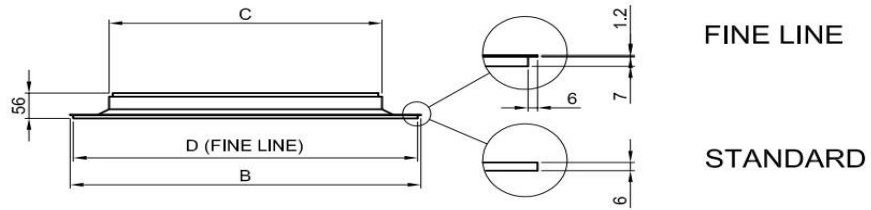
PLENUM WITHOUT FILTER





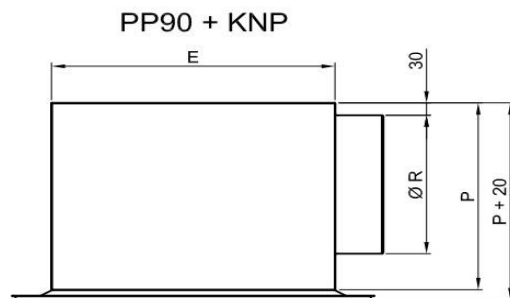
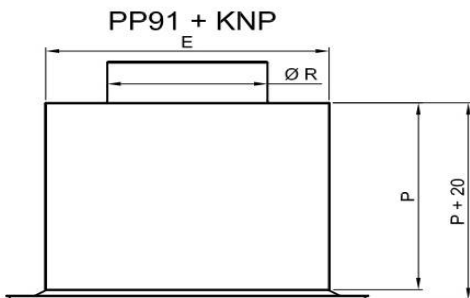
MULTIDIRECTIONAL DIFFUSER
WITH CENTRAL PANEL

KNP
SERIES



| DIFFUSER | Filter holder plenum | B [mm] | D* [mm] | C [mm] | A [mm] | ØS [mm] | Filter code (to order separately) |
|-----------|----------------------|--------|---------|--------|--------|---------|-----------------------------------|
| 600 X 600 | PPP9 ... F600600 | 595 | 583 | 448 | 438 | 250 | FP6390470 |
| 675 X 675 | PPP9 ... F675675 | 670 | 658 | 523 | 513 | 250 | FP6465530 |

* Only fineline version



| DIFFUSER | Plenum without filter | B [mm] | D* [mm] | C [mm] | E [mm] | P [mm] | ØR [mm] |
|-----------|-----------------------|--------|---------|--------|--------|--------|---------|
| 600 X 600 | PP9 ... 450450 | 595 | 583 | 448 | 450 | 350 | 250 |
| 675 X 675 | PP9 ... 525525 | 670 | 658 | 523 | 525 | 400 | 300 |

* Only fineline version

