

# CROSS TALK ATTENUATOR

## INTRODUCTION

Cross Talk Silencers are designed to maintain sound transmission ratings in low velocity air transfer between adjoining spaces. The acoustic baffles provide excellent attenuation of speech and unwanted noise while permitting fresh air to circulate continuously. Available for a variety of applications, including ducts, walls, ceilings, and doors.

The Cross talk attenuators are prefabricated sections of ductwork with acoustic lining. It is designed to avoid noise radiated from room or from a duct termination which is connected via a main duct, to a branch duct leading to another room. Airflow is permitted whilst noise transfer is limited.

COSMOS Cross talk attenuators are designed to supply continuous ventilation between adjacent spaces or rooms while maintaining sound transmission ratings of the common partition.



**Model: CTA-Z**



**Model: CTA-L**



**Model: CTA-U**

COSMOS cross talk attenuator models CTA-Z, CTA-L and CTA-U are used as air transfer attenuators between adjoining areas where as the acoustic integrity of a common partition or ceiling need to be maintained.

## CONSTRUCTION

Casings are manufactured from galvanized sheet metal 20 gauge. The acoustically engineered internal baffles are lined with open cell elastomeric nitrile foam rubber, fiber free, super silent and microban resistance and provide excellent noise reduction.

### **CTA-Z Cross Talk Attenuator**

COSMOS CTA-Z Cross Talk silencers are designed for low velocity transfer air applications through walls or doors. This low velocity configuration provides the highest insertion loss levels across the full range of frequencies.

### **CTA-L Cross Talk Attenuator**

COSMOS CTA-L Cross Talk silencers are designed for low velocity transfer air applications where multiple installations involve a common shaft. This low velocity configuration provides the highest insertion loss levels across the full range of frequencies.

### **CTA-U Cross Talk Attenuator**

COSMOS CTA-U Cross Talk silencers are designed for low velocity transfer air applications in false ceilings. This low velocity configuration provides the highest insertion loss levels across the full range of frequencies.

## FEATURES

- 20 gauge galvanized sheet metal casing construction.
- Acoustic lining has a glass tissue facing for erosion protection.  
As option - Open cell elastomeric nitrile foam rubber, fiber free, super silent and micro ban resistance material as acoustic media.
- Permits air transfer while attenuating unwanted noise.
- Provides privacy by minimizing speech transmission.
- Wide range of sizes and designs available to suit variety of applications.

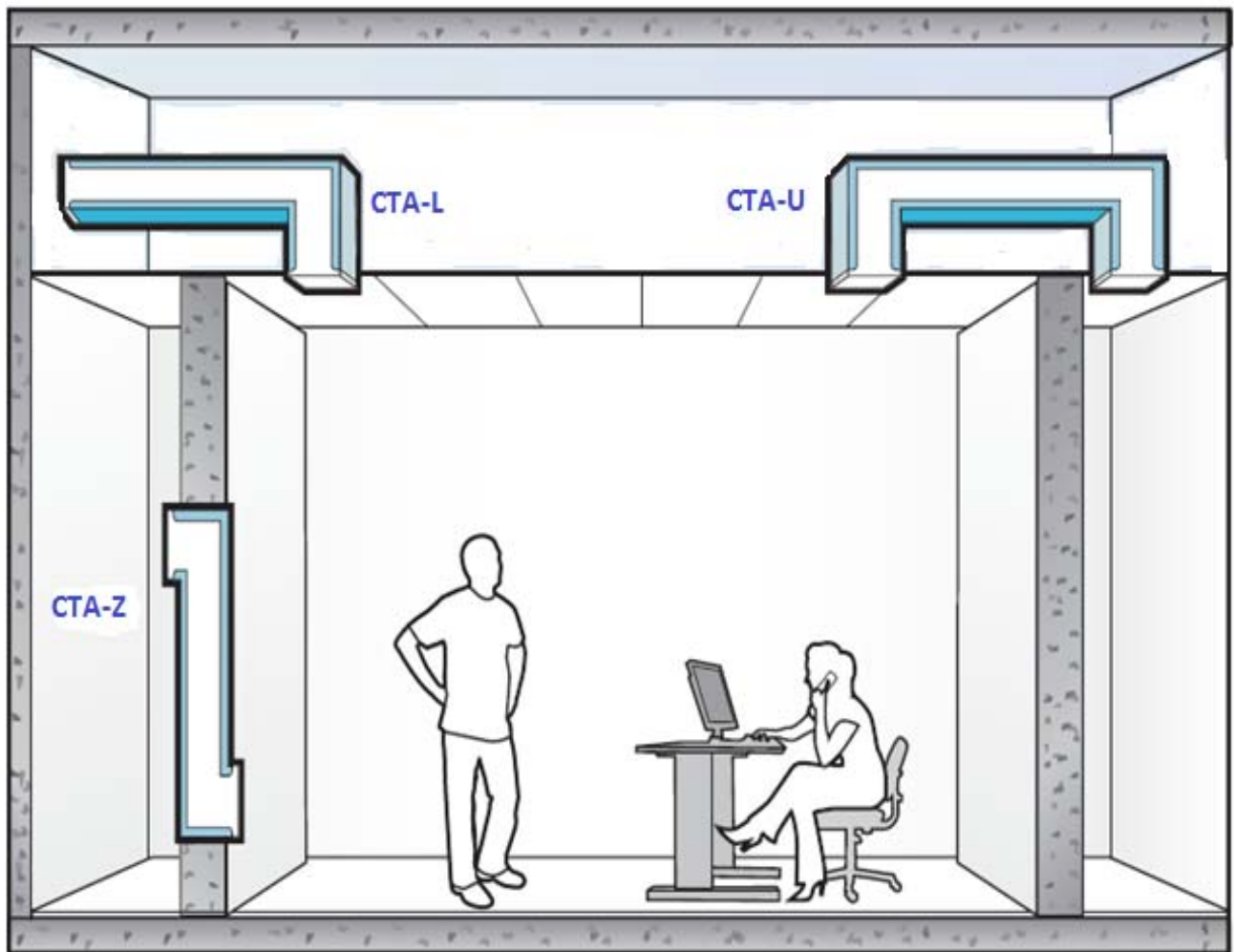
## APPLICATIONS

Provide continuous air ventilation and control of unwanted sound between adjacent spaces:

**CTA-L:** Reduce unwanted noise entering a space from a common plenum, shaft or corridor.

**CTA-Z:** Minimize sound transmission through a wall or door.

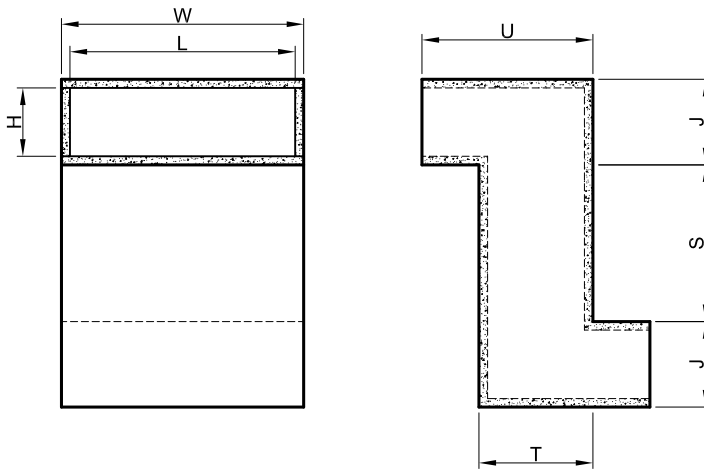
**CTA-U:** Prevent noise transfer between rooms through the false ceiling.



Dimensional data

CROSS TALK ATTENUATOR

Z type cross talk

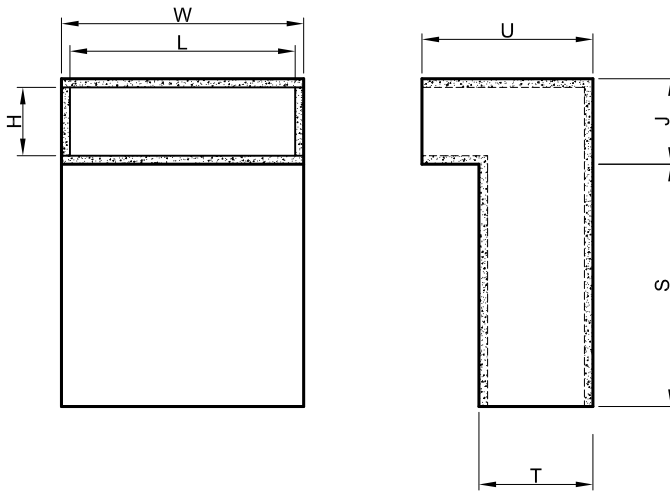


Standard Sizes

All dimensions are in mm

Unit Size	H	L	J	W	T	U	S
1	100	550	140	590	100	120	760
2	100	700	140	740	100	120	760
3	100	900	140	940	100	120	760
4	100	1000	140	1040	100	120	760
5	100	1200	140	1240	100	120	760

L type cross talk

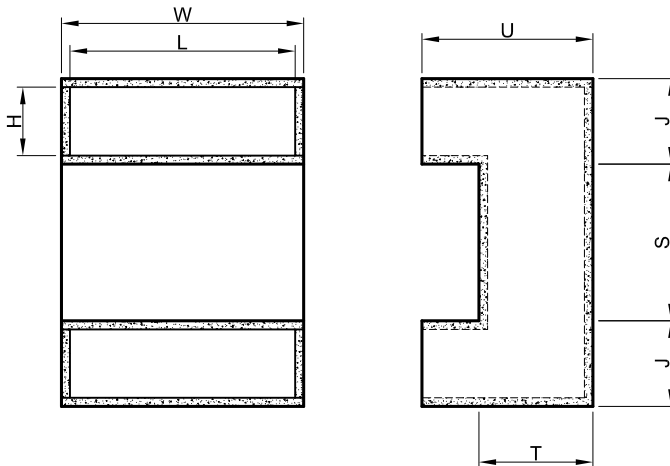


Standard Sizes

All dimensions are in mm

Unit Size	H	L	J	W	T	U	S
1	100	550	140	590	100	120	760
2	100	700	140	740	100	120	760
3	100	900	140	940	100	120	760
4	100	1000	140	1040	100	120	760
5	100	1200	140	1240	100	120	760

U type cross talk



Standard Sizes

All dimensions are in mm

Unit Size	H	L	J	W	T	U	S
1	100	550	140	590	100	120	760
2	100	700	140	740	100	120	760
3	100	900	140	940	100	120	760
4	100	1000	140	1040	100	120	760
5	100	1200	140	1240	100	120	760

Performance Data:

Air flow rate (l/s)	Cross Talk Attenuator Models													
	CTA-U1 / CTA-Z1		CTA-U2 / CTA-Z2 / CTA-L1		CTA-U3 / CTA-Z3 / CTA-L2		CTA-U4 / CTA-Z4		CTA-U5 / CTA-Z5 / CTA-L3		CTA-L4		CTA-L5	
	Pa	NC	Pa	NC	Pa	NC	Pa	NC	Pa	NC	Pa	NC	Pa	NC
20	3	<20	-	-	-	-	-	-	-	-	-	-	-	-
30	5	25	3	<20	-	-	-	-	-	-	-	-	-	-
40	8	27	5	25	3	<20	-	-	-	-	-	-	-	-
50	13	28	8	26	5	24	3	<20	-	-	-	-	-	-
60	18	29	10	27	6	25	5	24	3	<20	-	-	-	-
70	23	31	13	28	8	26	7	25	4	<20	4	<20	-	-
80	30	32	17	29	10	27	9	26	5	24	5	24	-	-
90	38	33	21	30	14	28	10	27	6	25	6	25	-	-
100	44	34	26	32	17	29	13	28	8	26	7	26	4	24
120	60	36	32	33	20	30	16	29	12	27	9	27	6	25
140	75	38	42	34	27	32	20	30	15	28	12	28	8	26
160	95	40	54	36	33	33	26	32	20	29	15	29	10	27
180	-	-	72	37	43	34	33	33	26	30	20	30	13	28
200	-	-	93	40	55	36	43	34	32	31	25	31	15	29
220	-	-	-	-	68	37	48	35	36	32	29	32	17	30
240	-	-	-	-	78	38	58	36	42	33	32	33	20	31
260	-	-	-	-	89	40	70	37	50	34	38	34	24	31
280	-	-	-	-	-	-	80	38	60	35	42	35	28	32
300	-	-	-	-	-	-	90	40	70	36	50	36	32	33
320	-	-	-	-	-	-	-	-	78	37	59	37	36	34
340	-	-	-	-	-	-	-	-	90	38	68	38	41	35
360	-	-	-	-	-	-	-	-	100	40	77	39	45	36
380	-	-	-	-	-	-	-	-	-	-	84	40	50	37
400	-	-	-	-	-	-	-	-	-	-	70	42	58	38
420	-	-	-	-	-	-	-	-	-	-	-	-	64	39
440	-	-	-	-	-	-	-	-	-	-	-	-	70	40
460	-	-	-	-	-	-	-	-	-	-	-	-	76	42
480	-	-	-	-	-	-	-	-	-	-	-	-	85	43
500	-	-	-	-	-	-	-	-	-	-	-	-	92	45

Insertion Loss Data, dB

Attenuator length L in mm	Octave Centre Band Frequency in Hz							
	63	125	250	500	1000	2000	4000	8000
500	5	7	10	15	23	17	13	11
750	6	9	14	23	37	29	22	16
1000	8	11	19	31	48	37	28	21
1250	9	14	23	38	50	44	32	26
1500	10	16	27	45	50	50	39	31