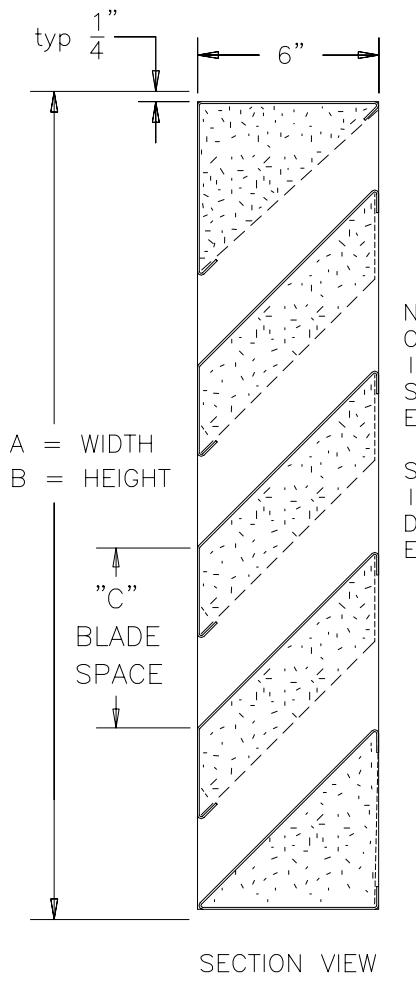


# FABRICATED ALUMINUM, 6" DEEP, HEAVY GAUGE, ACOUSTICAL FIXED TYPE BLADE



## MODEL ACL-66 STANDARD SPECIFICATIONS

FRAME: 6" DEEP, 12 GAUGE ALUMINUM.

BLADES: 16 GAUGE ALUMINUM (NON NOISE SIDE).  
20 GAUGE PERFORATED ALUMINUM (NOISE SIDE)

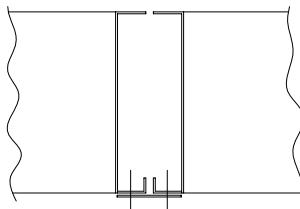
INSULATION: WATER RESISTANT SOUND ABSORBING MATERIAL

FINISH: MILL.

SCREEN: 1/2" REMOVABLE EXPANDED ALUMINUM BIRD SCREEN, LOCATED ON INTERIOR (NOISE SIDE).

MAXIMUM PANEL SIZE: 72" X 96".  
MINIMUM PANEL SIZE: 12" X 15".

DIMENSIONS: "A" (WIDTH) AND "B" (HEIGHT) ARE OPENING SIZES. LOUVERS ARE MADE 1/2" UNDERSIZE.



MODEL No.	"C" BLADE SPACE
ACL-66	6"

## STANDARD VERTICAL MULLION

### LOUVER MODEL No. DESCRIPTION

ACL - 6 6  
 LOUVER ACOUSTICAL ALUMINUM FRAME DEPTH BLADE SPACING

### STC CLASS 12

OCTAVE BAND	1	2	3	4	5	6	7	8
FREQUENCY (Hz)	63	125	250	500	1K	2K	4K	8K
TRANSMISSION LOSS (db)	1	6	6	9	13	15	14	14
FREE FIELD NOISE REDUCTION (db)	7	12	12	15	19	21	20	20

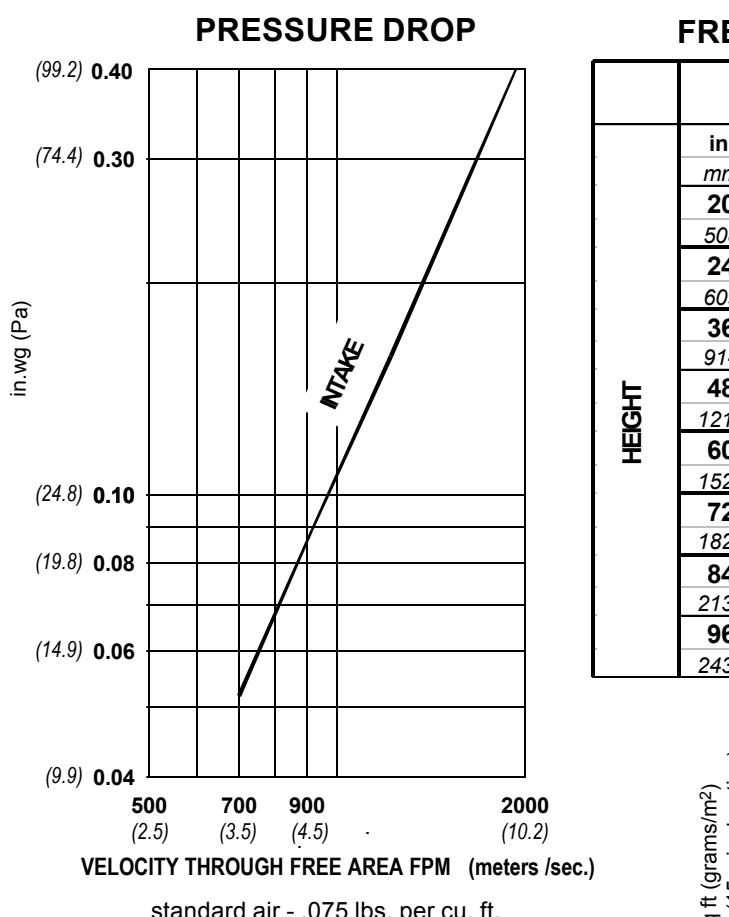


**LOUVERS & DAMPERS**  
A MESTEK COMPANY

7435 INDUSTRIAL ROAD FLORENCE, KY  
Phone (859) 647-2299 Fax (859) 647-7810

ACL-66 ACOUSTICAL LOUVER	DRN. BY ESS	DWG. NO.	REV.
	DATE 10-04-06	ACL-66	

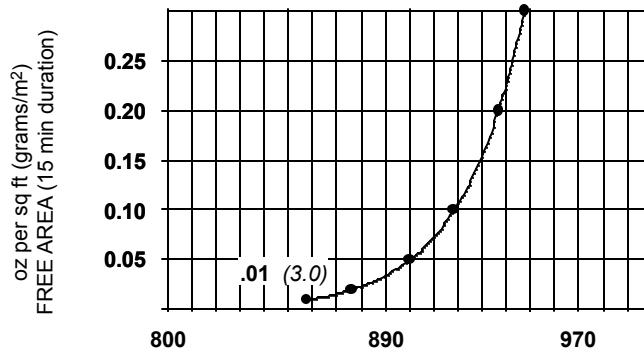
**Pressure Drop : .076 in. wg. (18.8 Pa.) at 858 fpm (4.36 m/s) and 3460 SCFM (1.63 scm/s)**  
**Free Area**



This product was tested in accordance with AMCA Standard 500L.

**FREE AREA IN SQUARE FEET (sq. meters)**

HEIGHT		WIDTH								
		in. mm	12 304	24 609	30 762	36 914	42 1066	48 1219	54 1371	60 1524
20	<b>0.26</b>	<b>0.58</b>	<b>0.74</b>	<b>0.89</b>	<b>1.05</b>	<b>1.21</b>	<b>1.37</b>	<b>1.52</b>		
508	0.02	0.05	0.07	0.08	0.10	0.11	0.13	0.14		
24	<b>0.39</b>	<b>0.87</b>	<b>1.10</b>	<b>1.34</b>	<b>1.58</b>	<b>1.81</b>	<b>2.05</b>	<b>2.29</b>		
609	0.04	0.08	0.10	0.12	0.15	0.17	0.19	0.21		
36	<b>0.66</b>	<b>1.45</b>	<b>1.84</b>	<b>2.23</b>	<b>2.63</b>	<b>3.02</b>	<b>3.42</b>	<b>3.81</b>		
914	0.06	0.13	0.17	0.21	0.24	0.28	0.32	0.35		
48	<b>0.92</b>	<b>2.02</b>	<b>2.58</b>	<b>3.13</b>	<b>3.68</b>	<b>4.23</b>	<b>4.78</b>	<b>5.34</b>		
1219	0.09	0.19	0.24	0.29	0.34	0.39	0.44	0.50		
60	<b>1.18</b>	<b>2.60</b>	<b>3.31</b>	<b>4.02</b>	<b>4.73</b>	<b>5.44</b>	<b>6.15</b>	<b>6.86</b>		
1524	0.11	0.24	0.31	0.37	0.44	0.51	0.57	0.64		
72	<b>1.45</b>	<b>3.18</b>	<b>4.05</b>	<b>4.92</b>	<b>5.78</b>	<b>6.65</b>	<b>7.52</b>	<b>8.39</b>		
1828	0.13	0.30	0.38	0.46	0.54	0.62	0.70	0.78		
84	<b>1.71</b>	<b>3.76</b>	<b>4.78</b>	<b>5.81</b>	<b>6.84</b>	<b>7.86</b>	<b>8.89</b>	<b>9.91</b>		
2133	0.16	0.35	0.44	0.54	0.64	0.73	0.83	0.92		
96	<b>1.97</b>	<b>4.34</b>	<b>5.52</b>	<b>6.70</b>	<b>7.89</b>	<b>9.07</b>	<b>10.25</b>	<b>11.44</b>		
2438	0.18	0.40	0.51	0.62	0.73	0.84	0.95	1.06		



Both maximum recommended free area velocity and beginning of water penetration are **858 fpm** at standard air - **.075 lbs. per cu. ft.**

The above water penetration data is based on mill finish, 48" x 48" test size per AMCA Standard 511.

Openings that require multiple louver panels in both width and height will require internal structural supports. It is recommended that large openings be divided with structural members so that the louvers will span either width or height with a single panel. Unusually high wind loading may require structural supports on non-multiple wide and multiple high assemblies. **Structural supports and mounting accessories are not supplied as a standard.**

Example: Given 5,000 CFM design flow

**Step #1:**

$$\text{min. free area} = \frac{\text{Design CFM}}{\text{Max. Recommended Velocity}}$$

$$= \frac{5,000}{858} = 5.83 \text{ sq. ft.}$$

**Step #2:** From the free area table above the approximate louver size is **54" x 60" = (6.15 sq. ft.)**

**Below is an explanation of how to use the performance data for the recommended free area velocity of 858 (4.36 m/s).**

To determine minimum free area required for louver:

**Step #1:** Divide the required CFM flow by the maximum recommended free area velocity.

**Step #2:** Select the most desirable louver size, from the free area table, that meets the minimum free area requirement.

**Step #3:** Compare specified performance to the certified water penetration and pressure drop ratings.