

Cross-talk silencers replace lined transfer elbows at a lower cost and improved performance.

**PROBLEM: Acoustical duct lining**

Lined transfer ducts are costly and do not have performance ratings.

**SOLUTION: Cross-talk silencers**

Vibro-Acoustics submitted acoustic performance for a variety of silencer sizes. These sizes were selected to pass the air quantities specified without excessive pressure drops. All pressure drops selected were less than 0.05 inches.

A table of cost comparisons revealed that the cross-talk silencers were approximately half the price of sheet metal elbows plus lining. The acoustic performance was doubled in the lower and mid-frequency range and equal in the higher. As a result the substitution was successfully completed.

ACOUSTICALLY LINED TRANSFER ELBOW LEGEND		
<b>A</b>	12" X 12"	0 - 500 CFM
<b>B</b>	26" X 12"	500 - 1000 CFM
<b>C</b>	18" X 16"	
<b>D</b>	40" X 12"	1000 - 1500 CFM
<b>E</b>	28" X 16"	
<b>F</b>	22" X 20"	
<b>G</b>	48" X 16"	1500 - 2500 CFM
<b>H</b>	40" X 20"	
<b>I</b>	32" X 24"	

The above sizes were specified for the airflow quantities listed. Locations were noted on the drawings. Lengths were to be determined from the drawing below.

