

HOW MANY UP-DUX's DO I NEED? HOW MUCH ATTIC VENTILATION DO I NEED?

Use the table below to estimate both the number of Up-Dux's that should be installed and the approximate square footage of attic ventilation (60% free attic louver face area) that should exist. In order for your Up-Dux to operate properly, adequate attic ventilation **MUST** also exist.

Industry Standard Cooler CFM Rating	3300	4200	4800	5500	5800	6500	7000	7600	8400
Home Square Footage	825	1050	1200	1375	1450	1625	1750	1900	2100
Number of Up-Dux's	3	4	5	5	6	6	7	7	8
Attic Ventilation Area (60% Free Louver Surface)	5.3 sq.ft.	6.7 sq.ft.	8.0 sq.ft.	9.2 sq.ft.	9.7 sq.ft.	10.7 sq.ft.	11.7 sq.ft.	12.7 sq.ft.	14.0 sq.ft.

NOTE: The number of Up-Dux's needed can also be estimated as follows: one Up-Dux for every normal size room (bedroom, living room, kitchen, ...) and two for over-sized rooms.

(The above information is estimated and may vary with duct systems, type of cooler and actual certified air delivery.)

ATTIC VENTILATION RECOMMENDATIONS FOR BEST EVAPORATIVE COOLER OPERATING PERFORMANCE

Instructions: (A) Measure home's total living area. (B) Calculate gross square footage of attic ventilation louvers. (C) Apply data from chart.

Approximate overall square footage of living areas of structure = outside W. x L. (with typical 8' ceilings)	1,030 Gross Sq-Ft	1,250 Gross Sq-Ft	1,400 Gross Sq-Ft	1,500 Gross Sq-Ft	1,800 Gross Sq-Ft	2,400 Gross Sq-Ft	2,700 Gross Sq-Ft
Approximate net square foot area of home (inside living space after deducting walls, closets, etc.)	850 Net Sq-Ft	1,030 Net Sq-Ft	1,180 Net Sq-Ft	1,280 Net Sq-Ft	1,565 Net Sq-Ft	2,060 Net Sq-Ft	2,400 Net Sq-Ft
Indicated nominal gross capacity of existing or proposed evaporative cooling unit(s)	3,300 Nom.Hi-Spd C-F-M	4,000 Nom.Hi-Spd C-F-M	4,500 Nom.Hi-Spd C-F-M	5,500 Nom.Hi-Spd C-F-M	6,500 Nom.Hi-Spd C-F-M	7,500 Nom.Hi-Spd C-F-M	8,500 Nom.Hi-Spd C-F-M
Approximate net capacity of cooler at .3" external static pressure (or "air friction.")	2,800 Net Hi-Spd C-F-M	3,380 Net Hi-Spd C-F-M	3,900 Net Hi-Spd C-F-M	4,240 Net Hi-Spd C-F-M	5,160 Net Hi-Spd C-F-M	6,800 Net Hi-Spd C-F-M	7,860. Net Hi-Spd C-F-M
Approximate cubic foot per minute per square foot of net home area	3.3	3.3	3.3	3.3	3.3	3.3	3.3
Number of minutes required for complete change of home air	2.4	2.4	2.4	2.4	2.4	2.4	2.4
Square feet of 60% free-air attic louver face area required for adequate attic ventilation	5.7	6.8	7.8	8.5	10.3	13.6	15.7
Possible minimum existing square foot face area of 60% free-air attic venting	3.1	3.7	4.2	4.5	5.4	7.2	8.1
Possible square foot deficiency of existing attic ventilation of 60% free-air face area louvers	2.6	3.1	3.6	4.0	4.9	6.4	7.6

SUGGESTED OPTIONS FOR THE IMPROVEMENT OF ATTIC VENTILATION

Increase sq. ft. face area of existing 60% free-air gable-end or other attic venting louvers	2.6 Sq-Ft	3.1 Sq-Ft	3.6 Sq-Ft	4.0 Sq-Ft	4.9 Sq-Ft	6.4 Sq-Ft	7.6 Sq-Ft
<u>OR</u> add rotary roof ventilators to compensate for inadequate existing ventilation louver area	2 - 12"	3 - 12"	3 - 12"	3 - 12"	4 - 12"	5 - 12"	6 - 12"

NOTE: Guidelines suggested may not reflect specific conditions of any individual home or the performance of any specific evaporative cooling unit since data is based on factors calculated from presumed overall averages, assumed to be typical. INSTALL 1 UP-DUX CEILING VENT FOR EACH 900 C.F.M. OF COOLER'S NOMINALLY RATED HIGH SPEED AIR FLOW CAPACITY!