BUILDING CODE COMPLIANCE

Product Flow Ratings vs. Pool System Flow Ratings

Public and residential pool building codes in most states require skimmer systems to have flow ratings that are higher than the flow rate at which the circulation system will operate. These Codes also require large enough pipe so the water velocity inside the suction-side pipe does not exceed 6 fps when the system is operating at the "design flow rate". The table below provides Code Complaint flow ratings based on skimmer pipe fitting size and the number of skimmers to be installed. Visit www.aquastarpoolproducts.com for additional information.

Skimmer and Pipe Sizing Chart @ Max Water Velocity

Flow Star® Skimmer Fitting Sizes	Skimmer Fitting Flow Rating @ 6 fps	# of Skimmers Supported for Each Pipe Fitting Size and Each Skimmer GPM			
2" Slip-Inside	63 GPM	1 @ 63 GPM / 2 @ 33 GPM			
2 ½" Spigot	90 GPM	1 @ 90 GPM / 2 @ 45 GPM / 3 @ 30 GPM			
3" Slip Inside using BFB101	138 GPM	2 @ 69 GPM / 3 @ 46 GPM / 4 @ 35 GPM			
4" Slip-inside using BFB101	238 GPM	3 @ 79 GPM / 4 @ 60 GPM / 5 @ 48 GPM 6 @ 40 GPM / 7 @ 34 GPM / 8 @ 30 GPM			
Slip-inside using 4" Socket Sump	238 GPM	3 @ 79 GPM / 4 @ 60 GPM / 5 @ 48 GPM 6 @ 40 GPM / 7 @ 34 GPM / 8 @ 30 GPM			
6" Slip-Inside	540 GPM	6 @ 90 GPM / 7 @ 77 GPM / 8 @ 68 GPM 9 @ 60 GPM / 10 @ 54 GPM / 11 @ 49 GPM 12 @ 45 GPM / 13 @ 42 GPM / 14 @ 39 GPM 15 @ 36 GPM / 16 @ 34 GPM / 17 @ 32 GPM			

AquaStar Specific Eyeball GPM, Velocity and Head Loss Ratings

	ENxxx (1")		ENBxxx (3/4")		ENCxxx (1/2")		ENDxxx (Down-Jet)	
GPM	Velocity (fps)	Head Loss (ft)	Velocity (fps)	Head Loss (ft)	Velocity (fps)	Head Loss (ft)	Velocity (fps)	Head Loss (ft)
5	2.2	0.1	3.6	0.5	8.2	2.4	10.1	2.1
10	4.4	0.5	7.3	1.8	16.3	8.7	20.2	8.1
15	6.6	1.1	10.9	3.7	24.5	18.6	30.3	20.7
20	8.8	1.9	14.5	6.2	32.4	32.0		
25	11.0	3.0	18.2	9.4			_	
30	13.2	4.4	21.8	13.1				
35	15.4	6.1	25.4	17.3				
40	17.6	8.0			_			
45	19.7	10.2						
50	21.9	12.7	1					