

### AHRI CERTIFIED PERFORMANCE DATA

INLET SIZE	RATED CFM	MIN $\Delta$ Ps	DISCHARGE DATA					
			SOUND POWER @ 1.5" $\Delta$ Ps					
			2	3	4	5	6	7
4	150	0.100	69	64	55	51	49	44
5	250	0.100	71	69	62	54	50	47
6	400	0.100	71	70	62	54	50	47
7	550	0.100	73	72	61	56	53	52
8	700	0.100	74	71	62	58	54	51
9	900	0.100	71	68	61	57	54	52
10	1100	0.100	71	68	63	59	57	54
12	1600	0.100	74	68	64	61	59	57
14	2100	0.100	74	68	63	61	59	57

INLET SIZE	RATED CFM	MIN $\Delta$ Ps	RADIATED DATA					
			SOUND POWER @ 1.5" $\Delta$ Ps					
			2	3	4	5	6	7
4	150	0.100	56	49	42	40	37	33
5	250	0.100	59	52	44	39	35	31
6	400	0.100	60	58	50	40	36	33
7	550	0.100	60	57	51	43	39	35
8	700	0.100	62	59	49	43	38	38
9	900	0.100	60	56	50	42	39	35
10	1100	0.100	58	54	50	43	38	32
12	1600	0.100	64	58	51	46	42	36
14	2100	0.100	60	56	47	44	41	36

NOTES: All sound data is based on tests conducted in accordance with AHRI 880-11.  $\Delta$ Ps is the difference in static pressure from inlet to discharge. Sound power levels are in dB, re  $10^{-12}$  Watts. Discharge sound power is the sound emitted from the unit discharge. Radiated sound power is the sound transmitted through the casing walls. Discharge sound power has been corrected for end reflection. NC application data is from AHRI Standard 885-08 Appendix E, as a function of flow rate shown. See Krueger's selection program for specific sound data for optional liners; 1/2", dual density liner shown. See Engineering section for reductions and definitions. AHRI certification points are shown in bold, white font in the sound performance data found on page A2-35 and A2-36.



### UNIT CAPACITIES

#### SELECTION EXAMPLE - BASED ON CFM CRITERIA

A zone exists requiring VAV control. The maximum flow is to be 500 CFM; the minimum is to be 175 CFM, based on heat requirements. Use the table to the right to select a size 6. Note that size 7 will also be capable of controlling the required amount.

#### AIRFLOW CAPACITY DETAILS

1. CFM ranges are factory set on all pressure independent pneumatic control sequences.
2. Factory set minimum CFMs are based on the controller's ability to accurately maintain flow setting. Factory will not set controls outside the ranges indicated.
3. Minimum CFM settings can be set at 0 CFM; however, ventilation requirements can be met by setting a minimum greater than zero. Krueger recommends a minimum setpoint equal to 25% of the nominal flow rating of the terminal.
4. Pressure dependent pneumatic or electric controls do not have the ability to control CFM settings. Therefore, the minimum setting is always zero. A set maximum flow rate is not possible.
5. The ASHRAE handbook of fundamentals states that discharge temperatures in excess of 90°F are likely to result in objectionable air temperature stratification in the space. Also, ventilation short circuiting may occur. ASHRAE Standard 62.1 limits discharge temperatures to 90°F or increasing the ventilation rate when heating from the ceiling.

INLET SIZE	MAX PRIMARY AIRFLOW - CFM	MIN AIRFLOW - CFM
		STANDARD*
4	230	40
5	360	62
6	515	89
7	700	121
8	920	159
9	1160	201
10	1430	248
12	2060	357
14	2800	486

\* The Standard Minimum CFM value is based on a signal of 0.03" WG differential pressure of the inlet sensor. Minimum CFM may be 0. The inlet sensor is capable of reading a signal down to .01" WG. To operate unit below the Standard Minimum CFM values listed, DDC Controller must be capable to accurately read below 0.03" WG.

### DISCHARGE SOUND PERFORMANCE DATA

INLET SIZE	FLOW RATE		MIN Δ Ps		0.75" Δ Ps							1.5" Δ Ps							2.5" Δ Ps						
					OCTAVE BAND SOUND POWER, Lw							Lp	OCTAVE BAND SOUND POWER, Lw							Lp	OCTAVE BAND SOUND POWER, Lw				
	CFM	(L/s)	"WG	(Pa)	2	3	4	5	6	7	NC	2	3	4	5	6	7	NC	2	3	4	5	6	7	NC
4	50	(24)	0.011	(2.76)	53	41	35	34	29	25	-	54	42	39	38	33	31	-	55	43	42	41	36	35	-
	110	(52)	0.054	(13.37)	63	56	47	43	40	34	-	64	58	51	47	44	40	<b>20</b>	65	59	53	50	47	44	<b>21</b>
	150	(71)	0.100	(24.88)	68	62	52	47	45	38	<b>24</b>	69	64	55	51	49	44	<b>26</b>	69	65	58	54	51	48	<b>27</b>
	230	(109)	0.235	(58.51)	73	71	58	52	51	43	<b>32</b>	74	72	62	56	55	49	<b>33</b>	75	73	64	59	57	53	<b>34</b>
5	60	(28)	0.006	(1.43)	49	41	39	31	30	25	-	52	44	44	35	35	31	-	55	47	47	38	38	35	-
	140	(66)	0.031	(7.80)	60	55	50	43	39	34	-	63	59	55	47	44	40	-	66	61	58	50	48	45	<b>22</b>
	250	(118)	0.100	(24.88)	67	66	58	50	46	41	<b>25</b>	71	69	62	54	50	47	<b>29</b>	73	72	66	57	54	51	<b>32</b>
6	360	(170)	0.207	(51.60)	72	72	63	55	50	45	<b>31</b>	76	75	67	59	55	51	<b>35</b>	78	78	70	62	58	55	<b>38</b>
	100	(47)	0.006	(1.56)	51	47	35	31	33	29	-	55	52	40	35	38	36	-	57	56	44	39	42	41	-
	250	(118)	0.039	(9.72)	62	59	49	44	41	36	-	66	64	54	48	46	43	<b>23</b>	68	68	58	51	50	48	<b>28</b>
	400	(189)	0.100	(24.88)	68	65	56	50	45	40	<b>23</b>	71	70	62	54	50	47	<b>29</b>	74	74	66	57	54	52	<b>33</b>
7	520	(245)	0.169	(42.05)	71	68	60	54	47	43	<b>27</b>	74	73	66	58	53	50	<b>33</b>	77	77	70	61	57	55	<b>37</b>
	120	(57)	0.005	(1.18)	56	54	33	28	32	32	-	60	60	39	32	38	40	-	63	65	43	34	43	45	<b>25</b>
	330	(156)	0.036	(8.96)	65	61	48	44	42	41	-	69	68	54	48	48	48	<b>27</b>	72	73	58	50	52	54	<b>32</b>
	550	(260)	0.100	(24.88)	69	65	56	53	47	45	<b>23</b>	73	72	61	56	53	52	<b>31</b>	76	76	66	59	57	58	<b>37</b>
8	700	(330)	0.162	(40.31)	71	67	59	57	49	47	<b>24</b>	75	73	65	60	55	54	<b>32</b>	78	78	69	62	59	60	<b>38</b>
	160	(76)	0.005	(1.30)	57	51	42	34	37	33	-	60	57	48	39	42	40	-	62	61	53	42	47	45	-
	440	(208)	0.040	(9.83)	66	61	52	47	45	41	-	69	67	58	52	51	48	<b>25</b>	72	71	62	55	55	53	<b>30</b>
	700	(330)	0.100	(24.88)	70	66	56	53	49	44	<b>24</b>	74	71	62	58	54	51	<b>31</b>	76	76	67	61	58	56	<b>36</b>
9	920	(434)	0.173	(42.98)	73	68	59	56	51	46	<b>26</b>	76	74	65	61	57	53	<b>33</b>	78	78	69	64	61	58	<b>38</b>
	200	(94)	0.005	(1.23)	50	46	35	32	35	35	-	53	51	39	36	40	42	-	55	54	43	39	44	46	-
	550	(260)	0.037	(9.29)	62	57	49	46	44	42	-	65	62	54	50	50	48	-	67	66	57	53	53	53	<b>24</b>
10	900	(425)	0.100	(24.88)	68	63	56	53	49	46	-	71	68	61	57	54	52	<b>25</b>	73	71	64	59	58	56	<b>30</b>
	1160	(547)	0.166	(41.34)	72	66	60	56	52	47	<b>23</b>	74	71	65	60	57	53	<b>29</b>	76	74	68	63	60	58	<b>33</b>
	250	(118)	0.005	(1.29)	50	48	40	38	39	37	-	53	53	45	42	45	43	-	55	57	48	45	49	48	-
	700	(330)	0.040	(10.08)	62	58	52	49	48	45	-	65	63	57	54	53	51	<b>21</b>	68	67	61	57	57	55	<b>26</b>
12	1450	(684)	0.174	(43.24)	71	66	61	58	53	50	<b>23</b>	74	71	66	62	59	56	<b>29</b>	77	74	70	65	63	61	<b>33</b>
	400	(189)	0.006	(1.56)	52	47	39	42	42	42	-	56	52	43	46	47	48	-	58	56	46	50	50	52	-
	1000	(472)	0.039	(9.72)	64	58	53	52	50	48	-	68	63	57	56	55	54	-	70	67	60	60	58	58	<b>24</b>
	1600	(755)	0.100	(24.88)	71	63	60	57	54	51	<b>22</b>	74	68	64	61	59	57	<b>26</b>	77	72	67	65	62	61	<b>30</b>
14	2060	(972)	0.166	(41.25)	74	66	63	59	56	52	<b>26</b>	78	71	68	64	61	58	<b>30</b>	80	75	71	67	64	63	<b>34</b>
	480	(227)	0.005	(1.30)	47	44	33	39	38	40	-	50	48	37	43	42	46	-	52	52	39	46	45	50	-
	1375	(649)	0.043	(10.67)	64	58	53	52	50	48	-	67	62	56	56	54	54	-	69	65	58	59	57	58	<b>22</b>
	2100	(991)	0.100	(24.88)	71	63	60	58	55	52	<b>22</b>	74	68	63	61	59	57	<b>26</b>	76	71	66	64	62	62	<b>29</b>
2800	(1321)	0.178	(44.24)	75	67	66	61	58	54	<b>28</b>	78	71	69	65	62	60	<b>32</b>	81	75	71	68	65	64	<b>35</b>	

NOTES: Discharge sound power is the sound emitted from the unit discharge. All sound data is based on tests conducted in accordance with AHRI 880-11 and corrected for end reflection. Sound power levels are in dB, re 10<sup>-12</sup> Watts. ΔPs is the difference in static pressure from inlet to discharge. NC application data is from AHRI Standard 885-08 Appendix E, as a function of flow rate shown. AHRI certification points are shown in bold, white font. For a complete list of AHRI certified data, see page A2-4. All other data points listed are application ratings outside the scope of the Certification Program. See Krueger's selection program for specific sound data for optional liners; 1/2", dual density liner shown. Dash indicates a NC is less than 20. See Engineering section for reductions and definitions.

### RADIATED SOUND PERFORMANCE DATA

INLET SIZE	FLOW RATE		MIN ΔPs		0.75" ΔPs								1.5" ΔPs								2.5" ΔPs							
					OCTAVE BAND SOUND POWER, Lw							Lp	OCTAVE BAND SOUND POWER, Lw							Lp	OCTAVE BAND SOUND POWER, Lw							Lp
	CFM	(L/s)	"WG	(Pa)	2	3	4	5	6	7	NC	2	3	4	5	6	7	NC	2	3	4	5	6	7	NC			
4	50	(24)	0.011	(2.76)	37	28	24	23	17	10	-	38	29	27	25	19	15	-	38	30	30	27	21	18	-			
	110	(52)	0.054	(13.37)	50	42	34	33	30	23	-	51	43	38	35	32	28	-	51	45	40	37	34	31	-			
	150	(71)	0.100	(24.88)	55	47	39	37	35	29	-	56	49	42	40	37	33	-	56	50	45	41	39	37	-			
	230	(109)	0.235	(58.51)	62	55	45	43	42	36	<b>24</b>	62	57	48	45	44	40	<b>26</b>	63	58	51	47	46	44	<b>27</b>			
5	60	(28)	0.006	(1.43)	38	21	17	12	8	6	-	43	26	22	15	11	12	-	47	30	26	18	14	17	-			
	140	(66)	0.031	(7.80)	47	36	30	26	22	17	-	52	41	35	29	25	23	-	56	45	39	32	28	28	-			
	250	(118)	0.100	(24.88)	53	47	39	36	31	25	-	59	52	44	39	35	31	<b>20</b>	62	55	47	41	38	36	<b>25</b>			
	360	(170)	0.207	(51.60)	57	53	44	42	37	30	<b>21</b>	62	58	49	45	41	36	<b>27</b>	66	62	53	47	44	41	<b>31</b>			
6	100	(47)	0.006	(1.56)	43	35	24	15	10	6	-	46	40	28	20	16	13	-	49	44	31	24	20	19	-			
	250	(118)	0.039	(9.72)	52	47	38	28	23	19	-	56	52	43	33	29	26	-	58	55	46	37	33	32	<b>24</b>			
	400	(189)	0.100	(24.88)	57	53	46	35	30	26	<b>21</b>	60	58	50	40	36	33	<b>27</b>	63	61	53	43	40	38	<b>31</b>			
	520	(245)	0.169	(42.05)	60	56	50	39	34	29	<b>25</b>	63	61	54	43	39	37	<b>30</b>	65	64	57	47	43	42	<b>35</b>			
7	120	(57)	0.005	(1.18)	38	42	25	17	12	7	-	42	47	31	21	16	14	-	44	51	35	24	19	19	-			
	330	(156)	0.036	(8.96)	50	48	38	31	27	22	-	54	54	44	36	31	28	<b>22</b>	57	58	49	39	34	33	<b>27</b>			
	550	(260)	0.100	(24.88)	56	52	45	39	34	29	-	60	57	51	43	39	35	<b>26</b>	63	61	55	46	42	40	<b>31</b>			
	700	(330)	0.162	(40.31)	59	53	48	42	38	32	<b>23</b>	63	59	54	46	42	38	<b>29</b>	66	63	59	50	45	43	<b>34</b>			
8	160	(76)	0.005	(1.30)	45	39	27	22	18	16	-	48	45	34	27	23	23	-	50	49	39	30	27	28	-			
	440	(208)	0.040	(9.83)	55	49	38	33	28	26	-	58	54	45	38	33	33	<b>23</b>	60	59	50	41	37	38	<b>28</b>			
	700	(330)	0.100	(24.88)	59	53	43	38	32	31	<b>21</b>	62	59	49	43	38	38	<b>28</b>	64	63	55	46	41	43	<b>33</b>			
	920	(434)	0.173	(42.98)	62	56	45	41	35	34	<b>24</b>	65	62	52	46	40	41	<b>31</b>	67	66	57	49	44	46	<b>37</b>			
9	200	(94)	0.005	(1.23)	38	36	21	22	21	19	-	42	42	26	26	26	27	-	44	47	29	29	30	33	-			
	550	(260)	0.037	(9.29)	50	45	38	33	30	24	-	54	51	42	37	35	32	-	56	56	45	40	39	38	<b>25</b>			
	900	(425)	0.100	(24.88)	56	49	46	38	34	27	-	60	56	50	42	39	35	<b>24</b>	62	60	53	45	43	41	<b>30</b>			
	1160	(547)	0.166	(41.34)	59	52	50	41	37	28	<b>24</b>	63	58	54	45	42	36	<b>28</b>	65	63	57	48	46	42	<b>32</b>			
10	250	(118)	0.005	(1.29)	33	33	17	16	11	3	-	39	39	21	20	19	14	-	43	44	23	24	25	23	-			
	700	(330)	0.040	(10.08)	46	43	37	31	24	15	-	52	50	41	36	32	27	-	56	54	44	40	38	35	<b>23</b>			
	1100	(519)	0.100	(24.88)	52	48	46	38	30	21	<b>20</b>	58	54	50	43	38	32	<b>24</b>	62	59	52	46	44	41	<b>28</b>			
	1450	(684)	0.174	(43.24)	55	51	52	42	33	24	<b>26</b>	61	57	55	47	42	36	<b>30</b>	66	62	58	51	48	44	<b>33</b>			
12	400	(189)	0.006	(1.56)	42	44	29	24	20	15	-	46	49	33	28	24	20	-	50	53	37	31	28	25	<b>21</b>			
	1000	(472)	0.039	(9.72)	54	50	41	36	32	25	-	58	55	45	40	36	31	<b>23</b>	61	58	48	43	40	35	<b>27</b>			
	1600	(755)	0.100	(24.88)	60	53	47	42	38	31	<b>22</b>	64	58	51	46	42	36	<b>28</b>	67	61	54	49	46	41	<b>32</b>			
	2060	(972)	0.166	(41.25)	63	55	50	45	41	33	<b>26</b>	67	59	54	49	46	39	<b>32</b>	71	63	58	52	49	43	<b>36</b>			
14	480	(227)	0.005	(1.30)	35	35	19	24	21	18	-	39	40	22	27	24	22	-	43	44	25	30	27	26	-			
	1375	(649)	0.043	(10.67)	50	46	37	36	33	28	-	54	51	40	39	37	32	-	58	55	43	42	39	36	<b>24</b>			
	2100	(991)	0.100	(24.88)	56	51	44	41	38	32	-	60	56	47	44	41	36	<b>25</b>	64	60	50	47	44	40	<b>29</b>			
	2800	(1321)	0.178	(44.24)	60	54	49	44	41	34	<b>23</b>	65	59	52	48	45	39	<b>28</b>	68	63	55	50	47	42	<b>33</b>			

NOTES: Radiated sound power is the sound transmitted through the casing walls. All sound data is based on tests conducted in accordance with AHRI 880-11. Sound power levels are in dB, re 10<sup>-12</sup> Watts. ΔPs is the difference in static pressure from inlet to discharge. NC application data is from AHRI Standard 885-08 Appendix E, as a function of flow rate shown. AHRI certification points are shown in bold, white font. For a complete list of AHRI certified data, see page A2-28. All other data points listed are application ratings outside the scope of the Certification Program. See Krueger's selection program for specific sound data for optional liners; 1/2", dual density liner shown. Dash indicates a NC is less than 20. See Engineering section for reductions and definitions.