

**Apex Industrial Solutions, Inc.**

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 www.ApexSolutionsMN.com

CUSTOMER		DATE	
PHONE #		EMAIL	
COMPANY		PLANT LOCATION	
PROJECT			

Gate Type	☐ Rack & Pinion*	☐ Air Operated**	☐ Electric Operated
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*If Rack & Pinion	☐ Hand Wheel	☐ Chain Wheel	**If Air Operated - Limit Switches Required?	☐ Yes	☐ No
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CONDITIONS ABOVE CLOSED GATE

Gate is Installed Beneath	☐ Hopper	☐ Silo	☐ Baghouse
	☐ Cyclone	☐ Filter Receiver	☐ Screw
	☐ Shredder	☐ Dryer	☐ Mixer
	☐ Other		

Pressure Above Gate is	☐ Positive	☐ Negative	☐ Atmospheric
	PSI	"Hg	"H ₂ O

Temperature Above	°F	Humidity is	☐ High	☐ Average	☐ Low
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Is Gate Choke-Fed?	☐ Yes	☐ No	Head of Material Above Gate?	☐ Yes	☐ No	Column Height of Head	Ft
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CONDITIONS BELOW CLOSED GATE

Gate is Installed Beneath	☐ Hopper	☐ Screw	☐ Airslide
	☐ Belt	☐ Chute	☐ Mixer
	☐ Tank	☐ Rotary Valve	☐ Screener
	☐ Other		

Pressure Beneath Gate is	☐ Positive	☐ Negative	☐ Atmospheric
	PSI	"Hg	"H ₂ O

Temperature Beneath	°F	Humidity is	☐ High	☐ Average	☐ Low
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OPERATING CONDITIONS

Rate of Flow per Hour	Tons	Lbs	Cu. Ft.
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Duty Cycle	☐ Periodic	☐ Intermittent	Open/Close Cycle
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Compressed Air Pressure	PSI	Electric Utilities	VAC	Ph	Hz
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Common Name								
Chemical Formula								
Bulk Density, Aerated		Lbs/Cu.Ft.		Bulk Density, Settled		Lbs/Cu.Ft.		
Max Particle Size				Moisture Content		%		
Particle Type/Shape	☐ Pellet	☐ Powder		☐ Lump		☐ Chip		
	☐ Granular	☐ Flake		☐ Curl		☐ Fibrous		
Flowability	☐ Good	☐ Poor		☐ Packs		☐ Bridges		
Abrasiveness	☐ Extreme		☐ Moderate		☐ Mild			
Material Temperature	°F		Mesh Size-Angle of Repose		°			
Mesh-Size Angle of Repose	% Thru 1/2"		% Thru 1/4"		% Thru 1/8"		% Thru 1/16"	
	% Thru 25		% Thru 50		% Thru 100		% Thru 200	
Special Characteristics	☐ Hygroscopic	☐ Corrosive/Reactive	☐ Explosive		☐ Toxic/Emits Fumes		☐ Sticky/Smears	
	☐ Heat Sensitive	☐ Food Grade	☐ Aerates/Dusty		☐ Pharmaceutical		☐ Tends to Pack	
	☐ Other							

Slide Gate Air Cylinders										
	Bulk Density - Lbs/Cu. Ft.									
Size	30	40	50	60	70	80	90	100	110	120
6x6	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
8x8	2	2	2	2	2	2	2	2	2	2
10x10	2.5	2.5	2.5	2.5	2.5	2.5	2.5	2.5	2.5	2.5
12x12	3.25	3.25	3.25	3.25	3.25	3.25	3.25	3.25	3.25	3.25
14x14	2.5	2.5	2.5	4	4	4	4	4	4	4
16x16	3.25	3.25	3.25	3.25	3.25	3.25	5	5	5	5
18x18	3.25	3.25	3.25	5	5	5	5	5	5	5
20x20	5	5	5	5	5	5	5	5	6	6
22x22	5	5	5	5	5	5	6	6	6	6
24x24	5	5	5	5	6	6	8	8	8	8
26x26	5	5	5	6	6	8	8	8	8	8
30x30	8	8	8	8	8	8	10	10	10	10

Capacities	
Size	CFM
4x4	4
6x6	12
8x8	29
10x10	56
12x12	94
14x14	143
16x16	210
18x18	293
20x20	383
22x22	498
24x24	630
26x26	769
30x30	1125
36x36	1800

1. $\left(\frac{\quad}{60} \right)$ Lbs/Hr = $(\quad)$ Lbs/Minute

2. () Lbs/Minute = () CFM
() Lbs/Cu.Ft.

3. $\frac{(\quad) \text{ CFM}_1}{(\quad) * \text{Fill Factor}} = (\quad) \text{ CFM}_2$

NOTES

- **Notes:**

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CUSTOMER PRINTED NAME

CUSTOMER SIGNATURE

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