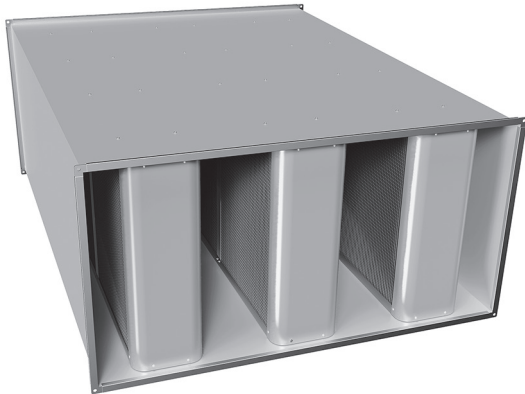


Rectangular straight attenuator TUNE-PS



Description

TUNE-PS is a conventional design with overall dimensions that do not exceed the duct connection dimensions. The attenuator is manufactured in standard duct sizes as detailed in the table below.

Design

Rectangular straight attenuator from the TUNE series. TUNE-PS is constructed using Lindab's TUNE-PA splitter. The attenuator is manufactured with a casing of galvanized sheet steel and stone wool absorption material covered by a plastic inter-liner and wire mesh to prevent the migration of fibres into the airstream and to protect the acoustic media from grease and oil in kitchen applications. The TUNE-PS is available with splitter widths 100 and 200 mm and is equipped with flange profile RJFP. To select the correct Tune-PS attenuator, please use our free selection IT-online tool LindQST or DIMsilencer, where splitter distance, length and height can be optimized for the best performance. Tested according to ISO 7235 standard.

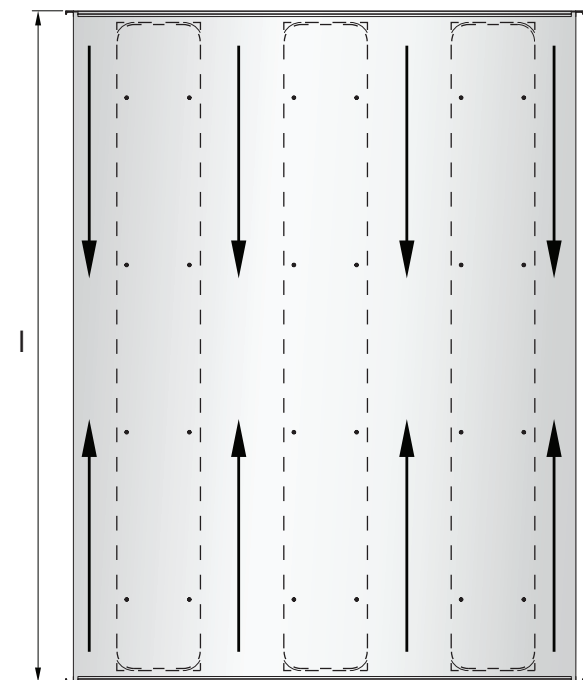
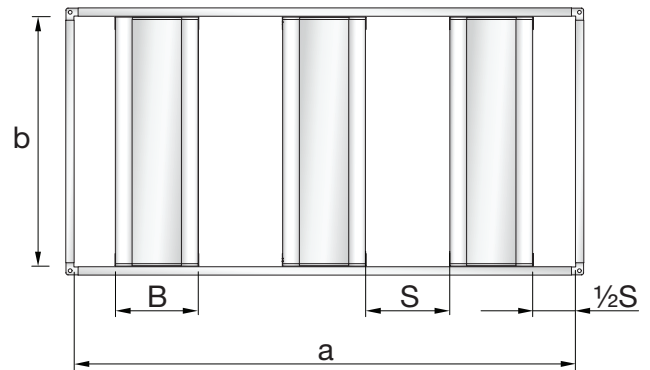
Order code

Product	Tune-PS	B	S	a	b	l	f
TUNE-PS							
Splitter width (B) in mm		100 or 200 mm					
Splitter distance (S) in mm			Calculate - see text				
Width (a) in mm				Min. - Max. 400 - 2400 mm			
Height (b) in mm					Min. - Max. 200 - 2400 mm		
Length (l) in mm						Min. - Max. 550 - 2550 mm	
Connection type							e.g. RJFP 20, 30 or 40

Example: TUNE- PS - 200 - 200 - 1200 - 900 - 1550 - RJFP30

The max. height can be increased by stacking two splitters on top of each other.

Dimensions TUNE-PS



$l - 50 = l_{\text{splitter}}$ (length of splitter).

b = Inner height of TUNE-PS.

The splitter height is $b - 5$ mm, to fit into duct. Standard lengths (l) : 550, 1050, 1550, 2050, 2550 mm. (Shown in tables on next page).

Standard heights (b) : 300, 600, 900, 1200 mm.

Special materials and sizes, please contact Lindab sales.

Other lengths and heights are available. See min. - max. dimensions in order code. Note that you can exceed the max. dimensions by combining several TUNE-PS attenuators.

Rectangular straight attenuator

TUNE-PS

Technical data

TUNE-PS attenuators

Splitter Width (B) = 100

Splitter distance (S) = 60 mm

Length Inom [mm]	Insertion loss [dB] for centre frequency [Hz]								Pressure value ξ
	63	125	250	500	1K	2K	4K	8K	
550	1	2	6	15	27	18	12	8	4,3
1050	3	5	14	26	54	31	20	14	5,4
1550	5	8	21	36	50	43	28	20	6,5
2050	6	10	28	46	50	50	36	26	7,6
2550	8	13	35	50	50	50	44	32	8,7

Splitter Width (B) = 100

Splitter distance (S) = 100 mm

Length Inom [mm]	Insertion loss [dB] for centre frequency [Hz]								Pressure value ξ
	63	125	250	500	1K	2K	4K	8K	
550	1	1	4	12	17	11	7	6	1,6
1050	2	3	9	20	50	19	12	9	2,1
1550	4	5	14	28	50	27	17	13	2,5
2050	5	6	19	35	50	35	22	17	2,9
2550	6	8	24	43	50	43	27	21	3,3

Splitter Width (B) = 100

Splitter distance (S) = 140 mm

Length Inom [mm]	Insertion loss [dB] for centre frequency [Hz]								Pressure value ξ
	63	125	250	500	1K	2K	4K	8K	
550	1	1	3	10	12	8	5	4	0,9
1050	2	2	7	17	25	14	9	7	1,1
1550	3	3	11	23	37	20	12	10	1,3
2050	4	5	15	30	50	26	16	13	1,5
2550	5	6	19	37	50	32	20	16	1,7

Splitter Width (B) = 200

Splitter distance (S) = 60 mm

Length Inom [mm]	Insertion loss [dB] for centre frequency [Hz]								Pressure value ξ
	63	125	250	500	1K	2K	4K	8K	
550	3	5	15	23	32	22	14	11	17,5
1050	4	11	27	44	50	38	22	15	20,3
1550	6	17	40	50	50	50	30	19	23,2
2050	8	22	50	50	50	50	38	23	26,1
2550	9	28	50	50	50	50	46	27	29,0

Splitter Width (B) = 200

Splitter distance (S) = 100 mm

Length Inom [mm]	Insertion loss [dB] for centre frequency [Hz]								Pressure value ξ
	63	125	250	500	1K	2K	4K	8K	
550	2	4	11	16	19	13	9	7	5,7
1050	3	8	19	31	40	22	13	9	6,6
1550	4	12	28	45	50	31	18	12	7,5
2050	6	16	36	50	50	40	23	15	8,5
2550	7	20	45	50	50	49	28	17	9,4

Splitter Width (B) = 200

Splitter distance (S) = 140 mm

Length Inom [mm]	Insertion loss [dB] for centre frequency [Hz]								Pressure value ξ
	63	125	250	500	1K	2K	4K	8K	
550	2	3	8	13	14	9	6	5	2,7
1050	3	7	15	24	29	15	10	7	3,2
1550	4	10	22	36	44	21	13	9	3,6
2050	5	13	29	47	50	28	16	11	4,0
2550	6	17	35	50	50	34	20	13	4,5

NB. Max. attenuation specified is 50 dB in the tables above.

The pressure loss Δp in Pa can be calculated from the pressure value ξ : $\Delta p = 0,6 \times v^2 \times \xi$, where (v) is the velocity on the face area of the attenuator.

Rectangular straight attenuator

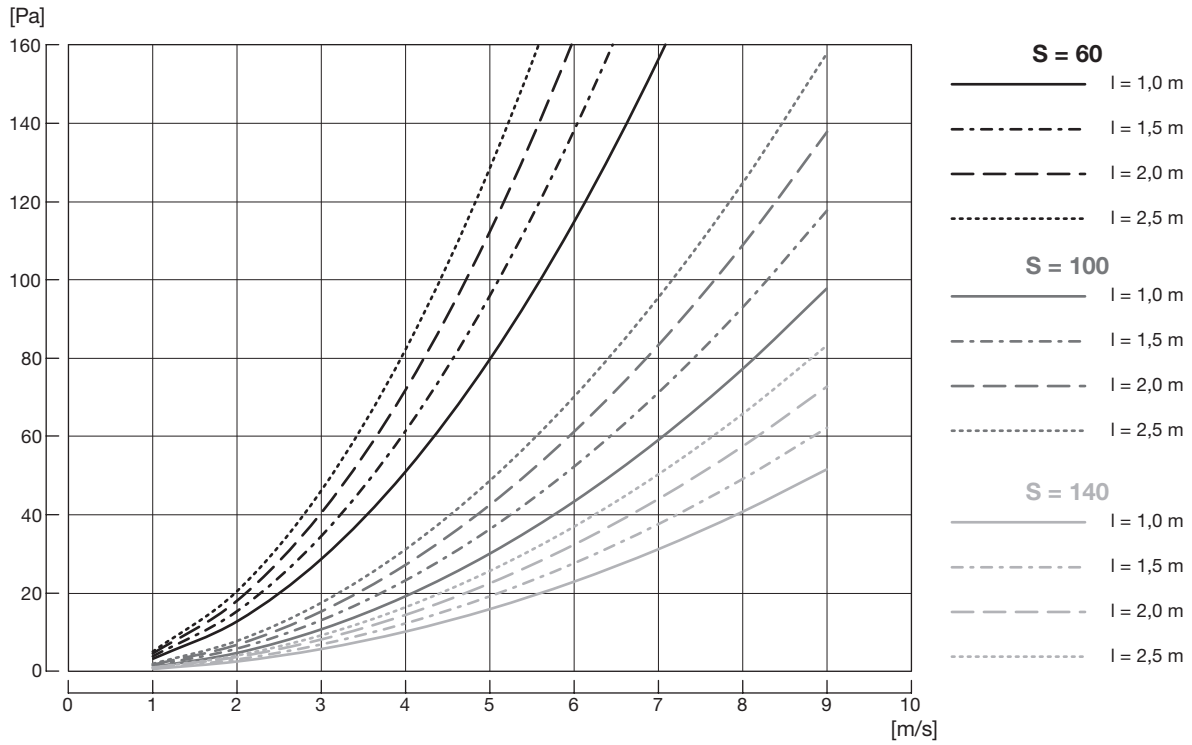
TUNE-PS

Technical data

Pressure loss

TUNE-PS with splitter width (B) = 100

(S) is distance between splitters.



TUNE-PS with splitter width (B) = 200

(S) is distance between splitters.

