

ΣΥΝΤΕΛΕΣΤΕΣ ΜΕΤΑΤΡΟΠΗΣ

CONVERSION FACTORS

AIR FLOW								
Multiply	for	to have	Multiply	for	to have	Multiply	for	to have
m ³ /s	60	m ³ /min	m ³ /h	0,0003	m ³ /s	l/min	0,00016	m ³ /s
	3600	m ³ /h		0,0167	m ³ /min		0,001	m ³ /min
	1000	l/s		0,2778	l/s		0,06	m ³ /h
	60000	l/min		16,667	l/min		0,0167	l/s
	2118,9	CFM		0,58858	CFM		0,03531	CFM
m ³ /min	0,0167	m ³ /s	l/s	0,001	m ³ /s	CFM	0,0004719	m ³ /s
	60	m ³ /h		0,06	m ³ /min		0,02832	m ³ /min
	16,667	l/s		3,6	m ³ /h		1,699	m ³ /h
	1000	l/min		60	l/min		0,47195	l/s
	35,315	CFM		2,1189	CFM		28,317	l/min

PRESSURE								
Multiply	for	to have	Multiply	for	to have	Multiply	for	to have
kg/m ²	1	mmH ₂ O	Pa	0,10215	kgf/m ²	in-wg	25,4	kgf/m ²
	0,07343	mmHg		0,10215	mmH ₂ O		25,4	mmH ₂ O
	9,7898	Pa		0,007501	mmHg		1,8651	mmHg
	0,0000966	Atm		0,0000099	Atm		248,66	Pa
	0,00142	psi		0,000145	psi		0,002454	Atm
	0,03937	in-wg		0,004022	in-wg		0,03607	psi
	0,002891	in-Hg		0,0002953	in-Hg		0,07343	in-Hg
mmH ₂ O	1	kgf/m ²	Atm	10350	kgf/m ²	in-Hg	345,91	kgf/m ²
	0,07343	mmHg		10350	mmH ₂ O		345,91	mmH ₂ O
	9,7898	Pa		760	mmHg		25,4	mmHg
	0,0000966	Atm		101300	Pa		3386,4	Pa
	0,00142	psi		14,696	psi		0,03342	Atm
	0,03937	in-wg		407,48	in-wg		0,49115	psi
	0,002891	in-Hg		29,921	in-Hg		13,619	in-wg
mmHg	13,619	kgf/m ²	psi	704,28	kgf/m ²			
	13,619	mmH ₂ O		704,28	mmH ₂ O			
	133,32	Pa		51,715	mmHg			
	0,001316	Atm		6894,8	Pa			
	0,01934	psi		0,06805	Atm			
	0,53616	in-wg		27,728	in-wg			
	0,03937	in-Hg		2,036	in-Hg			

AIR FLOW								
Multiply	for	to have	Multiply	for	to have	Multiply	for	to have
m/s	60	m/min	in/sec	0,0254	m/s	fpm	0,00508	m/s
	39,37	in/sec		1,524	m/min		0,3048	m/min
	3,2808	fps		0,0833	fps		0,2	in/sec
	196,85	fpm		5	fpm		0,0167	fps
m/min	0,0167	m/s	fps	0,3048	m/s			
	0,65617	in/sec		18,288	m/min			
	0,05468	fps		12	in/sec			
	3,2808	fpm		60	fpm			

DENSITY								
Multiply	for	to have	Multiply	for	to have	Multiply	for	to have
kg/m ³	0,06243	lb/ft ³	lb/ft ³	16,02	kg/m ³			

8 INSTALLATION TIPS

During design and installation of a ventilation system, there are some tricks that reduce the creation of turbulence. Turbulences unavoidably bring to a performance reduction, compared to what mentioned in the Catalogue (that is the result of laboratory test, made in ideal conditions according to precise reference norms) and to an increase of noise emission.

Find below a selection of these tips.

Before installing a "disturbing" element in the ducting (bend, split element, filter...) it is necessary to foresee, between the fan outlet and such element, a distance that allows the airflow to achieve a regular speed profile (see picture below). Such

distance is generally equal to 2,5 times the duct diameter, for an average air speed lower than 12,5 m/s (in case of rectangular duct use equivalent diameter). Above such air speed value, it is necessary to add one diameter for each 5 m/s increase.