DEC INTERNATIONAL TECHNICAL SPECIFICATIONS



CONNECTDEC Type AKUDEC

SEMI FLEXIBLE SOUND ATTENUARORS



The CONNECTDEC TYPE AKUDEC semi flexible sound attenuator consists of a heavy multiple layered corrugated perforated aluminium innerduct and provided with an aluminium/polyester laminated outer jacket. The space between the inner and outer duct is filled with 25mm sound absorbing material. The duct is standard fitted with galvanized metal sleeves at both ends to fit to any rigid ductwork or appliance instantly. Choice between: (Fit according to EN1506)

Type 2) Male - Female Type 3) Female - Female

Article code: $AKU(1,2,or3)\{\emptyset\}/Length\ e.g.\ AKU3100/1,0\ (type\ 3\ \emptyset100mm)$

THE SOLUTION to over bridge inaccuracy in measurements. Saves installation time and material

APPLICATIONS

- Can be combined immediately with our air valves (e.g. DAV or DVSC)
- Air supply systems
- Air conditioning systems
- Insertion loss damper
- Sound attenuator
- Decreasing sound of machines

SPECIFICATIONS

 $AKU(1,2,3){\emptyset}/L$ Article code:

Temperature range:

-30 °C to 250 °C Inner duct: -30 °C to 140 °C Outer jacket Operating pressure: up to +2000 Pa Operating air velocity: max. 10 m/s Min. bending radius: 1 x Ø + 25mm Standard diameter range: 80 - 315 mm Standard length: 0,5+1,0 mtr

CONSTRUCTION

Inner duct: Aluminium Barrier Nonwoven cloth Glass wool blanket: 25mm, 16kg/m3 Outer jacket: Alu/poly laminate R-value glass wool: 0.65 m² K/W

(ASTM C177-76)

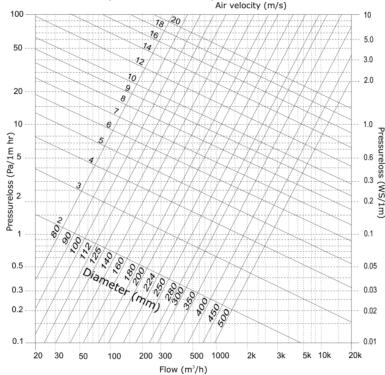
aluminium Appearance:

CLASSIFICATIONS

EU (EN 13501-1):

Innerduct: Α1 OuterJacket: B-s1,d0

PRESSURE LOSS (STRAIGHT DUCT)



The CONNECTDEC TYPE AKUDEC fulfills all the requirements and are classified as specified within EN 13180: Ventilation for buildings - Ductwork - Dimensions and mechanical requirements for flexible ducts.

The CONNECTDEC TYPE AKUDEC is also available, on request, with a 50 mm glass wool layer, the article number is: $AKU(1,2,3)5\{\emptyset\}$

R-value glass wool: 1.3 (50 mm) m² K/W (ASTM C177-76).

The information contained in this brochure was current on the publication date. DEC INTERNATIONAL reserves the right to make changes in details at any time without prior notice. In order to avoid misunderstandings, any interested party is advised to contact DEC INTERNATIONAL checking for any changes in materials and/or information after this brochure was published.

The consultant is responsible for the actual installation and of the product. The mentioned values with mounting respect to temperatures are not appropriate to be used to determine the physical properties. These properties are also dependent on humidity and the temperature of the air inside and outside of the H.V.A.C. system.

CONNECTDEC, AKUDEC, the DEC logo and DEC International are trademarks. or registered trademarks

Dutch Environment Corporation BV in the Netherlands and/or other

The CONNECTDEC ducts are not suitable for discharging combustion products from open fireplaces and oilfired boilers. Neither are the ducts suitable for transporting air with a high concentration of acid and base.

DEC INTERNATIONAL TECHNICAL SPECIFICATIONS



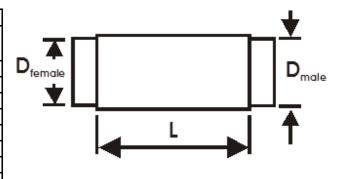
CONNECTDEC Type AKUDEC

SEMI FLEXIBLE SOUND ATTENUARORS

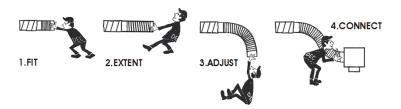


DIMENSIONS Metal sleeves

According to EN-1506										
D _{nom} (mm)	D _{female} (mm)	D _{male} (mm)	Tol.							
080	80.5	79.3	+0;-0.5							
100	100.5	99.3	+0;-0.5							
125	125.5	124.3	+0;-0.5							
150	150.6	149.3	+0;-0.6							
160	160.6	159.3	+0;-0.6							
200	200.7	199.3	+0;-0.7							
250	250.8	249.3	+0;-0.8							
315	315.9	314.3	+0;-0.9							



HOW TO INSTALL:



SOUND ATTENUATION

AKUDEC 25mm (Test report nr. A1672-1 Peutz by - The Netherlands)											
Dn	L	Attenuation, dB - Mid-frequency, Hz									
(mm)	(m)	63	125	250	500	1000	2000	4000	8000	(dB)	
080	0.5	11.2	13.3	24.1	29.7	27.2	33.4	32.9	23.5	30	
100	0.5	11.9	11.4	22.6	26.8	22.1	29.2	25.8	16.7	26	
125	0.5	6.3	7.1	15.2	19.9	20.3	26.1	17.1	12.9	22	
150	0.5	8.3	9.3	17.8	19.4	16.7	25	19.8	13.8	21	
160	0.5	10.2	11.3	21.5	17.9	15.5	22.6	15.7	12.1	19	
200	0.5	9.2	10	17.3	14.3	12.9	15.8	12	8.2	14	
250	0.5	10.2	9.8	14.6	11.7	10.8	14.3	8	7.1	12	
315	0.5	9.2	11.4	12	9.4	8.3	8	4.7	5.3	8	
Dn	L	Attenuation, dB - Mid-frequency, Hz								Di	
(mm)	(m)	63	125	250	500	1000	2000	4000	8000	(dB)	
080	1.0	13.8	20.2	39.3	38.6	36	41.8	52.4	40.2	39	
100	1.0	9.5	14.5	28.6	37.4	35.6	39.8	44.3	29.5	36	
125	1.0	12.4	20.1	33.6	29.8	29.5	33.6	32.1	23.6	32	
150	1.0	11.1	11.8	34.2	28.5	26.3	34.9	27.2	21.8	30	
160	1.0	14.6	19.1	31.1	27	24.7	32.5	24	18.7	29	
200	1.0	11.1	14.6	29.5	20.7	21	30	17.7	13.2	23	
250	1.0	14.2	21.7	23.1	18.9	18.4	25.7	11.4	10.1	20	
315	1.0	10.8	21.9	17.9	15.5	17.7	16.7	9.2	9.3	17	

 D_i = Average attenuation

LIABILITY:
The information contained in this brochure was current on the publication date. DEC INTERNATIONAL reserves the right to make changes in details at any time without prior notice. In order to avoid misunderstandings, any interested party is advised to contact DEC INTERNATIONAL checking for any changes in materials and/or information after this brochure was published.

PLEASE NOTICE:
The consultant is responsible for the actual installation and mounting of the product. The mentioned values with respect to temperatures are not appropriate to be used to determine the physical properties. These properties are also dependent on humidity and the temperature of the air inside and outside of the H.V.A.C. system.

TRADEMARKS:
CONNECTDEC, AKUDEC, the DEC logo and DEC International are trademarks, or registered trademarks

Dutch Environment Corporation BV in the Netherlands and/or other

RESTRICTIONS:
The CONNECTDEC ducts are not suitable for discharging combustion products from open fireplaces and oil-fired boilers. Neither are the ducts suitable for transporting air with a high concentration of acid and base.