

SQBI series

CENTRIFUGAL FAN

engineering data
and specifications



CINCINNATI FAN 

Since the founding of Cincinnati Fan in 1956, the company's mission has been to provide quality products at competitive prices, backed by depend-able service.

This mission is carried out by specializing in the market for industrial air handling products up to 125 hp. But specialization does not mean the product line is small. Cincinnati Fan offers a wide variety of standard and customized products, production flexibility, and customer responsiveness.

CINCINNATI FAN PROVIDES

- ◆ Technical evaluation for correct performance conditions
- ◆ Review of air stream and ambient conditions that require special attention
- ◆ Selection of proper components to meet required design specifications
- ◆ Selection of proper accessories
- ◆ System analysis for proper fan design

Cincinnati Fan operates in a modern facility specifically designed for world class manufacturing enabling us to build standard products to order, including accessories, and ship within 5 to 10 working days.

With support like this, you can be sure your Cincinnati Fan product will be well-built and will provide maximum dependability and longevity.

Cincinnati Fan has over 170 experienced sales engineers across the US and Canada ready to serve your air handling needs.

ADVANTAGES OF DIRECT DRIVE ARRANGEMENT 4

◆ COST

Lower initial cost plus lower maintenance cost (no V-belt drives, fan shaft or bearings to replace).

◆ RATINGS

More ratings available. All sizes offered with two wheel diameters and fan housing widths from 100% to 50% in 5% increments.

◆ COMPACT

Requires less space.

◆ MOUNTING

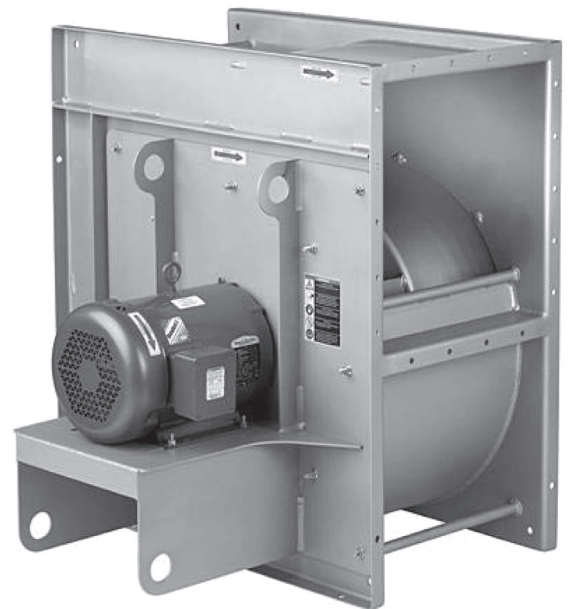
Four discharge positions and two rotations (CW or CCW) plus fans can be mounted horizontally (Maximum 600 pound motor).

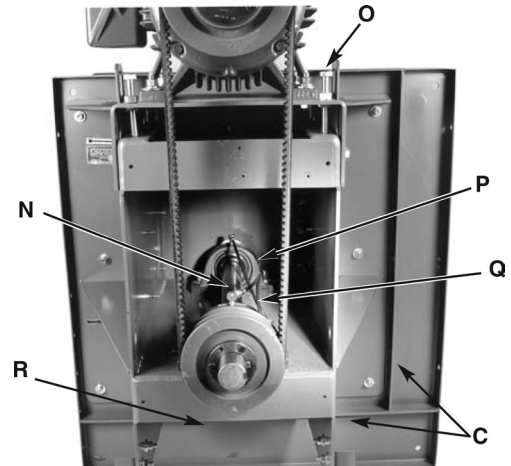
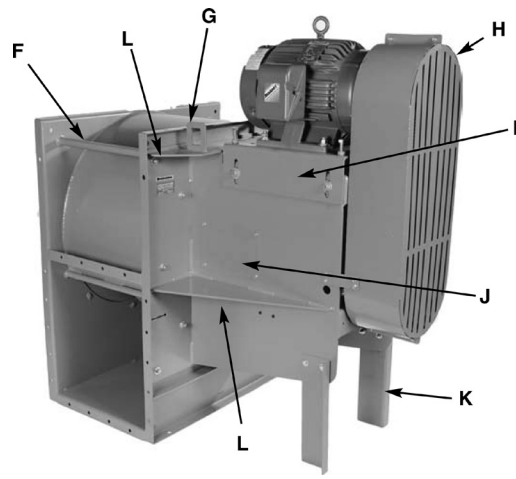
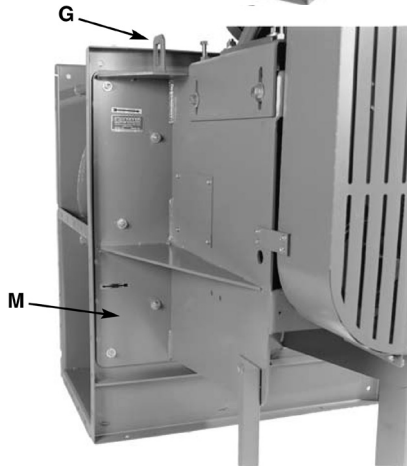
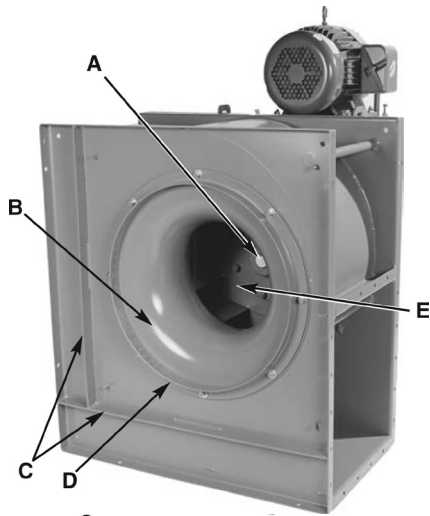
◆ LESS WEIGHT

Requires less supporting structure.

◆ CONSTRUCTION

Solidly built with continuously welded housings and mounting holes in all support flanges. All fans are mechanically run tested prior to shipment to ensure the balance of the assembled unit.



ARRANGEMENT 9 FEATURES

A - Heavy-duty, cast iron wheel hub.

B - Inlet bell designed for smooth air entrance into wheel for maximum efficiency.

C - Inlet and motor side plate braces for added rigidity.

D - Slip collar inlet (optional) for ductwork connection. Flanged inlet also available. See page 4.

E - Backward inclined blades fabricated of heavy-gauge high strength steel to assure long lasting, efficient operation.

F - Steel pipe support rods between inlet and motor side plates for extra rigidity and smooth operation.

G - Lifting lugs for ease of mounting by hoist or crane in hard to reach areas.

H - Heavy-duty belt guard, painted safety yellow, Standard on arrangement 9.

I - Motor mounting base extended so fan can be built in Up Blast Discharge position with motor still on top.

J - Inboard bearing inspection opening on two sides.

K - Steel angle support legs for shipping. Remove after mounting is completed.

L - Drive side plate braces for added rigidity.

M - Drive side plate can be disconnected to rotate housing in field without removing wheel or disturbing bearings and drives. Also, entire motor/bearing support structure and wheel can be removed from installation without having to disconnect inlet and/or discharge duct work.

N - Turned, ground and polished shaft assures smooth operation. A rust preventative coating is applied prior to shipment.

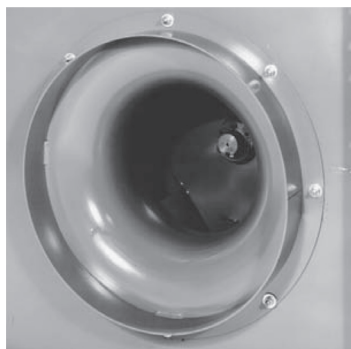
O - Four motor adjustment bolts for easy adjustment and alignment of belt tension.

P - Heavy-duty, self-aligning, relubricatable, ball bearings in cast iron pillow blocks are standard. Bearings selected for optimal performance depending on fan size and class with an L₁₀ life of 30,000 hours minimum.

Q - Bearing grease lines extend to grease fittings (not shown) outside of bearing base for easy lubrication of fan bearings when needed.

R - Bearing base is heavy steel construction with supports to maximize rigidity and assure long equipment life.

OPTIONS



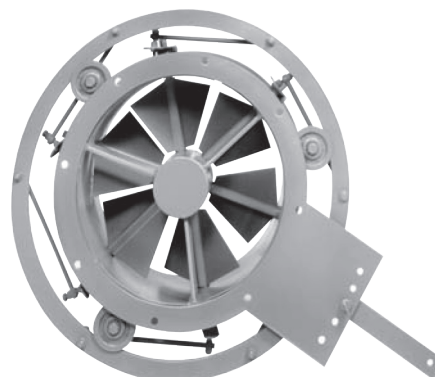
Inlet Collar

Inlet collar for slip-fit connection to duct work.



Inlet Flange

Flanged inlet for bolted connection to duct work. Flange drilled with standard hole pattern, see page 23. Undrilled flanges available at additional cost and extended delivery.



Inlet Vane Control

Inlet vane offers more efficient flow control compared to outlet damper. Manual control is standard. Automatic control is optional. Requires inlet collar and flange for mounting to fan.



Drain Connection

3/4" NPT pipe coupling with plug. Welded to lowest point on inlet side plate.



Inlet and Outlet Guard

Inlet guard is welded, formed wire. Outlet guard is expanded metal. Guards are in accordance with OSHA.



Inspection Door

Bolted or quick-release doors positioned as specified on scroll. Rubber gasket standard up to 250°F (121°C). Ceramic fiber gasket standard at temperatures above 250°F (122°C).



Outlet Damper

Outlet damper provides low cost flow control. Opposed blade manually controlled construction is standard. Also available with automatic controllers.



Shaft Seal

Teflon shaft seal good to 400°F (204°C). Ceramic fiber gasket material with steel cover plate above 400°F (205°C).

SPARK-RESISTANT CONSTRUCTION

Type A: All parts in contact with airstream are of nonferrous material. (Contact your local Cincinnati Fan sales representative).

Type B: Fabricated aluminum wheel and aluminum rubbing ring on motor shaft or fanshaft. **Maximum Temperature 200°F (93°C) all arrangements.**

Type C: Consists of aluminum inlet bell and aluminum plate on drive side of the fan. Maximum Temperature is the same as for high temperature construction below for each arrangement.

⚠ WARNING

The use of aluminum or aluminum alloys in the presence of steel which has been allowed to rust requires special consideration. Research by the U.S. Bureau of Mines and others has shown that aluminum impellers rubbing on rusty steel may cause high intensity sparking. The use of the above Standard in no way implies a guarantee of safety for any level of spark resistance. Spark-resistant construction also does not protect against ignition of explosive gases caused by catastrophic failure or from any airstream material that may be present in a system.

HIGH TEMPERATURE CONSTRUCTION

Standard Construction: Arrangement 9 suitable to 300°F (149°C) Arrangement 4 suitable to 200°F (93°C)

301° to 400°F Construction: Standard fan with heat slinger. Arrangement 9 only.

401° to 600°F Construction: Standard fan with heat slinger, high temperature shaft seal, gasketing and paint. Arrangement 9 only.

601° to 750°F Construction: Standard fan with heat slinger, 316 stainless steel fan shaft, high temperature shaft seal, gasketing and paint. Arrangement 9 only.

Wheel Size	Maximum RPM Aluminum Wheel [†]
120	5400
130	4999
150	4712
160	4285
180	3885
200	3574
220	3550
240	2837
270	2476
300	2300
330	2300
360	1950

[†] Up to 200°F (93°C). Consult your local Cincinnati Fan sales rep for higher temperature and/or higher RPMs

Temperature Range °F	Maximum RPM Reduction Factor [†]
Up to 175°	0%
176° - 200°	2%
201° - 300°	4%
301° - 400°	7%
401° - 500°	11%
501° - 600°	15%
601° - 700°	20%
701° - 750°	30%

[†] Steel wheels only

TEMPERATURE - ALTITUDE ADJUSTMENT

Air Temperature °F	Altitude in Feet Above Sea Level										
	0	1000	2000	3000	4000	5000	6000	7000	8000	9000	10000
0°	0.87	0.91	0.94	0.98	1.01	1.05	1.09	1.13	1.17	1.22	1.26
40°	0.94	0.98	1.02	1.06	1.10	1.14	1.19	1.23	1.28	1.32	1.36
70°	1.00	1.04	1.08	1.12	1.16	1.20	1.25	1.30	1.35	1.40	1.45
80°	1.02	1.06	1.10	1.14	1.19	1.23	1.28	1.33	1.38	1.43	1.48
100°	1.06	1.10	1.14	1.19	1.23	1.28	1.33	1.38	1.43	1.48	1.54
120°	1.09	1.14	1.18	1.23	1.28	1.32	1.38	1.43	1.48	1.53	1.58
140°	1.13	1.18	1.22	1.27	1.32	1.37	1.42	1.48	1.54	1.58	1.65
160°	1.17	1.22	1.26	1.31	1.36	1.42	1.47	1.53	1.59	1.64	1.70
180°	1.21	1.26	1.30	1.36	1.41	1.46	1.52	1.58	1.64	1.70	1.75
200°	1.25	1.29	1.34	1.40	1.45	1.51	1.57	1.63	1.69	1.75	1.81
250°	1.34	1.39	1.45	1.50	1.56	1.62	1.68	1.74	1.82	1.88	1.94
300°	1.43	1.49	1.55	1.61	1.67	1.74	1.80	1.87	1.94	2.00	2.08
350°	1.53	1.59	1.65	1.72	1.78	1.85	1.92	2.00	2.07	2.14	2.22
400°	1.62	1.69	1.75	1.82	1.89	1.96	2.04	2.12	2.20	2.27	2.35
450°	1.72	1.79	1.86	1.93	2.00	2.08	2.16	2.24	2.33	2.41	2.50
500°	1.81	1.88	1.96	2.03	2.11	2.19	2.28	2.36	2.46	2.54	2.62
550°	1.91	1.98	2.06	2.14	2.22	2.30	2.40	2.49	2.58	2.68	2.77
600°	2.00	2.08	2.16	2.24	2.33	2.42	2.50	2.61	2.71	2.80	2.90
650°	2.10	2.18	2.26	2.35	2.44	2.54	2.63	2.74	2.84	2.94	3.04
700°	2.19	2.27	2.36	2.46	2.55	2.65	2.75	2.86	2.97	3.06	3.18
750°	2.28	2.37	2.47	2.56	2.66	2.76	2.87	2.98	3.10	3.19	3.31

Fan performance tables are developed using standard air which is 70°F, 29.92" barometric pressure and .075 lb/ft³ per cubic foot. Density changes resulting from temperature or barometric pressure variations (such as higher altitudes) must be corrected to standard conditions before selecting a fan based on standard performance data. Temperature and/or altitude conversion factors are used in making corrections to standard conditions.

EXAMPLE: Select a belt driven fan to deliver 7000 CFM at 8" SP at 200°F, and 7000' altitude.

Step 1 - From the table, conversion factor is 1.63

Step 2 - Correct static pressure is:

$$1.63 \times 8" \text{ SP} = 13.04" \text{ SP at standard conditions}$$

Step 3 - Check SQBI catalog for 7500 CFM at 13" SP. We select a belt driven SQBI-200 Class IIP at 2613 RPM and 19.49 bhp.

Step 4 - Correct the bhp for the lighter air:

$$19.49 \div 1.63 = 11.96 \text{ bhp}$$

A 15 hp motor will suffice at 200°F and 7000' but not at standard conditions. Special motor insulation may be required due to altitude.

Direct Drive Ratings Table

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CFM and bhp at Static Pressure Shown – Ratings at 70°F – .075" Density – Sea Level

Model	RPM	Wheel Type	Fan Width	1" SP		2" SP		3" SP		4" SP		5" SP		6" SP	
				CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp
SQBI-120	1750	HDBI	1/2	639†	0.18										
	1750	SOBI	1/2	753†	0.24	523	0.25								
	1750	HDBI	3/4	959†	0.27										
	1750	SOBI	3/4	1129†	0.37	785	0.37								
	1750	HDBI	FULL	1279†	0.36										
	1750	SOBI	FULL	1505†	0.49	1046	0.50								
	3500	HDBI	1/2	1621†	1.27	1509†	1.32	1397†	1.38	1279†	1.42	1145†	1.45	972†	1.43
	3500	SOBI	1/2	1750†	1.73	1668†	1.81	1588†	1.89	1505†	1.96	1418†	2.01	1320†	2.05
	3500	HDBI	3/4	2431†	1.90	2263†	1.99	2096†	2.07	1918†	2.13	1717†	2.17	1457†	2.14
	3500	SOBI	3/4	2625†	2.60	2502†	2.71	2382†	2.83	2258†	2.93	2126†	3.02	1980†	3.08
SQBI-130	1750	HDBI	1/2	912†	0.28	548†	0.28								
	1750	SOBI	1/2	1037†	0.38	829†	0.41								
	1750	HDBI	3/4	1368†	0.42	822†	0.41								
	1750	SOBI	3/4	1555†	0.57	1244†	0.62								
	1750	HDBI	FULL	1824†	0.57	1097†	0.55								
	1750	SOBI	FULL	2073†	0.77	1658†	0.82								
	3500	HDBI	1/2	2198†	2.04	2073†	2.12	1950	2.19	1824†	2.27	1690†	2.32	1542†	2.36
	3500	SOBI	1/2	2342†	2.77	2251†	2.87	2163	2.97	2073	3.07	1981	3.15	1884	3.21
	3500	HDBI	3/4	3297†	3.05	3110	3.17	2925	3.29	2736	3.40	2536	3.49	2313	3.53
	3500	SOBI	3/4	3512	4.15	3377	4.31	3244	4.46	3110	4.60	2972	4.72	2826	4.82
SQBI-150	1750	HDBI	1/2	1317†	0.47	1002†	0.50								
	1750	SOBI	1/2	1469†	0.63	1259†	0.69	945†	0.68						
	1750	HDBI	3/4	1975†	0.70	1504†	0.75								
	1750	SOBI	3/4	2204†	0.95	1889†	1.03	1417†	1.02						
	1750	HDBI	FULL	2634†	0.94	2005†	1.00								
	1750	SOBI	FULL	2938†	1.27	2518†	1.37	1890†	1.36						
	3500	HDBI	1/2	3049	3.40	2909	3.51	2771	3.63	2634	3.75	2493	3.86	2345	3.94
	3500	SOBI	1/2	3237	4.66	3136	4.80	3037	4.95	2938	5.08	2839	5.20	2737	5.31
	3500	HDBI	3/4	4573	5.10	4363	5.26	4157	5.45	3951	5.62	3739	5.79	3518	5.91
	3500	SOBI	3/4	4856	6.98	4703	7.21	4555	7.42	4408	7.62	4259	7.81	4106	7.97
SQBI-160	1750	HDBI	1/2	1816†	0.74	1498†	0.80	986†	0.74						
	1750	SOBI	1/2	2005†	1.01	1783†	1.09	1516†	1.12						
	1750	HDBI	3/4	2724†	1.11	2247†	1.20	1479†	1.11						
	1750	SOBI	3/4	3008†	1.51	2675†	1.63	2273†	1.68						
	1750	HDBI	FULL	3632†	1.48	2996†	1.60	1972†	1.48						
	1750	SOBI	FULL	4010†	2.02	3566†	2.17	3031†	2.25						
	3500	HDBI	1/2	4090	5.45	3934	5.58	3782	5.74	3632	5.90	3481	6.06	3327	6.21
	3500	SOBI	1/2	4342	7.49	4228	7.69	4118	7.88	4010	8.07	3902	8.24	3793	8.40
	3500	HDBI	3/4	6135	8.18	5900	8.37	5673	8.61	5448	8.85	5222	9.09	4990	9.31
	3500	SOBI	3/4	6513	11.23	6343	11.54	6178	11.73	6015	12.10	5853	12.36	5689	12.61
SQBI-180	1750	HDBI	1/2	2538†	1.18	2212†	1.27	1824†	1.30						
	1750	SOBI	1/2	2970•	1.72	2750•	1.83	2515•	1.91	2227	1.94	1705•	1.86		
	1750	HDBI	3/4	3806•	1.77	3318•	1.90	2736•	1.95						
	1750	SOBI	3/4	4455	2.58	4125	2.74	3773	2.86	3341	2.91	2558	2.79		
	1750	HDBI	FULL	5075	2.36	4424	2.53	3649	2.60						
	1750	SOBI	FULL	5941	3.44	5500	3.65	5030	3.81	4454	3.89	3411	3.72		
	3500	HDBI	1/2	5572	8.80	5401	9.02	5236	9.23	5075	9.44	4915	9.64	4755	9.82
	3500	SOBI	1/2	6288	12.89	6168	13.20	6053	13.48	5941	13.74	5830	13.98	5721	14.21
	3500	HDBI	3/4	8358	13.20	8101	13.53	7855	13.85	7613	14.16	7373	14.46	7132	14.73
	3500	SOBI	3/4	9433	19.34	9252	19.80	9079	20.22	8911	20.61	8745	20.98	8581	21.31
SQBI-200	1750	HDBI	1/2	3411•	1.84	3058•	1.96	2676•	2.05	2177•	2.03				
	1750	SOBI	1/2	3911	2.63	3670	2.78	3424	2.90	3150	2.98	2806	3.01	2168	2.86
	1750	HDBI	3/4	5116	2.76	4587	2.94	4014	3.07	3265	3.05				
	1750	SOBI	3/4	5866	3.95	5505	4.17	5136	4.35	4726	4.47	4209	4.52	3252	4.30
	1750	HDBI	FULL	6821	3.68	6116	3.93	5352	4.09	4353	4.06				
	1750	SOBI	FULL	7822	5.26	7340	5.57	6848	5.80	6301	5.97	5612	6.02	4336	5.73
	3500	HDBI	1/2	7372	13.85	7183	14.14	7000	14.43	6821	14.71	6645	14.98	6470	15.23
	3500	SOBI	1/2	8207	19.91	8074	20.32	7946	20.69	7822	21.05	7700	21.38	7580	21.69
	3500	HDBI	3/4	11059	20.78	10774	21.21	10500	21.64	10233	22.06	9968	22.46	9705	22.85
	3500	SOBI	3/4	12310	29.86	12111	30.47	11919	31.04	11726	31.57	11530	32.07	11339	32.54
SQBI-200	3500	HDBI	FULL	14745	27.70	14365	28.28	14000	28.85	13625	29.41	13291	29.95	12940	30.47
	3500	SOBI	FULL	16414	39.81	16147	40.63	15892	41.39	15626	42.09	15400	42.76	15159	43.38

Performance shown is for installation AMCA type B Free inlet, ducted outlet. Performance ratings do not include the effects of appurtenances in the airstream.

Direct Drive Ratings Table

CFM and bhp at Static Pressure Shown – Ratings at 70°F – .075" Density – Sea Level

7" SP		8" SP		9" SP		10" SP		11" SP		12" SP		13" SP		14" SP		Model
CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	
																SQBI-120
1204 †	2.06	1046	2.00													SQBI-130
1806 †	3.08	1570	3.00													
2408	4.11	2093	4.00													
																SQBI-150
1363 †	2.34	1097 †	2.20													SQBI-160
1778	3.26	1658	3.28	1513	3.26	1310	3.16									
2044	3.51	1645	3.30													
2667	4.89	2487	4.93	2269	4.90	1965	4.74									
2726	4.68	2193	4.41													
3556	6.52	3316	6.57	3026	6.53	2619	6.32									
																SQBI-180
2185	3.99	2005	4.00	1784	3.92	1448	3.66									SQBI-200
2631	5.41	2518	5.49	2396	5.54	2258	5.56	2097	5.54	1890	5.43	1890	5.10			
3278	5.99	3007	6.00	2677	5.88	2172	5.48									
3947	8.12	3777	8.23	3594	8.31	3388	8.35	3146	8.31	2835	8.14	2835	7.64			
4371	7.99	4010	8.00	3569	7.84	2896	7.31									
5262	10.82	5037	10.98	4791	11.08	4517	11.13	4194	11.08	3780	10.86	3780	10.19			
																SQBI-220
3166	6.33	2996	6.41	2810	6.45	2599	6.43	2343	6.29	1972	5.93	1972				SQBI-240
3681	8.55	3566	8.68	3446	8.80	3319	8.89	3182	8.95	3031	8.98	3031	8.96	2655	8.87	
4749	9.49	4494	9.62	4215	9.68	3898	9.64	3514	9.44	2958	8.90	2958				
5522	12.83	5350	13.03	5170	13.20	4979	13.33	4773	13.43	4547	13.47	4547	13.45	3982	13.31	
6332	12.66	5991	12.83	5619	12.91	5198	12.85	4686	12.58	3944	11.86	3944				
7363	17.10	7133	17.37	6893	17.59	6638	17.78	6364	17.90	6062	17.96	6062	17.93	5309	17.75	
																SQBI-260
4591	9.99	4424	10.14	4249	10.26	4065	10.35	3867	10.41	3649	10.41	3649	10.33	3091	10.13	SQBI-280
5611	14.42	5500	14.61	5388	14.79	5273	14.96	5154	15.11	5030	15.24	5030	15.35	4764	15.44	
6887	14.98	6636	15.20	6374	15.39	6097	15.53	5800	15.61	5473	15.61	5473	15.50	4637	15.20	
8416	21.63	8250	21.92	8082	22.19	7909	22.44	7731	22.66	7546	22.86	7546	23.03	7146	23.17	
9183	19.98	8847	20.27	8498	20.52	8130	20.70	7734	20.81	7297	20.81	7297	20.67	6182	20.27	
11222	28.84	11000	29.23	10776	29.59	10545	29.92	10308	30.22	10061	30.48	10061	30.71	9527	30.89	
																SQBI-300
6294	15.48	6116	15.70	5935	15.91	5748	16.09	5555	16.24	5352	16.36	5352	16.44	4904	16.46	SQBI-320
7460	21.98	7340	22.26	7220	22.52	7098	22.77	6975	23.00	6848	23.21	6848	23.40	6585	23.58	
9441	23.22	9174	23.55	8902	23.86	8622	24.13	8332	24.36	8028	24.54	8028	24.66	7357	24.69	
11190	32.98	11010	33.39	10830	33.78	10647	34.15	10462	34.49	10273	34.81	10273	35.10	9878	35.37	
12588	30.95	12232	31.41	11870	31.82	11497	32.18	11110	32.48	10704	32.72	10704	32.87	9809	32.92	
14920	43.97	14681	44.52	14440	45.05	14196	45.53	13949	45.99	13697	46.41	13697	46.80	13170	47.15	

Minimum Motor Frame Size Required

Symbols indicate minimum motor frame required even though the bhp is available in a smaller motor frame size

† 143T Motor Frame Minimum

* 182T Motor Frame Minimum

Additional ratings at bottom of pages 8 and 9

Additional ratings at bottom of pages 8 and 9

Additional ratings at bottom of pages 8 and 9

Direct Drive Ratings Table

CFM and bhp at Static Pressure Shown – Ratings at 70°F – .075" Density – Sea Level

Model	RPM	Wheel Type	Fan Width	1" SP		2" SP		3" SP		4" SP		5" SP		6" SP	
				CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp
SQBI-220	1150	HDBI	1/2	2911●	0.94	2243●	1.01								
	1150	SQBI	1/2	3424	1.38	2932	1.49	2084	1.43						
	1150	HDBI	3/4	4367	1.41	3365	1.52								
	1150	SQBI	3/4	5136	2.07	4398	2.24	3126	2.15						
	1150	HDBI	FULL	5823	1.88	4486	2.02								
	1150	SQBI	FULL	6848	2.75	5864	2.99	4168	2.86						
	1750	HDBI	1/2	4918	3.04	4547	3.25	4170	3.43	3744	3.55	3172	3.53		
	1750	SQBI	1/2	5593	4.52	5303	4.78	5006	5.00	4685	5.18	4320	5.30	3860	5.30
	1750	HDBI	3/4	7378	4.56	6820	4.88	6255	5.15	5616	5.33	4758	5.29		
	1750	SQBI	3/4	8390	6.77	7955	7.17	7509	7.51	7028	7.78	6480	7.95	5791	7.95
SQBI-240	1750	HDBI	FULL	9837	6.08	9094	6.51	8340	6.87	7488	7.10	6344	7.06		
	1750	SQBI	FULL	11187	9.03	10606	9.55	10011	10.01	9371	10.37	8640	10.60	7721	10.60
	1150	HDBI	1/2	4018■	1.49	3358■	1.62								
	1150	SQBI	1/2	4683	2.19	4171	2.37	3516	2.45						
	1150	HDBI	3/4	6027	2.23	5037	2.44								
	1150	SQBI	3/4	7025	3.28	6256	3.56	5274	3.67						
	1150	HDBI	FULL	8036	2.97	6716	3.25								
	1150	SQBI	FULL	9366	4.38	8342	4.75	7032	4.90						
	1750	HDBI	1/2	6657■	4.86	6242	5.15	5836	5.42	5407	5.63	4919	5.76	4284	5.73
	1750	SQBI	1/2	7547	7.25	7227	7.61	6905	7.93	6571	8.22	6210	8.44	5806	8.59
SQBI-270	1750	HDBI	3/4	9986	7.28	9363	7.72	8754	8.12	8111	8.45	7379	8.64	6426	8.59
	1750	SQBI	3/4	11321	10.87	10841	11.41	10358	11.90	9856	12.32	9315	12.66	8709	12.89
	1750	HDBI	FULL	13314	9.71	12484	10.30	11672	10.83	10815	11.26	9839	11.52	8568	11.45
	1750	SQBI	FULL	15095	14.49	14455	15.22	13811	15.87	13141	16.43	12420	16.88	11612	17.18
	1150	HDBI	1/2	5524	2.36	4829	2.58	3947	2.66						
	1150	SQBI	1/2	6377	3.49	5830	3.76	5206	3.94	4341	3.94				
	1150	HDBI	3/4	8286	3.54	7244	3.87	5920	3.99						
	1150	SQBI	3/4	9566	5.23	8745	5.64	7809	5.91	6511	5.90				
	1150	HDBI	FULL	11048	4.73	9659	5.16	7894	5.32						
	1150	SQBI	FULL	12755	6.98	11660	7.52	10412	7.89	8682	7.87				
SQBI-300	1750	HDBI	1/2	9014	7.81	8548	8.20	8101	8.58	7648	8.92	7167	9.19	6627	9.36
	1750	SQBI	1/2	10170	11.66	9816	12.15	9464	12.61	9105	13.02	8732	13.39	8334	13.69
	1750	HDBI	3/4	13521	11.71	12821	12.31	12151	12.87	11472	13.37	10750	13.78	9941	14.04
	1750	SQBI	3/4	15254	17.48	14724	18.22	14195	18.91	13658	19.53	13097	20.08	12501	20.53
	1750	HDBI	FULL	18028	15.61	1795	16.41	16201	17.16	15296	17.83	14334	18.37	13254	18.72
	1750	SQBI	FULL	20339	23.31	19632	24.30	18927	25.21	18210	26.04	17463	26.77	16668	27.37
	1150	HDBI	1/2	7756●	3.92	6997●	4.25	6164●	4.47	4992●	4.44				
	1150	SQBI	1/2	8899	5.82	8300	6.22	7661	6.54	6914	6.73	5887	6.67		
	1150	HDBI	3/4	11633	5.88	10495	6.37	9246	6.71	7488	6.67				
	1150	SQBI	3/4	13349	8.73	12450	9.33	11491	9.81	10371	10.09	8831	9.99		
SQBI-300	1150	HDBI	FULL	15511	7.84	13994	8.49	12328	8.95	9984	8.88				
	1150	SQBI	FULL	17798	11.64	16600	12.45	15321	13.08	13828	13.46	11775	13.32		
	1750	HDBI	1/2	12493	13.09	11962	13.64	11460	14.18	10965	14.68	10459	15.12	9927	15.50
	1750	SQBI	1/2	14061	19.61	13667	20.31	13275	20.96	12882	21.57	12482	22.13	12068	22.63
	1750	HDBI	3/4	18740	19.63	17943	20.46	17190	21.26	16447	22.01	15688	22.69	14890	23.25
	1750	SQBI	3/4	21092	29.42	20498	30.46	19912	31.44	19323	32.35	18723	33.19	18102	33.95
	1750	HDBI	FULL	24987	26.18	23925	27.28	22921	28.35	21929	29.35	20918	30.25	19854	31.00
	1750	SQBI	FULL	28122	39.23	27331	40.61	26550	41.92	25764	43.14	24964	44.26	24136	45.26

Continued from page 7

Model	RPM	Wheel Type	Fan Width	15" SP		16" SP		17" SP		18" SP		19" SP		20" SP	
				CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp
SQBI-160	3500	SQBI	1/2	2382	8.65										
	3500	SQBI	3/4	3573	12.97										
	3500	SQBI	FULL	4764	17.30										
SQBI-180	3500	HDBI	1/2	2641	9.64										
	3500	SQBI	1/2	4616	15.51	4454	15.54	4273	15.53	4061	15.46	3797	15.29	3411	14.88
	3500	HDBI	3/4	3961	14.46										
	3500	SQBI	3/4	6924	23.27	6681	23.32	6409	23.30	6091	23.19	5696	22.93	5116	22.32
	3500	HDBI	FULL	5281	19.28										
	3500	SQBI	FULL	9232	31.02	8908	31.09	8545	31.07	8122	30.93	7594	30.58	6821	29.76
SQBI-200	3500	HDBI	1/2	4647	16.41	4353	16.26	3994	15.94	3485	15.26				
	3500	SQBI	1/2	6446	23.73	6301	23.87	6147	23.97	5984	24.05	5807	24.09	5612	24.09
	3500	HDBI	3/4	6971	24.62	6530	24.39	5992	23.91	5228	22.88				
	3500	SQBI	3/4	9669	35.60	9451	35.80	9221	35.96	8975	36.08	8710	36.14	8418	36.14
	3500	HDBI	FULL	9295	32.82	8706	32.52	7989	31.88	6971	30.51				
	3500	SQBI	FULL	12892	47.46	12602	47.73	12295	47.95	11967	48.10	11613	48.19	11224	48.18

Performance shown is for installation AMCA type B Free inlet, ducted outlet. Performance ratings do not include the effects of appurtenances in the airstream.

Direct Drive Ratings Table

7" SP		8" SP		9" SP		10" SP		11" SP		12" SP		13" SP		14" SP		Model	
CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp		
																SQBI-220	
								Minimum Motor Frame Size Required									
3112	5.01							Symbols indicate minimum motor frame required even though the bhp is available in a smaller motor frame size									
																SQBI-240	
4668	7.51																
6224	10.02																
5322	8.62	4663	8.43														
7983	12.94	6995	12.64														
10644	17.25	9326	16.86														
5966	9.36	4956	8.94														
7898	13.90	7400	14.01	6795	13.93	5949	13.50										
8949	14.04	7434	13.41														
11846	20.86	11100	21.01	10192	20.90	8924	20.24										
11933	18.72	9912	17.88														
15795	27.81	14800	28.02	13589	27.87	11899	26.99										
9347	15.78	8685	15.90	7862	15.76	6580	14.96										
11634	23.07	11170	23.42	10663	23.67	10094	23.78	9423	23.68	8563	23.22	7179	21.86				
1421	23.66	13028	23.85	11793	23.64	9870	22.44										
17451	34.60	16755	35.13	15995	35.50	15141	35.66	14134	35.51	12845	34.83	10768	32.78				
18695	31.55	17370	31.80	15724	31.52	13161	29.92										
23267	46.14	22340	46.84	21327	47.34	20188	47.55	18846	47.35	17127	46.44	14357	43.71				

21" SP		22" SP		23" SP		24" SP		Model
CFM	bhp	CFM	bhp	CFM	bhp	CFM	bhp	
								SOBI-160
								SOBI-180
5393	24.03	5136	23.87	4814	23.57	4336	22.91	SOBI-200
8089	36.04	7704	35.81	7220	35.35	6504	34.36	
10785	48.05	10271	47.75	9627	47.13	8672	45.81	

⚠ **CAUTION** All fans and blowers shown have rotating parts and pinch points. Severe personal injury can result if operated without guards. Stay away from rotating equipment unless it is disconnected from its power source.

SQBI-120**Wheel**

Diameter - 13.25"

Outlet ID

Size - 10.6875" x 12"

Area - .89 ft² ID**Inlet OD***

Size - 13.44"

Area - .98 ft² OD

All wheels are Class IIP, SQBI type

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		2 ½" SP		3" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
750	881	714	0.03	1002	0.10	1242	0.18	1463	0.28						
900	1057	857	0.05	1109	0.13	1317	0.22	1513	0.32	1699	0.44				
1050	1233	1000	0.08	1226	0.17	1410	0.27	1584	0.38	1751	0.50	1912	0.63	2067	0.78
1200	1409	1143	0.12	1348	0.22	1515	0.33	1672	0.45	1823	0.58	1969	0.72	2112	0.86
1350	1585	1286	0.16	1474	0.28	1628	0.40	1771	0.53	1908	0.67	2042	0.81	2173	0.97
1500	1761	1429	0.23	1603	0.35	1746	0.49	1878	0.63	2005	0.77	2128	0.93	2249	1.09
1650	1937	1572	0.30	1734	0.44	1868	0.58	1991	0.73	2109	0.89	2223	1.05	2335	1.22
1800	2113	1715	0.39	1866	0.54	1992	0.70	2108	0.86	2219	1.03	2326	1.20	2430	1.38
1950	2290	1857	0.50	2000	0.66	2120	0.83	2229	1.00	2333	1.18	2434	1.36	2532	1.55
2100	2466	2000	0.62	2135	0.80	2249	0.98	2353	1.16	2452	1.35	2547	1.54	2640	1.74
2250	2642	2143	0.76	2270	0.95	2379	1.14	2479	1.34	2573	1.54	2664	1.74	2752	1.95
2400	2818	2286	0.93	2407	1.13	2511	1.33	2606	1.54	2696	1.75	2783	1.96	2867	2.18
2550	2994	2429	1.11	2544	1.33	2643	1.54	2735	1.76	2822	1.98	2905	2.21	2985	2.44
2700	3170	2572	1.32	2681	1.55	2777	1.78	2865	2.01	2948	2.24	3028	2.48	3106	2.72
2850	3346	2715	1.55	2819	1.79	2911	2.03	2996	2.28	3077	2.52	3154	2.77	3228	3.02
3000	3522	2858	1.81	2958	2.06	3046	2.32	3128	2.57	3206	2.83	3281	3.09	3353	3.35
3150	3699	3001	2.09	3096	2.36	3182	2.63	3261	2.89	3337	3.16	3409	3.43	3478	3.71
3300	3875	3143	2.41	3235	2.69	3318	2.97	3395	3.25	3468	3.53	3538	3.81	3605	4.10
3450	4051	3286	2.75	3375	3.04	3455	3.34	3529	3.63	3600	3.92	3668	4.22	3733	4.51
3600	4227	3429	3.13	3514	3.43	3592	3.74	3664	4.04	3733	4.35	3799	4.65	3862	4.96
3750	4403	3572	3.53	3654	3.85	3729	4.17	3799	4.49	3866	4.80	3930	5.12	3992	5.44
3900	4579	3715	3.98	3794	4.31	3867	4.64	3935	4.96	4000	5.29				
4050	4755	3858	4.45	3934	4.80	4005	5.14								
4200	4931	4001	4.96												

Minimum motor frame size is 56

Maximum motor frame size is 213T

Volume CFM	O.V. fpm	4" SP		5" SP		6" SP		7" SP		8" SP		9" SP		10" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
1200	1409	2384	1.19												
1350	1585	2426	1.30	2667	1.67										
1500	1761	2483	1.43	2709	1.81	2927	2.21								
1650	1937	2553	1.58	2765	1.97	2970	2.39	3169	2.83						
1800	2113	2634	1.75	2833	2.15	3026	2.58	3214	3.03	3397	3.51	3576	4.01		
1950	2290	2724	1.94	2910	2.36	3093	2.80	3271	3.26	3445	3.75	3615	4.26	3782	4.79
2100	2466	2821	2.15	2996	2.58	3169	3.04	3337	3.51	3503	4.01	3665	4.53	3825	5.07
2250	2642	2923	2.38	3090	2.83	3253	3.30	3413	3.79	3570	4.30	3725	4.83	3877	5.39
2400	2818	3030	2.63	3188	3.10	3343	3.59	3496	4.10	3646	4.62	3793	5.17	3939	5.73
2550	2994	3141	2.91	3292	3.40	3440	3.90	3585	4.42	3728	4.97	3869	5.53	4008	6.10
2700	3170	3255	3.21	3400	3.72	3541	4.24	3680	4.78	3817	5.34	3951	5.91		
2850	3346	3372	3.53	3511	4.06	3647	4.61	3780	5.16	3911	5.74	4040	6.33		
3000	3522	3491	3.89	3625	4.44	3756	5.00	3883	5.58	4009	6.17				
3150	3699	3612	4.27	3742	4.84	3867	5.42	3990	6.02						
3300	3875	3735	4.68	3860	5.27	3982	5.87								
3450	4051	3859	5.12	3981	5.73										
3600	4227	3985	5.59												

Volume CFM	O.V. fpm	11" SP	
		RPM	bhp
1950	2290	3944	5.34
2100	2466	3981	5.64
2250	2642	4027	5.96

*Inlet OD if optional inlet collar is ordered

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet.
Performance ratings do not include the effects of appurtenances in the airstream.

SQBI-130**Wheel**

Diameter - 14.56"

Outlet ID

Size - 11.75" x 13.25"

Area - 1.08 ft² ID**Inlet OD***

Size - 15.44"

Area - 1.30 ft² OD

All wheels are Class IIP, SQBI type

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		2 ½" SP		3" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
900	867	646	0.03	909	0.12	1128	0.22	1330	0.34						
1100	1060	790	0.06	1017	0.16	1205	0.27	1381	0.40	1548	0.54	1706	0.70		
1300	1252	933	0.10	1135	0.21	1300	0.34	1455	0.47	1604	0.62	1747	0.79	1885	0.96
1500	1445	1077	0.16	1259	0.28	1407	0.42	1546	0.57	1680	0.72	1809	0.90	1935	1.08
1700	1637	1221	0.23	1386	0.37	1522	0.52	1649	0.68	1770	0.85	1888	1.03	2003	1.22
1900	1830	1364	0.32	1517	0.48	1643	0.64	1759	0.82	1870	1.00	1978	1.19	2084	1.39
2100	2023	1508	0.43	1649	0.61	1767	0.79	1875	0.97	1978	1.17	2078	1.37	2176	1.58
2300	2215	1651	0.56	1783	0.76	1894	0.95	1995	1.15	2092	1.36	2185	1.58	2277	1.80
2500	2408	1795	0.72	1918	0.93	2023	1.15	2119	1.36	2210	1.58	2298	1.81	2383	2.05
2700	2601	1938	0.90	2054	1.14	2153	1.37	2245	1.60	2331	1.84	2414	2.08	2495	2.32
2900	2793	2082	1.12	2191	1.37	2285	1.62	2372	1.87	2455	2.12	2534	2.37	2611	2.63
3100	2986	2226	1.37	2329	1.64	2419	1.90	2502	2.17	2581	2.43	2656	2.70	2729	2.98
3300	3179	2369	1.65	2467	1.94	2553	2.22	2633	2.50	2708	2.79	2781	3.07	2851	3.36
3500	3371	2513	1.97	2606	2.27	2688	2.57	2765	2.87	2837	3.17	2907	3.47	2974	3.78
3700	3564	2656	2.32	2745	2.65	2824	2.97	2898	3.28	2968	3.60	3035	3.92	3099	4.24
3900	3757	2800	2.72	2884	3.07	2961	3.40	3032	3.73	3099	4.07	3164	4.40	3226	4.74
4100	3949	2944	3.16	3024	3.52	3098	3.88	3166	4.23	3231	4.58	3294	4.93	3354	5.28
4300	4142	3087	3.65	3165	4.03	3235	4.40	3302	4.77	3365	5.13	3425	5.50	3484	5.87
4500	4334	3231	4.18	3305	4.58	3373	4.97	3437	5.35	3498	5.74	3557	6.12	3614	6.51
4700	4527	3374	4.76	3446	5.18	3512	5.59	3574	5.99	3633	6.39	3690	6.79	3745	7.19
4900	4720	3518	5.40	3587	5.83	3650	6.26	3711	6.68						
5100	4912	3662	6.09	3728	6.54										

Minimum motor frame size is 56

Maximum motor frame size is 213T

Volume CFM	O.V. fpm	4" SP		5" SP		6" SP		7" SP		8" SP		9" SP		10" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
1500	1445	2177	1.48												
1700	1637	2226	1.63	2439	2.09	2642	2.59								
1900	1830	2290	1.82	2488	2.28	2680	2.79	2864	3.33						
2100	2023	2367	2.02	2551	2.51	2731	3.03	2905	3.58	3074	4.16	3239	4.78		
2300	2215	2454	2.26	2626	2.76	2795	3.30	2959	3.86	3119	4.46	3276	5.08	3428	5.74
2500	2408	2550	2.53	2711	3.05	2869	3.60	3024	4.18	3176	4.79	3324	5.42	3470	6.09
2700	2601	2652	2.84	2804	3.38	2953	3.94	3099	4.54	3243	5.16	3384	5.81	3522	6.49
2900	2793	2759	3.17	2903	3.73	3044	4.32	3182	4.93	3319	5.57	3452	6.24	3584	6.93
3100	2986	2871	3.54	3008	4.13	3142	4.74	3273	5.37	3402	6.03	3529	6.71	3655	7.41
3300	3179	2986	3.95	3117	4.56	3244	5.19	3369	5.85	3492	6.53	3614	7.22	3734	7.95
3500	3371	3104	4.40	3229	5.04	3351	5.69	3471	6.37	3588	7.07	3704	7.79		
3700	3564	3224	4.89	3344	5.55	3462	6.23	3576	6.93	3689	7.65				
3900	3757	3347	5.42	3462	6.11	3575	6.82	3685	7.54						
4100	3949	3471	5.99	3583	6.71	3691	7.45								
4300	4142	3596	6.61	3704	7.36										
4500	4334	3723	7.28												

***Inlet OD if optional inlet collar is ordered**

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet.
Performance ratings do not include the effects of appurtenances in the airstream.

Volume CFM	O.V. fpm	11" SP	
		RPM	bhp
2300	2215	3577	6.42
2500	2408	3613	6.78
2700	2601	3659	7.19
2900	2793	3714	7.64

SQBI-150**Wheel**

Diameter - 16.18"

Outlet ID

Size - 13.0625" x 14.625"

Area - 1.33 ft² ID**Inlet OD***

Size - 16.56"

Area - 1.49 ft² OD

All wheels are Class IIP, SQBI type

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		2 ½" SP		3" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
1000	782	523	0.03	779	0.12	992	0.24								
1250	977	654	0.06	871	0.17	1051	0.30	1219	0.45	1377	0.63				
1500	1173	785	0.10	975	0.23	1131	0.38	1279	0.54	1419	0.72	1554	0.92	1683	1.14
1750	1368	916	0.16	1086	0.31	1225	0.47	1356	0.65	1481	0.84	1603	1.05	1721	1.27
2000	1564	1046	0.24	1201	0.41	1328	0.59	1445	0.78	1559	0.98	1669	1.20	1776	1.43
2250	1759	1177	0.34	1319	0.54	1435	0.73	1543	0.94	1647	1.15	1747	1.38	1845	1.63
2500	1955	1308	0.47	1439	0.69	1547	0.90	1647	1.12	1743	1.36	1835	1.60	1926	1.85
2750	2150	1439	0.63	1560	0.86	1662	1.10	1756	1.34	1845	1.59	1931	1.85	2015	2.11
3000	2346	1569	0.81	1683	1.07	1779	1.33	1867	1.59	1951	1.86	2031	2.13	2110	2.41
3250	2541	1700	1.03	1807	1.32	1898	1.59	1981	1.87	2060	2.16	2136	2.45	2210	2.75
3500	2736	1831	1.29	1931	1.60	2018	1.90	2097	2.19	2172	2.50	2244	2.81	2315	3.12
3750	2932	1962	1.59	2056	1.92	2139	2.24	2215	2.56	2286	2.88	2355	3.21	2422	3.54
4000	3127	2093	1.93	2182	2.28	2261	2.62	2333	2.96	2402	3.30	2468	3.65	2532	4.00
4250	3323	2223	2.31	2308	2.68	2384	3.05	2453	3.41	2519	3.78	2583	4.14	2644	4.51
4500	3518	2354	2.74	2435	3.14	2507	3.53	2574	3.91	2638	4.30	2699	4.68	2757	5.07
4750	3714	2485	3.22	2562	3.65	2632	4.06	2696	4.46	2757	4.87	2816	5.27	2873	5.68
5000	3909	2616	3.76	2689	4.20	2756	4.64	2819	5.06	2878	5.49	2934	5.92	2989	6.35
5250	4105	2747	4.35	2817	4.82	2881	5.28	2942	5.73	2999	6.17	3054	6.62	3107	7.07
5500	4300	2877	5.01	2945	5.49	3007	5.97	3065	6.45	3121	6.91	3174	7.38	3225	7.85
5750	4496	3008	5.72	3073	6.23	3133	6.73	3189	7.23	3243	7.72	3295	8.21	3345	8.70
6000	4691	3139	6.50	3201	7.03	3259	7.56	3314	8.07	3366	8.59	3416	9.10		
6250	4887	3270	7.35	3330	7.90	3386	8.45	3439	8.99						
6500	5082	3400	8.26	3459	8.84										

Minimum motor frame size is 56

Maximum motor frame size is 254T

Volume CFM	O.V. fpm	4" SP		5" SP		6" SP		7" SP		8" SP		9" SP		10" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
1750	1368	1946	1.76												
2000	1564	1984	1.94	2181	2.50										
2250	1759	2036	2.15	2220	2.72	2397	3.35	2567	4.01						
2500	1955	2102	2.40	2273	2.99	2439	3.62	2599	4.30	2755	5.02				
2750	2150	2178	2.68	2338	3.29	2493	3.94	2644	4.64	2791	5.37	2935	6.14	3075	6.95
3000	2346	2263	3.01	2412	3.64	2557	4.31	2700	5.02	2839	5.76	2975	6.55	3109	7.37
3250	2541	2354	3.37	2494	4.03	2631	4.72	2765	5.45	2896	6.21	3026	7.01	3153	7.84
3500	2736	2451	3.77	2582	4.46	2712	5.17	2838	5.92	2963	6.71	3086	7.52	3206	8.37
3750	2932	2551	4.22	2676	4.94	2799	5.68	2919	6.45	3037	7.26	3153	8.09	3268	8.96
4000	3127	2655	4.72	2774	5.46	2891	6.23	3005	7.03	3117	7.86	3228	8.72	3337	9.60
4250	3323	2762	5.26	2876	6.04	2987	6.84	3096	7.67	3203	8.52	3309	9.40	3413	10.31
4500	3518	2871	5.86	2980	6.67	3087	7.50	3191	8.36	3293	9.24	3394	10.14		
4750	3714	2982	6.51	3087	7.35	3189	8.22	3289	9.10	3388	10.01				
5000	3909	3095	7.21	3196	8.09	3295	8.99	3391	9.91						
5250	4105	3209	7.97	3307	8.89	3402	9.83								
5500	4300	3324	8.80	3419	9.75										
5750	4496	3441	9.68												

Volume CFM	O.V. fpm	11" SP		12" SP	
		RPM	bhp	RPM	bhp
3000	2346	3239	8.22	3367	9.11
3250	2541	3278	8.71	3400	9.61
3500	2736	3325	9.25	3442	10.16
3750	2932	3382	9.85		
4000	3127	3446	10.52		

*Inlet OD if optional inlet collar is ordered

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet. Performance ratings do not include the effects of appurtenances in the airstream.

SQBI-160

Wheel
Diameter - 17.81"

Outlet ID
Size - 14.375" x 16"
Area - 1.60 ft² ID

Inlet OD*
Size - 18.5625"
Area - 1.88 ft² ID

All wheels are SQBI Type
Class II = light text face above Class IIP
Class IIP = bold text face

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		2 ½" SP		3" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
				Minimum motor frame size is 56 regardless of bhp											
1500	971	588	0.07	787	0.20	952	0.36	1106	0.55	1250	0.76				
1800	1165	706	0.12	880	0.28	1023	0.45	1158	0.65	1287	0.87	1410	1.11	1528	1.38
2100	1359	824	0.19	980	0.37	1107	0.56	1226	0.77	1342	1.00	1453	1.26	1561	1.53
2400	1553	941	0.28	1083	0.49	1199	0.70	1306	0.93	1410	1.17	1511	1.44	1609	1.72
2700	1748	1059	0.40	1189	0.64	1295	0.87	1394	1.12	1489	1.38	1581	1.65	1671	1.95
3000	1942	1177	0.55	1297	0.81	1396	1.07	1487	1.34	1574	1.62	1659	1.91	1742	2.22
3300	2136	1294	0.74	1406	1.02	1499	1.31	1584	1.59	1666	1.89	1744	2.20	1821	2.52
3600	2330	1412	0.96	1516	1.27	1604	1.58	1684	1.89	1761	2.21	1835	2.54	1907	2.88
3900	2524	1530	1.22	1627	1.56	1711	1.89	1787	2.23	1859	2.57	1929	2.91	1996	3.27
4200	2719	1647	1.52	1739	1.89	1818	2.25	1891	2.61	1960	2.97	2026	3.34	2090	3.72
4500	2913	1765	1.87	1852	2.27	1927	2.65	1997	3.04	2062	3.42	2125	3.81	2186	4.21
4800	3107	1883	2.27	1965	2.69	2037	3.11	2103	3.51	2166	3.93	2226	4.34	2285	4.76
5100	3301	2000	2.72	2079	3.17	2147	3.61	2211	4.05	2271	4.48	2329	4.92	2385	5.36
5400	3495	2118	3.23	2192	3.71	2259	4.18	2320	4.64	2378	5.10	2433	5.56	2487	6.03
5700	3690	2236	3.79	2307	4.30	2370	4.80	2429	5.29	2485	5.77	2539	6.26	2591	6.75
6000	3884	2353	4.42	2421	4.96	2482	5.49	2539	6.00	2593	6.51	2645	7.02	2695	7.54
6300	4078	2471	5.12	2536	5.69	2595	6.24	2650	6.78	2702	7.32	2752	7.86	2801	8.39
6600	4272	2589	5.89	2651	6.48	2708	7.06	2761	7.63	2812	8.20	2860	8.76	2907	9.32
6900	4466	2706	6.73	2766	7.35	2821	7.96	2873	8.55	2922	9.15	2969	9.73	3015	10.32
7200	4660	2824	7.65	2882	8.30	2935	8.93	2985	9.55	3032	10.17	3078	10.79	3123	11.40
7500	4855	2942	8.64	2997	9.32	3049	9.98	3097	10.63	3143	11.28				
7800	5049	3060	9.72	3113	10.43										

Volume CFM	O.V. fpm	4" SP		5" SP		6" SP		7" SP		8" SP		9" SP		10" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
2100	1359	1767	2.13												
2400	1553	1799	2.34	1980	3.02										
2700	1748	1845	2.58	2014	3.28	2175	4.04								
3000	1942	1904	2.87	2060	3.59	2212	4.36	2359	5.19	2501	6.06				
3300	2136	1971	3.21	2117	3.94	2259	4.73	2397	5.58	2532	6.47	2664	7.41	2791	8.39
3600	2330	2047	3.59	2183	4.35	2316	5.16	2446	6.02	2574	6.93	2699	7.88	2821	8.88
3900	2524	2128	4.02	2256	4.81	2381	5.65	2504	6.53	2624	7.45	2743	8.42	2859	9.44
4200	2719	2214	4.50	2335	5.32	2453	6.18	2569	7.09	2683	8.04	2795	9.03	2906	10.06
4500	2913	2304	5.03	2419	5.89	2531	6.78	2640	7.71	2749	8.68	2855	9.69	2961	10.74
4800	3107	2397	5.62	2506	6.51	2613	7.44	2717	8.40	2820	9.40	2922	10.43	3022	11.50
5100	3301	2493	6.27	2597	7.20	2699	8.16	2798	9.15	2897	10.18	2993	11.24	3089	12.33
5400	3495	2591	6.97	2691	7.94	2788	8.94	2883	9.97	2977	11.02	3070	12.11		
5700	3690	2690	7.74	2787	8.75	2880	9.79	2972	10.85	3062	11.94				
6000	3884	2792	8.57	2884	9.63	2974	10.70	3062	11.81	3149	12.93				
6300	4078	2894	9.48	2984	10.58	3071	11.69								
6600	4272	2998	10.45	3085	11.60					Minimum motor frame size is 56 (Class II)					
6900	4466	3102	11.50							Maximum motor frame size is 256T (Class IIP)					

Volume CFM	O.V. fpm	11" SP		12" SP	
		RPM	bhp	RPM	bhp
3600	2330	2940	9.92	3057	11.00
3900	2524	2973	10.49	3085	11.59
4200	2719	3015	11.13	3122	12.24
4500	2913	3064	11.83		
4800	3107	3121	12.61		

***Inlet OD if optional inlet collar is ordered**

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet. Performance ratings do not include the effects of appurtenances in the airstream.

SQBI-180**Wheel**

Diameter - 19.68"

Outlet ID

Size - 18.875" x 17.8125"

Area - 1.96 ft² ID**Inlet OD***

Size - 20.5625"

Area - 2.31 ft² ID**All wheels are SQBI Type**

Class II = light text face above Class IIP

Class IIP = bold text face

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		2 ½" SP		3" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
				Minimum motor frame size is 56 regardless of bhp											
2200	1154	600	0.13	747	0.29	870	0.48	991	0.70	1110	0.95	1225	1.24		
2600	1364	709	0.21	839	0.41	946	0.61	1050	0.84	1152	1.10	1253	1.39	1353	1.71
3000	1574	818	0.32	936	0.55	1031	0.78	1122	1.02	1212	1.29	1301	1.59	1389	1.91
3400	1784	927	0.47	1035	0.73	1122	0.98	1204	1.25	1284	1.53	1363	1.83	1441	2.16
3800	1994	1036	0.65	1135	0.95	1216	1.23	1291	1.52	1363	1.82	1435	2.14	1505	2.47
4200	2204	1145	0.88	1237	1.21	1313	1.52	1382	1.84	1449	2.16	1514	2.49	1579	2.85
4600	2414	1255	1.16	1340	1.53	1411	1.87	1476	2.21	1539	2.55	1599	2.91	1659	3.28
5000	2624	1364	1.48	1444	1.89	1511	2.26	1573	2.63	1631	3.00	1688	3.38	1743	3.77
5400	2834	1473	1.87	1548	2.31	1612	2.72	1671	3.12	1726	3.51	1779	3.92	1832	4.33
5800	3044	1582	2.32	1653	2.80	1714	3.24	1770	3.67	1822	4.09	1873	4.52	1923	4.96
6200	3253	1691	2.83	1758	3.35	1817	3.82	1870	4.28	1920	4.74	1969	5.20	2016	5.65
6600	3463	1800	3.41	1864	3.97	1920	4.48	1971	4.97	2019	5.46	2066	5.94	2111	6.43
7000	3673	1909	4.07	1970	4.66	2024	5.21	2073	5.74	2119	6.25	2164	6.77	2207	7.28
7400	3883	2018	4.81	2076	5.44	2128	6.02	2175	6.58	2220	7.13	2263	7.68	2304	8.22
7800	4093	2127	5.64	2183	6.30	2232	6.92	2278	7.51	2321	8.10	2363	8.67	2403	9.25
8200	4303	2236	6.55	2289	7.25	2337	7.90	2381	8.53	2423	9.15	2463	9.76	2502	10.36
8600	4513	2345	7.55	2396	8.29	2442	8.98	2485	9.65	2526	10.30	2565	10.94	2602	11.58
9000	4723	2454	8.66	2503	9.43	2548	10.16	2589	10.86	2629	11.55	2667	12.22	2703	12.89
9400	4933	2564	9.87	2611	10.67	2654	11.44	2694	12.18	2732	12.90	2769	13.60	2804	14.30
9800	5143	2673	11.18	2718	12.02	2760	12.83	2799	13.60	2836	14.36				

Volume CFM	O.V. fpm	4" SP		5" SP		6" SP		7" SP		8" SP		9" SP		10" SP		
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	
3000	1574	1562	2.63	1728	3.45											
3400	1784	1597	2.89	1749	3.71	1898	4.62									
3800	1994	1646	3.21	1785	4.04	1922	4.95	2056	5.93	2186	6.99					
4200	2204	1707	3.60	1834	4.44	1959	5.35	2084	6.34	2206	7.40	2326	8.52	2443	9.71	
4600	2414	1776	4.06	1893	4.91	2008	5.83	2123	6.83	2237	7.89	2350	9.01	2460	10.21	
5000	2624	1852	4.59	1960	5.46	2067	6.40	2174	7.40	2279	8.47	2385	9.60	2489	10.79	
5400	2834	1934	5.18	2034	6.08	2134	7.04	2233	8.06	2331	9.14	2429	10.27	2527	11.47	
5800	3044	2019	5.85	2113	6.79	2206	7.77	2299	8.81	2391	9.90	2483	11.05	2574	12.25	
6200	3253	2107	6.59	2196	7.57	2284	8.59	2371	9.65	2458	10.76	2544	11.93	2630	13.14	
6600	3463	2198	7.42	2282	8.43	2365	9.49	2448	10.58	2529	11.72	2611	12.90	2692	14.14	
7000	3673	2290	8.32	2371	9.38	2450	10.48	2528	11.61	2606	12.77	2683	13.98	2759	15.24	
7400	3883	2384	9.31	2462	10.42	2538	11.56	2612	12.72	2686	13.93	2759	15.17	2832	16.44	
7800	4093	2480	10.39	2554	11.55	2627	12.73	2698	13.94	2769	15.18	2839	16.45			
8200	4303	2577	11.57	2649	12.78	2718	14.01	2787	15.26	Minimum motor frame size is 254T (Class II)						
8600	4513	2674	12.84	2744	14.11	2811	15.39	Maximum motor frame size is 256T (Class IIP)								
9000	4723	2773	14.21	2840	15.53											

Volume CFM	O.V. fpm	11" SP		12" SP		13" SP	
		RPM	bhp	RPM	bhp	RPM	bhp
4600	2414	2569	11.46	2676	12.77		
5000	2624	2592	12.04	2693	13.35	2793	14.72
5400	2834	2624	12.73	2720	14.04	2815	15.41
5800	3044	2666	13.52	2756	14.83	2846	16.20
6200	3253	2716	14.41	2801	15.73		
6600	3463	2773	15.42				
7000	3673	2836	16.54				

***Inlet OD if optional inlet collar is ordered**

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet. Performance ratings do not include the effects of appurtenances in the airstream.

Belt Drive Ratings Table – at 70°F | .075 density | sea level

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SQBI-200

Wheel

Diameter - 21.56"

Outlet ID

Size - 17.375" x 19.5625"

Area - 2.35 ft² ID

Inlet OD*

Size - 22.5625"

Area - 2.78 ft² ID

All wheels are SQBI Type

Class II = light text face above Class IIP

Class IIP = bold text face

Class III = italic face below Class IIP

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		3" SP		4" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
2600	1139	545	0.15	Minimum motor frame size is 56 regardless of bhp											
3000	1315	629	0.23	751	0.45	852	0.69	949	0.96	1046	1.27	1234	2.00		
3400	1490	713	0.33	824	0.59	915	0.85	1003	1.13	1088	1.45	1258	2.18	1423	3.04
3800	1665	797	0.46	900	0.75	983	1.04	1062	1.34	1140	1.66	1293	2.41	1444	3.27
4200	1841	880	0.62	976	0.95	1054	1.26	1127	1.58	1198	1.92	1337	2.69	1475	3.56
4600	2016	964	0.81	1054	1.18	1127	1.52	1195	1.86	1261	2.22	1389	3.01	1515	3.89
5000	2191	1048	1.05	1132	1.44	1202	1.81	1265	2.18	1327	2.57	1446	3.39	1563	4.29
5400	2367	1132	1.32	1211	1.75	1277	2.15	1338	2.55	1395	2.95	1507	3.81	1616	4.74
5800	2542	1216	1.63	1291	2.10	1354	2.53	1411	2.96	1466	3.39	1571	4.29	1673	5.25
6200	2717	1300	1.99	1371	2.50	1431	2.96	1486	3.42	1538	3.88	1638	4.82	1734	5.81
6600	2892	1384	2.40	1451	2.95	1509	3.45	1562	3.93	1611	4.42	1706	5.41	1798	6.44
7000	3068	1467	2.87	1532	3.45	1587	3.98	1638	4.50	1686	5.01	1777	6.05	1864	7.13
7400	3243	1551	3.39	1613	4.00	1666	4.57	1715	5.12	1761	5.67	1849	6.76	1932	7.88
7800	3418	1635	3.97	1694	4.62	1746	5.22	1793	5.81	1837	6.38	1921	7.53	2002	8.70
8200	3594	1719	4.61	1776	5.30	1825	5.94	1871	6.56	1914	7.16	1995	8.37	2073	9.59
8600	3769	1803	5.32	1857	6.05	1905	6.72	1950	7.37	1991	8.01	2070	9.27	2145	10.54
9000	3944	1887	6.10	1939	6.86	1986	7.57	2028	8.25	2069	8.93	2145	10.25	2218	11.58
9400	4119	1971	6.95	2021	7.75	2066	8.49	2108	9.21	2147	9.92	2221	11.30	2291	12.68
9800	4295	2054	7.87	2103	8.71	2147	9.49	2187	10.25	2225	10.98	2298	12.43	2366	13.87
10200	4470	2138	8.88	2185	9.75	2228	10.57	2267	11.36	2304	12.13	2374	13.64	2441	15.14
10600	4645	2222	9.96	2268	10.87	2309	11.73	2347	12.55	2383	13.36	2452	14.94	2516	16.49
11000	4821	2306	11.13	2350	12.08	2390	12.97	2427	13.83	2463	14.67	2529	16.32	2593	17.94
11400	4996	2390	12.39	2432	13.37	2471	14.30	2508	15.20	2542	16.08	2607	17.79	2669	19.47
11800	5171	2474	13.74	2515	14.76	2553	15.73	2588	16.66	2622	17.57	2686	19.35	2746	21.09
12200	5347	2558	15.19	2598	16.24	2634	17.25	2669	18.22	2702	19.16	2764	21.01	2823	22.82

Volume CFM	O.V. fpm	5" SP		6" SP		7" SP		8" SP		9" SP		10" SP		11" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
3800	1665	1590	4.25												
4200	1841	1611	4.54	1744	5.62										
4600	2016	1641	4.88	1765	5.96	1886	7.14	2005	8.40						
5000	2191	1679	5.28	1794	6.37	1908	7.55	2020	8.81	2130	10.15				
5400	2367	1724	5.75	1831	6.85	1938	8.03	2044	9.29	2148	10.63	2250	12.05	2351	13.54
5800	2542	1774	6.28	1875	7.39	1975	8.58	2074	9.85	2173	11.19	2270	12.61	2366	14.11
6200	2717	1829	6.87	1924	8.00	2018	9.20	2111	10.48	2204	11.83	2296	13.25	2388	14.75
6600	2892	1888	7.53	1977	8.68	2066	9.90	2154	11.19	2242	12.55	2329	13.98	2416	15.48
7000	3068	1950	8.25	2034	9.43	2118	10.68	2201	11.98	2284	13.35	2367	14.79	2450	16.29
7400	3243	2014	9.04	2094	10.26	2174	11.53	2253	12.85	2332	14.24	2410	15.69	2489	17.20
7800	3418	2080	9.90	2156	11.15	2232	12.45	2308	13.80	2383	15.21	2458	16.68	2532	18.20
8200	3594	2148	10.84	2221	12.12	2294	13.46	2366	14.84	2438	16.27	2509	17.75	2580	19.30
8600	3769	2217	11.84	2288	13.17	2357	14.54	2426	15.95	2495	17.41	2563	18.92	2631	20.48
9000	3944	2287	12.92	2356	14.29	2423	15.70	2489	17.15	2555	18.64	2620	20.18	2686	21.76
9400	4119	2359	14.08	2425	15.50	2490	16.95	2554	18.44	2617	19.96	2680	21.53	2743	23.14
9800	4295	2431	15.32	2495	16.79	2558	18.28	2620	19.81	2681	21.37	2741	22.97	2802	24.61
10200	4470	2505	16.64	2567	18.16	2627	19.70	2687	21.27	2746	22.87	2805	24.51	2863	26.18
10600	4645	2578	18.05	2639	19.62	2698	21.21	2756	22.83	2813	24.47	2870	26.14	2926	27.85
11000	4821	2653	19.55	2712	21.18	2769	22.82	2825	24.48	2881	26.16	2936	27.88	2991	29.62
11400	4996	2728	21.14	2785	22.82	2841	24.51	2896	26.22	2950	27.95				
11800	5171	2804	22.83	2860	24.56	2914	26.31	2968	28.07						
12200	5347	2880	24.61	2934	26.41	2988	28.20								

Volume CFM	O.V. fpm	12" SP		13" SP		14" SP		15" SP		16" SP		17" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
5800	2542	2461	15.67										
6200	2717	2478	16.31	2568	17.94	2656	19.63						
6600	2892	2502	17.04	2588	18.67	2672	20.36	2756	22.12	2838	23.93		
7000	3068	2532	17.86	2613	19.49	2694	21.19	2774	22.94	2854	24.76	2932	26.63
7400	3243	2567	18.78	2645	20.41	2722	22.11	2799	23.87	2875	25.68	2951	27.56
7800	3418	2607	19.79	2681	21.43	2755	23.13	2829	24.89	2902	26.71	2974	28.58
8200	3594	2651	20.89	2722	22.55	2793	24.26	2863	26.02	2933	27.84		
8600	3769	2699	22.10	2767	23.76	2835	25.48	2902	27.26	2969	29.09		
9000	3944	2751	23.40	2816	25.08	2880	26.82	2945	28.60				
9400	4119	2805	24.80	2867	26.50	2929	28.25						
9800	4295	2862	26.30	2922	28.02	2982	29.80						
10200	4470	2921	27.90	2979	29.65								
10600	4645	2982	29.60										

*Inlet OD if optional inlet collar is ordered

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet. Performance ratings do not include the effects of appurtenances in the airstream.

Maximum motor frame size = 256T (Class II)
Maximum motor frame size = 286T (Class IIP)
Maximum motor frame size = 324T (Class III)

SQBI-220**Wheel**

Diameter - 24"

Outlet ID

Size - 19.375" x 21.625"

Area - 2.91 ft² ID**Inlet OD***

Size - 24.5625"

Area - 3.29 ft² ID**All wheels are SQBI Type**

Class II = light text face above Class IIP

Class IIP = bold text face*Class III = italic face below Class IIP*

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		3" SP		4" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
		Minimum motor frame size is 143T regardless of bhp													
3600	1268	535	0.24	653	0.53	756	0.86	854	1.22	949	1.63	1128	2.57		
4200	1479	624	0.38	729	0.72	819	1.08	905	1.47	990	1.91	1152	2.88	1304	3.99
4800	1691	713	0.57	808	0.96	889	1.35	966	1.78	1041	2.24	1187	3.25	1327	4.40
5400	1902	802	0.81	888	1.24	962	1.68	1032	2.15	1100	2.63	1232	3.70	1361	4.88
6000	2114	891	1.12	970	1.60	1039	2.08	1103	2.58	1165	3.10	1286	4.22	1404	5.45
6600	2325	980	1.48	1053	2.01	1117	2.54	1177	3.08	1234	3.64	1346	4.83	1455	6.10
7200	2536	1069	1.93	1137	2.51	1197	3.08	1253	3.66	1307	4.26	1410	5.51	1511	6.85
7800	2748	1158	2.45	1222	3.08	1278	3.70	1331	4.32	1381	4.96	1479	6.29	1573	7.69
8400	2959	1247	3.06	1307	3.74	1360	4.41	1410	5.08	1458	5.76	1550	7.16	1638	8.63
9000	3170	1337	3.76	1393	4.49	1443	5.21	1491	5.92	1536	6.65	1623	8.13	1707	9.67
9600	3382	1426	4.57	1479	5.35	1527	6.11	1572	6.87	1615	7.64	1698	9.21	1777	10.82
10200	3593	1515	5.48	1565	6.31	1611	7.12	1654	7.93	1695	8.74	1774	10.39	1850	12.09
10800	3804	1604	6.50	1652	7.38	1695	8.24	1737	9.10	1776	9.96	1852	11.70	1924	13.47
11400	4016	1693	7.65	1738	8.58	1780	9.49	1820	10.39	1858	11.30	1931	13.12	2000	14.98
12000	4227	1782	8.92	1825	9.90	1866	10.86	1904	11.81	1940	12.77	2010	14.68	2077	16.62
12600	4438	1871	10.33	1913	11.35	1951	12.36	1988	13.37	2023	14.37	2091	16.38	2155	18.40
13200	4650	1960	11.88	2000	12.95	2037	14.01	2072	15.06	2107	16.11	2172	18.21	2234	20.33
13800	4861	2049	13.57	2087	14.70	2123	15.80	2157	16.90	2190	18.00	2253	20.19	2314	22.40
14400	5072	2139	15.42	2175	16.59	2210	17.75	2243	18.90	2274	20.05	2336	22.33	<i>2394</i>	<i>24.63</i>
15000	5284	2228	17.43	2263	18.65	2296	19.86	2328	21.06	2359	22.25	<i>2418</i>	<i>24.64</i>	<i>2475</i>	<i>27.02</i>
15600	5495	2317	19.60	2351	20.88	2383	22.14	2414	23.38	2444	24.63	2501	27.10	2556	29.59
16200	5707	2406	21.95	2438	23.28	2470	24.59	2500	25.88	2529	27.17	2585	29.75	2638	32.32

Volume CFM	O.V. fpm	5" SP		6" SP		7" SP		8" SP		9" SP		10" SP		11" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
4200	1479	1446	5.21												
4800	1691	1461	5.65	1588	7.02										
5400	1902	1486	6.17	1605	7.57	1721	9.06	1831	10.64						
6000	2114	1519	6.78	1632	8.21	1740	9.74	1846	11.35	1948	13.05	2047	14.82		
6600	2325	1561	7.48	1666	8.95	1768	10.51	1868	12.16	1966	13.89	2061	15.70	2153	17.58
7200	2536	1611	8.27	1708	9.79	1804	11.39	1898	13.07	1991	14.84	2081	16.68	2170	18.59
7800	2748	1665	9.17	1757	10.73	1847	12.37	1936	14.10	2023	15.90	2109	17.78	2194	19.72
8400	2959	1725	10.17	1811	11.78	1895	13.48	1979	15.24	2062	17.08	2143	19.00	2224	20.98
9000	3170	1788	11.28	1869	12.95	1949	14.69	2028	16.51	2106	18.39	2183	20.35	2260	22.37
9600	3382	1855	12.50	1931	14.23	2007	16.03	2082	17.90	2156	19.83	2229	21.83	2302	23.90
10200	3593	1924	13.83	1997	15.64	2068	17.50	2139	19.42	2209	21.41	2279	23.45	2348	25.57
10800	3804	1995	15.29	2064	17.17	2133	19.09	2200	21.08	2267	23.12	2333	25.22	2399	27.38
11400	4016	2068	16.88	2134	18.83	2199	20.82	2264	22.87	2328	24.97	2391	27.13	2454	29.34
12000	4227	2142	18.60	2206	20.62	2268	22.69	2330	24.81	2391	26.97	2452	29.19	2512	31.46
12600	4438	2218	20.47	2279	22.56	2339	24.70	2399	26.89	2457	29.12	2515	31.40	2573	33.73
13200	4650	2295	22.47	2354	24.65	2412	26.87	2469	29.13	2525	31.43	2581	33.77	2637	36.16
13800	4861	2372	24.63	2429	26.89	2485	29.19	2540	31.52	2595	33.89	2649	36.31		
14400	5072	2451	26.95	2506	29.29	2560	31.67	2613	34.08						
15000	5284	2530	29.43	2583	31.86	2636	34.32								
15600	5495	2610	32.08	2662	34.60										

Volume CFM	O.V. fpm	12" SP		13" SP		14" SP		15" SP		16" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
6600	2325	2242	19.52								
7200	2536	2256	20.58	2341	22.63	2423	24.74	2504	26.92		
7800	2748	2277	21.74	2358	23.83	2438	25.98	2516	28.19	2593	30.46
8400	2959	2303	23.04	2381	25.16	2458	27.34	2534	29.59	2608	31.89
9000	3170	2336	24.46	2410	26.62	2484	28.84	2557	31.12	2629	33.46
9600	3382	2374	26.03	2445	28.22	2516	30.48	2586	32.79	2655	35.17
10200	3593	2417	27.74	2485	29.97	2553	32.27	2620	34.62		
10800	3804	2465	29.60	2530	31.87	2594	34.21	2659	36.60		
11400	4016	2517	31.61	2579	33.93	2641	36.31	Maximum motor frame size = 256T (C			
12000	4227	2572	33.78	2632	36.15	Maximum motor frame size = 286T (C					
12600	4438	2631	36.11	Maximum motor frame size = 324T (C							

*Inlet OD if optional inlet collar is ordered

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet. Performance ratings do not include the effects of appurtenances in the airstream.

Belt Drive Ratings Table – at 70°F | .075 density | sea level

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SQBI-240

Wheel

Diameter - 26.44"

Outlet ID

Size - 21.3125" x 23.8175"

Area - 3.52 ft² ID

Inlet OD*

Size - 27.5625"

Area - 4.14 ft² ID

All wheels are SQBI Type

Class II = light text face above Class IIP

Class IIP = bold text face

Class III = italic face below Class IIP

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		3" SP		4" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
		Minimum motor frame size is 143T regardless of bhp													
4200	1219	467	0.26	578	0.60	674	0.99	766	1.42	855	1.92	1021	3.05	1171	4.34
5000	1451	555	0.44	652	0.84	735	1.27	815	1.74	893	2.26	1042	3.44	1182	4.78
5800	1683	644	0.68	730	1.15	804	1.63	875	2.14	943	2.70	1076	3.93	1204	5.32
6600	1915	733	1.01	811	1.54	878	2.07	941	2.63	1002	3.23	1122	4.53	1238	5.97
7400	2147	822	1.42	893	2.01	954	2.61	1012	3.22	1068	3.86	1176	5.24	1282	6.74
8200	2379	911	1.93	976	2.59	1033	3.24	1086	3.91	1137	4.60	1237	6.06	1333	7.63
9000	2611	1000	2.56	1060	3.28	1113	3.99	1163	4.72	1210	5.46	1302	7.02	1392	8.67
9800	2844	1089	3.30	1144	4.09	1194	4.87	1241	5.65	1285	6.45	1371	8.10	1454	9.84
10600	3076	1177	4.18	1230	5.03	1277	5.87	1320	6.72	1363	7.57	1443	9.33	1521	11.16
11400	3308	1266	5.19	1315	6.12	1360	7.02	1401	7.93	1441	8.84	1517	10.71	1591	12.64
12200	3540	1355	6.37	1401	7.35	1443	8.33	1483	9.29	1521	10.27	1593	12.25	1663	14.28
13000	3772	1444	7.70	1487	8.76	1527	9.79	1565	10.83	1601	11.86	1670	13.95	1737	16.09
13800	4004	1533	9.21	1574	10.33	1612	11.44	1648	12.53	1683	13.63	1749	15.84	1812	18.09
14600	4236	1622	10.91	1661	12.10	1697	13.27	1732	14.43	1765	15.58	1828	17.92	1889	20.28
15400	4468	1711	12.80	1748	14.06	1783	15.29	1816	16.52	1848	17.74	1909	20.19	1967	22.67
16200	4701	1799	14.90	1835	16.22	1868	17.52	1900	18.81	1931	20.10	1990	22.68	2046	25.27
17000	4933	1888	17.22	1922	18.61	1954	19.98	1985	21.33	2014	22.68	2071	25.38	2125	28.10
17800	5165	1977	19.77	2010	21.22	2040	22.66	2070	24.08	2099	25.49	2153	28.32	2206	31.16
18600	5397	2066	22.56	2097	24.08	2127	25.58	2155	27.06	2183	28.54	2236	31.50	2287	34.46

Volume CFM	O.V. fpm	5" SP		6" SP		7" SP		8" SP		9" SP		10" SP		11" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
5000	1451	1312	6.26	1433	7.86										
5800	1683	1326	6.84	1441	8.49	1551	10.26	1655	12.13						
6600	1915	1350	7.54	1459	9.23	1563	11.05	1663	12.97	1759	14.98	1851	17.09		
7400	2147	1385	8.36	1486	10.10	1583	11.96	1678	13.93	1770	15.99	1859	18.15	1945	20.39
8200	2379	1428	9.32	1522	11.12	1613	13.02	1702	15.03	1790	17.14	1875	19.35	1958	21.64
9000	2611	1479	10.42	1566	12.28	1651	14.24	1735	16.30	1817	18.45	1898	20.70	1977	23.04
9800	2844	1536	11.67	1617	13.59	1696	15.61	1774	17.73	1852	19.93	1928	22.23	2003	24.62
10600	3076	1598	13.07	1673	15.07	1747	17.16	1821	19.33	1893	21.60	1965	23.95	2036	26.38
11400	3308	1663	14.64	1733	16.72	1803	18.88	1872	21.12	1941	23.45	2009	25.86	2076	28.34
12200	3540	1731	16.37	1798	18.54	1863	20.78	1929	23.10	1993	25.49	2057	27.97	2121	30.51
13000	3772	1801	18.29	1865	20.55	1927	22.88	1989	25.27	2050	27.74	2111	30.28	2171	32.89
13800	4004	1874	20.39	1934	22.75	1993	25.16	2052	27.64	2110	30.19	2168	32.81	2225	35.49
14600	4236	1948	22.69	2006	25.14	2062	27.66	2118	30.23	2174	32.86	2229	35.55	2283	38.31
15400	4468	2023	25.19	2079	27.75	2133	30.36	2187	33.02	2240	35.74	2292	38.52	2344	41.36
16200	4701	2100	27.90	2153	30.57	2205	33.28	2257	36.05	2308	38.86	2358	41.73	2408	44.65
17000	4933	2178	30.84	2229	33.62	2279	36.44	2329	39.30	2377	42.21				
17800	5165	2256	34.02	2306	36.91	2354	39.83	2402	42.80						
18600	5397	2336	37.44	2383	40.44										

Volume CFM	O.V. fpm	12" SP		13" SP		14" SP		15" SP		16" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
7400	2147	2029	22.72	2110	25.13						
8200	2379	2038	24.02	2117	26.47	2193	29.01	2268	31.61	2340	34.29
9000	2611	2054	25.46	2130	27.97	2204	30.55	2276	33.21	2347	35.94
9800	2844	2077	27.09	2149	29.64	2221	32.27	2291	34.97	2359	37.75
10600	3076	2106	28.90	2176	31.50	2244	34.17	2311	36.92	2377	39.74
11400	3308	2142	30.91	2208	33.56	2273	36.28	2337	39.08	2401	41.94
12200	3540	2184	33.14	2246	35.83	2308	38.61	2370	41.45		
13000	3772	2231	35.58	2290	38.33	2349	41.16	2408	44.06		
13800	4004	2282	38.24	2339	41.06	2395	43.94	Maximum motor frame size = 284T (Class II)			
14600	4236	2337	41.13	2391	44.02	Maximum motor frame size = 324T (Class IIP)					
15400	4468	2396	44.26					Maximum motor frame size = 326T (Class III)			

*Inlet OD if optional inlet collar is ordered

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet. Performance ratings do not include the effects of appurtenances in the airstream.

SQBI-270**Wheel**

Diameter - 29.13"

Outlet OD

Size - 23.5" x 26.25"

Area - 4.28 ft² ID**Inlet OD***

Size - 30.5625"

Area - 5.09 ft² ID**All wheels are SQBI Type**

Class II = light text face above Class IIP

Class IIP = bold text face*Class III = italic face below Class IIP*

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		3" SP		4" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
						Minimum motor frame size is 143T regardless of bhp									
5400	1286	448	0.38	545	0.81	628	1.29	708	1.84	785	2.45	931	3.83		
6200	1477	515	0.57	601	1.06	676	1.59	747	2.18	816	2.81	949	4.25	1075	5.88
7000	1667	581	0.82	660	1.38	727	1.96	791	2.58	854	3.25	975	4.74	1092	6.42
7800	1858	648	1.13	720	1.75	782	2.39	840	3.06	897	3.77	1008	5.33	1116	7.06
8600	2049	714	1.51	781	2.20	839	2.89	893	3.62	945	4.37	1047	6.00	1147	7.79
9400	2239	781	1.98	843	2.73	897	3.48	947	4.26	996	5.06	1090	6.77	1183	8.63
10200	2430	847	2.52	905	3.34	956	4.16	1003	4.99	1049	5.84	1137	7.64	1223	9.57
11000	2620	914	3.17	968	4.05	1016	4.93	1061	5.81	1104	6.72	1187	8.61	1267	10.62
11800	2811	980	3.91	1031	4.86	1077	5.80	1119	6.74	1160	7.71	1238	9.70	1314	11.80
12600	3001	1046	4.76	1095	5.78	1138	6.78	1179	7.78	1217	8.80	1292	10.90	1364	13.09
13400	3192	1113	5.72	1159	6.81	1200	7.87	1239	8.94	1276	10.02	1347	12.22	1415	14.51
14200	3383	1179	6.81	1223	7.96	1262	9.09	1299	10.22	1335	11.36	1403	13.67	1468	16.06
15000	3573	1246	8.03	1287	9.24	1325	10.44	1361	11.63	1395	12.83	1460	15.26	1522	17.75
15800	3764	1312	9.38	1352	10.67	1388	11.93	1422	13.18	1455	14.44	1518	16.98	1578	19.58
16600	3954	1379	10.88	1416	12.23	1451	13.56	1484	14.88	1516	16.19	1576	18.86	1634	21.57
17400	4145	1445	12.53	1481	13.95	1515	15.34	1547	16.72	1577	18.10	1636	20.89	1691	23.71
18200	4335	1512	14.34	1546	15.82	1579	17.28	1609	18.73	1639	20.17	1695	23.08	1749	26.01
19000	4526	1578	16.32	1611	17.87	1643	19.39	1672	20.90	1701	22.41	1755	25.44	1808	28.49
19800	4717	1644	18.47	1677	20.08	1707	21.67	1735	23.25	1763	24.82	1816	27.97	1867	31.14
20600	4907	1711	20.80	1742	22.48	1771	24.13	1799	25.78	1826	27.41	1877	30.69	1926	33.98
21400	5098	1777	23.32	1807	25.06	1835	26.79	1862	28.49	1889	30.20	1939	33.59	<i>1986</i>	<i>37.01</i>
22200	5288	1844	26.03	1873	27.84	1900	29.63	1926	31.41	1952	33.17	<i>2000</i>	<i>36.70</i>	<i>2047</i>	<i>40.23</i>

Volume CFM	O.V. fpm	5" SP		6" SP		7" SP		8" SP		9" SP		10" SP		11" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
6200	1477	1192	7.68												
7000	1667	1203	8.27	1308	10.27										
7800	1858	1220	8.95	1320	11.00	1415	13.19	1507	15.50						
8600	2049	1244	9.74	1338	11.83	1429	14.06	1517	16.43	1602	18.91				
9400	2239	1273	10.63	1361	12.77	1448	15.05	1532	17.46	1614	19.99	1693	22.63	1770	25.38
10200	2430	1308	11.63	1391	13.83	1472	16.16	1552	18.62	1630	21.19	1706	23.88	1781	26.68
11000	2620	1347	12.76	1425	15.02	1501	17.40	1577	19.91	1651	22.53	1724	25.27	1796	28.11
11800	2811	1389	14.01	1462	16.33	1535	18.78	1607	21.34	1677	24.01	1747	26.79	1815	29.68
12600	3001	1434	15.38	1504	17.78	1572	20.29	1640	22.91	1707	25.64	1774	28.47	1839	31.41
13400	3192	1482	16.89	1548	19.37	1613	21.95	1678	24.63	1741	27.42	1805	30.31	1867	33.30
14200	3383	1532	18.53	1595	21.10	1657	23.75	1718	26.51	1779	29.36	1839	32.31	1899	35.36
15000	3573	1583	20.32	1643	22.97	1702	25.71	1761	28.54	1819	31.46	1877	34.48	1934	37.59
15800	3764	1636	22.25	1694	25.00	1750	27.82	1806	30.73	1862	33.73	1917	36.82	<i>1971</i>	<i>39.99</i>
16600	3954	1690	24.34	1746	27.18	1800	30.10	1854	33.09	1907	36.17	1959	39.33	<i>2012</i>	<i>42.57</i>
17400	4145	1746	26.59	1799	29.53	1851	32.54	1902	35.62	1954	38.78	<i>2004</i>	<i>42.02</i>	<i>2055</i>	<i>45.34</i>
18200	4335	1802	29.00	1853	32.04	1903	35.15	1953	38.33	<i>2002</i>	<i>41.58</i>	<i>2051</i>	<i>44.90</i>	<i>2099</i>	<i>48.29</i>
19000	4526	1858	31.59	1908	34.74	1957	37.94	<i>2005</i>	<i>41.22</i>	<i>2052</i>	<i>44.55</i>	<i>2099</i>	<i>47.96</i>	<i>2146</i>	<i>51.44</i>
19800	4717	1916	34.35	<i>1964</i>	<i>37.61</i>	<i>2011</i>	<i>40.92</i>	<i>2057</i>	<i>44.29</i>	<i>2103</i>	<i>47.72</i>	<i>2149</i>	<i>51.22</i>		
20600	4907	<i>1974</i>	<i>37.30</i>	<i>2021</i>	<i>40.67</i>	<i>2066</i>	<i>44.09</i>	<i>2111</i>	<i>47.56</i>	<i>2156</i>	<i>51.09</i>				
21400	5098	<i>2033</i>	<i>40.45</i>	<i>2078</i>	<i>43.93</i>	<i>2122</i>	<i>47.45</i>	<i>2166</i>	<i>51.03</i>						
22200	5288	<i>2092</i>	<i>43.79</i>	<i>2136</i>	<i>47.39</i>	<i>2179</i>	<i>51.02</i>								

Volume CFM	O.V. fpm	12" SP		13" SP		14" SP		15" SP		16" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
10200	2430	1853	29.58	1924	32.58						
11000	2620	1866	31.05	1934	34.10	<i>2001</i>	<i>37.24</i>	<i>2067</i>	<i>40.47</i>	<i>2131</i>	<i>43.78</i>
11800	2811	1883	32.67	1949	35.77	<i>2014</i>	<i>38.95</i>	<i>2078</i>	<i>42.23</i>	<i>2140</i>	<i>45.59</i>
12600	3001	1904	34.45	<i>1967</i>	<i>37.59</i>	<i>2030</i>	<i>40.82</i>	<i>2092</i>	<i>44.14</i>	<i>2153</i>	<i>47.55</i>
13400	3192	1929	36.39	<i>1990</i>	<i>39.57</i>	<i>2050</i>	<i>42.85</i>	<i>2110</i>	<i>46.22</i>	<i>2169</i>	<i>49.68</i>
14200	3383	1958	38.50	<i>2017</i>	<i>41.73</i>	<i>2075</i>	<i>45.06</i>	<i>2132</i>	<i>48.48</i>	<i>2189</i>	<i>51.98</i>
15000	3573	<i>1990</i>	<i>40.78</i>	<i>2046</i>	<i>44.07</i>	<i>2102</i>	<i>47.45</i>	<i>2157</i>	<i>50.91</i>		
15800	3764	<i>2026</i>	<i>43.25</i>	<i>2080</i>	<i>46.59</i>	<i>2133</i>	<i>50.03</i>	<i>2186</i>	<i>53.54</i>		
16600	3954	<i>2064</i>	<i>45.90</i>	<i>2116</i>	<i>49.30</i>	<i>2167</i>	<i>52.80</i>				
17400	4145	<i>2105</i>	<i>48.73</i>	<i>2154</i>	<i>52.21</i>						
18200	4335	<i>2147</i>	<i>51.76</i>								

***Inlet OD if optional inlet collar is ordered**

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet. Performance ratings do not include the effects of appurtenances in the airstream.

Maximum motor frame size = 324T (Class II)

Maximum motor frame size = 324T (Class IIP)*Maximum motor frame size = 364T (Class III)*

Belt Drive Ratings Table – at 70°F | .075 density | sea level

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SQBI-300

Wheel

Diameter - 32.38"

Outlet OD

Size - 26.125" x 29.1875"

Area - 5.3 ft² ID

Inlet OD*

Size - 33.5625"

Area - 6.14 ft² ID

All wheels are SQBI Type

Class II = light text face above Class IIP

Class IIP = bold text face

Class III = italic face below Class IIP

Volume CFM	O.V. fpm	0" SP		½" SP		1" SP		1 ½" SP		2" SP		3" SP		4" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
		Minimum motor frame size is 143T regardless of bhp													
6000	1156	363	0.34	457	0.83	539	1.39	617	2.03	692	2.76	831	4.44		
7000	1349	423	0.54	507	1.10	579	1.71	648	2.40	715	3.16	842	4.90	960	6.88
8000	1542	484	0.80	559	1.44	623	2.11	685	2.85	745	3.65	861	5.45	971	7.48
9000	1735	544	1.14	613	1.86	672	2.60	727	3.39	782	4.24	887	6.11	989	8.20
10000	1927	605	1.56	668	2.36	722	3.17	773	4.02	823	4.92	919	6.87	1013	9.04
11000	2120	665	2.07	723	2.96	774	3.84	821	4.75	867	5.71	956	7.76	1043	10.00
12000	2313	726	2.69	780	3.66	827	4.61	872	5.60	914	6.61	997	8.77	1078	11.10
13000	2506	786	3.42	837	4.47	881	5.50	923	6.56	963	7.64	1041	9.91	1116	12.33
14000	2698	847	4.28	894	5.40	936	6.52	976	7.64	1014	8.79	1087	11.18	1157	13.71
15000	2891	907	5.26	952	6.47	992	7.66	1029	8.86	1065	10.08	1134	12.59	1201	15.23
16000	3084	968	6.38	1010	7.68	1048	8.95	1084	10.22	1118	11.51	1184	14.16	1247	16.92
17000	3276	1028	7.66	1068	9.03	1105	10.38	1139	11.74	1171	13.10	1234	15.88	1294	18.76
18000	3469	1088	9.09	1127	10.55	1162	11.98	1194	13.41	1226	14.85	1285	17.77	1343	20.78
19000	3662	1149	10.69	1185	12.23	1219	13.74	1250	15.25	1280	16.77	1338	19.83	1393	22.97
20000	3855	1209	12.47	1244	14.09	1276	15.69	1306	17.28	1335	18.87	1391	22.08	1444	25.36
21000	4047	1270	14.43	1303	16.14	1334	17.82	1363	19.49	1391	21.15	1444	24.52	1496	27.93
22000	4240	1330	16.59	1362	18.38	1392	20.14	1420	21.89	1447	23.64	1499	27.15	1548	30.71
23000	4433	1391	18.96	1421	20.83	1450	22.68	1477	24.51	1503	26.33	1553	30.00	1601	33.70
24000	4626	1451	21.54	1481	23.50	1508	25.43	1535	27.34	1560	29.24	1608	33.06	1654	36.91
25000	4818	1512	24.35	1540	26.39	1567	28.40	1592	30.39	1617	32.38	1664	36.35	1708	40.35
26000	5011	1572	27.39	1600	29.51	1625	31.60	1650	33.68	1674	35.75	1719	39.88	1763	44.03
27000	5204	1633	30.68	1659	32.88	1684	35.05	1708	37.21	1731	39.36	1775	43.65	1818	47.95
28000	5397	1693	34.21	1719	36.50	1743	38.76	1766	40.99	1788	43.22	1832	47.67	1873	52.13

Volume CFM	O.V. fpm	5" SP		6" SP		7" SP		8" SP		9" SP		10" SP		11" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
8000	1542	1075	9.73												
9000	1735	1087	10.51	1180	13.00										
10000	1927	1105	11.40	1193	13.95	1277	16.68	1359	19.56						
11000	2120	1128	12.43	1211	15.04	1291	17.82	1369	20.76	1445	23.85	1517	27.08		
12000	2313	1157	13.60	1235	16.27	1310	19.11	1385	22.11	1457	25.26	1527	28.55	1595	31.97
13000	2506	1190	14.91	1263	17.66	1334	20.57	1405	23.62	1474	26.83	1541	30.18	1607	33.65
14000	2698	1227	16.38	1295	19.21	1363	22.18	1429	25.31	1495	28.57	1559	31.98	1622	35.51
15000	2891	1267	18.01	1331	20.92	1395	23.97	1458	27.17	1520	30.50	1581	33.97	1642	37.56
16000	3084	1309	19.80	1370	22.80	1430	25.94	1490	29.22	1549	32.62	1607	36.15	1665	39.81
17000	3276	1353	21.75	1411	24.86	1468	28.10	1525	31.45	1581	34.93	1637	38.54	1692	42.26
18000	3469	1399	23.89	1455	27.11	1509	30.44	1563	33.88	1617	37.45	1670	41.13	1722	44.93
19000	3662	1447	26.21	1500	29.54	1552	32.97	1603	36.52	1654	40.17	1705	43.94	1755	47.81
20000	3855	1495	28.71	1546	32.16	1596	35.71	1645	39.36	1694	43.11	1743	46.96	<i>1791</i>	<i>50.92</i>
21000	4047	1545	31.42	1594	34.99	1642	38.65	1689	42.41	1736	46.26	<i>1782</i>	<i>50.21</i>	<i>1829</i>	<i>54.26</i>
22000	4240	1596	34.33	1643	38.03	1689	41.81	1734	45.68	1779	49.64	<i>1824</i>	<i>53.69</i>	<i>1868</i>	<i>57.84</i>
23000	4433	1647	37.46	1692	41.29	1737	45.19	1781	49.18	<i>1824</i>	<i>53.25</i>	<i>1867</i>	<i>57.40</i>	<i>1910</i>	<i>61.65</i>
24000	4626	1699	40.81	1743	44.77	1786	48.80	<i>1828</i>	<i>52.91</i>	<i>1870</i>	<i>57.09</i>	<i>1912</i>	<i>61.36</i>	<i>1953</i>	<i>65.71</i>
25000	4818	1752	44.39	<i>1794</i>	<i>48.49</i>	<i>1836</i>	<i>52.65</i>	<i>1877</i>	<i>56.88</i>	<i>1918</i>	<i>61.19</i>	<i>1958</i>	<i>65.57</i>		
26000	5011	<i>1805</i>	<i>48.21</i>	<i>1846</i>	<i>52.45</i>	<i>1887</i>	<i>56.74</i>	<i>1926</i>	<i>61.10</i>	<i>1966</i>	<i>65.53</i>				
27000	5204	<i>1859</i>	<i>52.28</i>	<i>1899</i>	<i>56.66</i>	<i>1938</i>	<i>61.09</i>								
28000	5397	<i>1913</i>	<i>56.61</i>	<i>1952</i>	<i>61.13</i>										

Volume CFM	O.V. fpm	12" SP		13" SP		14" SP		15" SP		16" SP	
		RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp	RPM	bhp
12000	2313	1662	35.52								
13000	2506	1671	37.26	1734	40.99	<i>1795</i>	<i>44.83</i>				
14000	2698	1684	39.18	1745	42.96	<i>1805</i>	<i>46.87</i>	<i>1863</i>	<i>50.88</i>	<i>1920</i>	<i>55.00</i>
15000	2891	1701	41.28	1760	45.12	<i>1818</i>	<i>49.08</i>	<i>1874</i>	<i>53.16</i>	<i>1930</i>	<i>57.34</i>
16000	3084	1722	43.59	1778	47.49	<i>1834</i>	<i>51.51</i>	<i>1889</i>	<i>55.64</i>	<i>1942</i>	<i>59.88</i>
17000	3276	1747	46.11	<i>1801</i>	<i>50.07</i>	<i>1854</i>	<i>54.14</i>	<i>1907</i>	<i>58.33</i>	<i>1959</i>	<i>62.63</i>
18000	3469	1774	48.84	<i>1826</i>	<i>52.87</i>	<i>1877</i>	<i>57.01</i>	<i>1928</i>	<i>61.25</i>		
19000	3662	<i>1805</i>	<i>51.80</i>	<i>1855</i>	<i>55.90</i>	<i>1904</i>	<i>60.10</i>	<i>1953</i>	<i>64.41</i>		
20000	3855	<i>1839</i>	<i>54.99</i>	<i>1886</i>	<i>59.16</i>	<i>1933</i>	<i>63.44</i>	Maximum motor frame size = 324T (Class II)			
21000	4047	<i>1875</i>	<i>58.41</i>	<i>1920</i>	<i>62.66</i>	<i>1965</i>	<i>67.02</i>	Maximum motor frame size = 324T (Class IIP)			
22000	4240	<i>1913</i>	<i>62.08</i>	<i>1956</i>	<i>66.41</i>			<i>Maximum motor frame size = 364T (Class III)</i>			
23000	4433	<i>1952</i>	<i>65.99</i>								

*Inlet OD if optional inlet collar is ordered

Power rating (bhp) does not include drive losses. Performance shown is for installation type B-Free inlet, Ducted Outlet. Performance ratings do not include the effects of appurtenances in the airstream.

Maximum Shaft and Bearing Speed for Belt Drive Fans
Maximum Wheel Speed and WR^2 (lb-ft²) for Direct Drive Fans

Fan Size	Maximum Shaft and Bearing Speed note 1			HDAF Steel Wheel note 1						SQBI Steel Wheel note 1						Aluminum Wheel note 2					
				Class II		Class IIP		Class III		Class II		Class IIP		Class III		HDBI		SQBI			
	Class II	Class IIP	Class III	Wheel WR^2	Max RPM	Wheel WR^2	Max RPM	Wheel WR^2	Max RPM	Wheel WR^2	Max RPM	Wheel WR^2	Max RPM	Wheel WR^2	Max RPM	Wheel WR^2	Max RPM	Wheel WR^2	Max RPM	Wheel WR^2	Max RPM
120	120		4040		2.8	4380	2.8	5400			3.9	4065	4.1	4880	4.1	5000	1.2	5400	1.4	5000	
130	130		3750		4.2	3900			4.2	4999	5.3	3750	5.7	4460	5.7	4700	1.7	4999	2.0	4700	
150	150		3460		5.9	3513			5.9	4712	8.1	3050	8.3	4117	8.3	4117	2.5	4712	3.9	4117	
160	160	3042	3150		9.0	3195			9.9	4285	11.7	3042	12.9	3724	12.4	3724	4.2	4285	5.9	3724	
180	180	2593	2850		13.9	2903			15.0	3885	17.4	2593	20.1	3600	20.1	3600	6.7	3885	8.8	3600	
200	200	2380	2740	3000	19.0	2661			20.8	3574	24.6	2380	26.5	3550	26.5	3550	9.8	3574	13.0	3550	
220	220	2115	2380	2664	26.1	2304			29.1	3550	36.3	2115	39.6	3164	39.6	3160	14.7	3550	20.1	3160	
240	240	1912	2110	2409	54.6	2132			58.2	2837			66.6	2740	78.5	2740	26.5	2837	33.2	2740	
270	270	1738	1960	2190					89.9	2476			114.0	2493	114.0	2493	45.9	2476	56.9	2493	
300	300	1568	1790	1976					130.0	2300			165.0	2243	165.0	2243	64.3	2300	76.7	2243	

1 For steel wheels up to 175° F (80°C).

2 For aluminum wheels up to 200°F (93°C). All aluminum wheels are Class III construction.

Approximate Shipping Weight Less Motor and Options lb

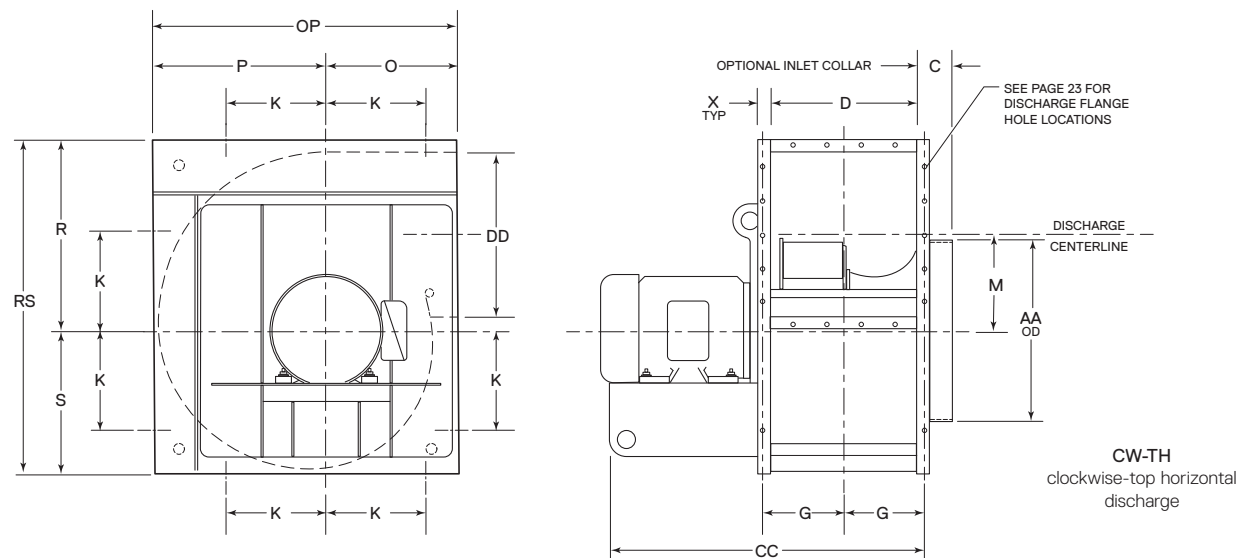
Fan Size	Arrangement 4		Arrangement 9		
	All Classes		Class II	Class IIP	Class III
120	128			231	
130	140			253	
150	162			369	
160	190		385	385	
180	280		513	530	
200	330		577	621	684
220	380		667	725	774
240	452		806	838	893
270	620		1074	1074	1134
300	730		1239	1252	1418

⚠ CAUTION All fans and blowers shown have rotating parts and pinch points. Severe personal injury can result if operated without guards. Stay away from rotating equipment unless it is disconnected from its power source.

Construction Gauges

Fan Size	Arrangement 4				Arrangement 9					Arrangement 4 - Arrangement 9			
	Class	Housing	Inlet Bell	Motor Base	Class	Housing	Inlet Bell	Motor Base	Bearing Base	Steel Wheel			
										Shroud	Blade	Back Plate	Reinforcement Plate
120	II	10	14	7 - 1/4"	IIP	10	14	1/4"	1/4"	12	10	7	10
130	II	10	14	7 - 1/4"	IIP	10	14	1/4"	1/4"	12	10	7	10
150	II - III	10	14	7 - 1/4"	IIP	10	14	1/4"	1/4"	12	10	7	10
160	II - III	10	14	7 - 1/4"	II - IIP	10	14	1/4"	1/4"	12	10	7	10
180	II - III	10	14	7 - 1/4"	II - IIP	10	14	1/4"	1/4"	12	10	7	10
200	II - IV	10	14	7 - 1/4"	II - IIP - III	10	14	1/4"	1/4"	12	7	7	10
220	II	10	14	7 - 1/4"	II - IIP - III	10	14	1/4"	1/4"	12	7	7	10
240	II	10	14	7 - 1/4"	II - IIP - III	10	14	1/4"	1/4"	11	7	1/4"	10
270	II	7	14	7 - 1/4"	II - IIP - III	7	14	1/4"	1/4"	11	7	1/4"	1/4"
300	II - III	7	14	7 - 1/4"	II - IIP	7	14	1/4"	1/4"	11	7	1/4"	1/4"
300	II - III	7	14	7 - 1/4"	III	1/4"	14	1/4"	1/4"	11	7	1/4"	1/4"

ARRANGEMENT 4 — DIRECT DRIVE

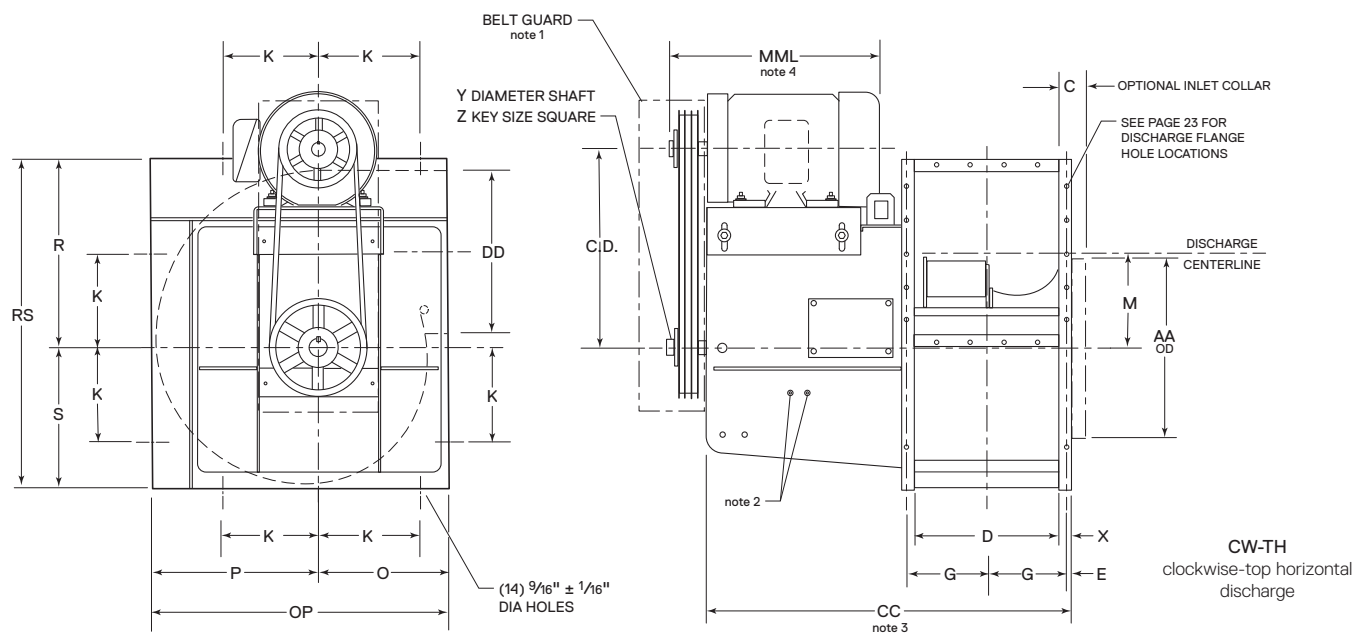


Model	Motor Frame	D	E	G	K	M	O	P	R	S	X	AA	DD
SQBI-120	143T-215T	10 11/16"	7/16"	6 1/32"	7"	6 15/16"	10"	12 1/2"	14 1/16"	10 1/2"	1 1/8"	13 7/16"	12"
SQBI-130	143T-215T	11 3/4"	7/16"	6 9/16"	7 11/16"	7 5/8"	11"	13 3/4"	15 3/8"	11 1/2"	1 1/8"	15 7/16"	13 1/4"
SQBI-150	143T-256T	13 1/16"	5/8"	7 13/16"	8 9/16"	8 1/2"	12"	15 1/4"	17 5/16"	12 3/4"	1 1/2"	16 9/16"	14 5/8"
SQBI-160	143T-256T	14 3/8"	5/8"	8 1/16"	9 3/8"	9 7/16"	13"	16 3/4"	18 15/16"	14"	1 1/2"	18 9/16"	16"
SQBI-180	143T-324T	15 7/8"	5/8"	8 13/16"	10 3/8"	10 13/16"	14 1/4"	18 1/2"	20 13/16"	15 7/16"	1 1/2"	20 9/16"	17 13/16"
SQBI-200	182T-326T	17 3/8"	5/8"	9 9/16"	11 3/4"	11 13/16"	15 1/2"	20 3/8"	22 5/8"	17"	1 1/2"	22 9/16"	19 7/16"
SQBI-220	182T-326T	19 3/8"	5/8"	10 3/16"	13 1/4"	12 11/16"	17"	22 9/16"	25"	18 7/8"	1 1/2"	24 9/16"	21 5/8"
SQBI-240	213T-256T	21 5/16"	5/8"	11 17/32"	14 3/4"	13 31/32"	18 1/2"	24 13/16"	27 3/8"	20 3/4"	1 1/2"	27 9/16"	23 13/16"
SQBI-270	213T-286T	23 1/2"	7/8"	12 7/8"	16 1/2"	15 3/8"	20 1/4"	27 1/4"	30 1/2"	22 7/8"	2"	30 9/16"	26 1/4"
SQBI-300	254T-326T	26 1/8"	7/8"	14 3/16"	18 1/2"	17 3/32"	22 1/4"	30 1/4"	33 11/16"	25 5/16"	2"	33 9/16"	29 3/16"

Model	OP	RS	CC					
			143T-145T	182T-184T	213T-215T	254T-256T	284T-286T(S)	324T-326T(S)
SQBI-120	22 1/2"	24 9/16"	24 7/16"	26 13/16"	26 15/16"			
SQBI-130	24 3/4"	26 7/8"	25 1/2"	27 7/8"	29"			
SQBI-150	27 1/4"	30 1/16"	27 3/16"	29 9/16"	30 11/16"	33 11/16"		
SQBI-160	29 3/4"	32 15/16"	28 1/2"	31"	32"	35"		
SQBI-180	32 3/4"	36 1/4"	30"	32 1/2"	32 1/2"	36 1/2"	40 1/2"	43 1/2"
SQBI-200	35 7/8"	39 5/8"	31 1/2"	34"	35"	38"	42"	45"
SQBI-220	39 9/16"	43 7/8"		36"	37"	40"	44"	47"
SQBI-240	43 5/16"	48 1/8"			38 15/16"	41 15/16"		
SQBI-270	47 1/2"	53 3/8"			41 11/16"	44 11/16"	48 11/16"	
SQBI-300	52 1/2"	59"				47 5/16"	51 5/16"	54 5/16"

Note—Dimension are for full width housings. For partial width housings consult your Cincinnati Fan sales representative.

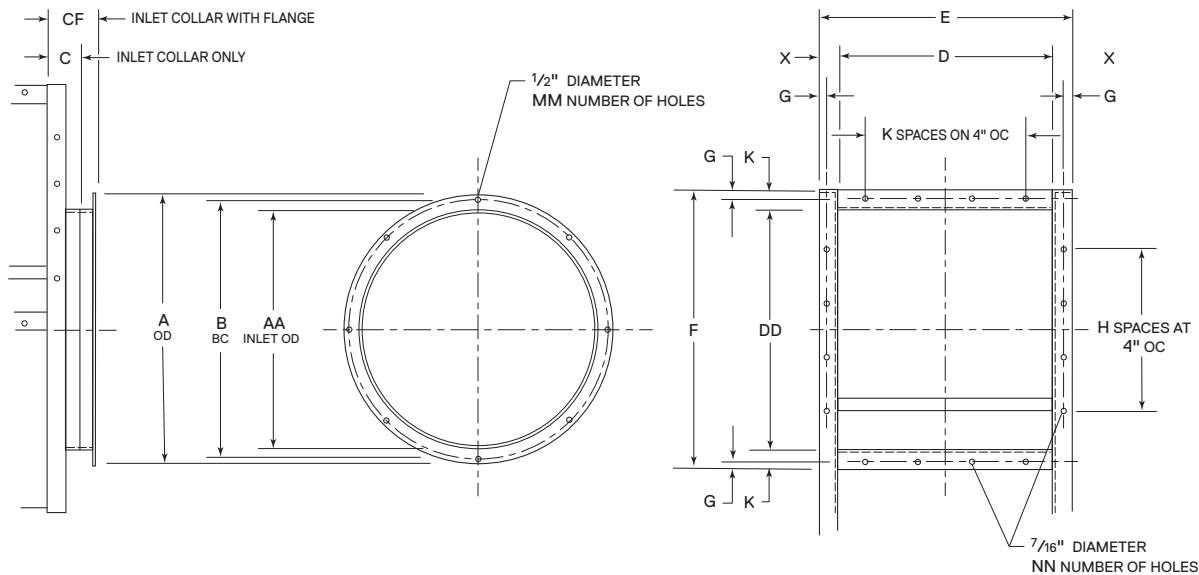
ARRANGEMENT 9 — BELT DRIVE



Model	D	E	F	G	K	M	O	P	R	S	Y		
											Class II	Class IIP	Class III
SQBI-120	10 ¹¹ / ₁₆ "	⁷ / ₁₆ "	4"	6 ¹ / ₃₂ "	7"	6 ¹⁵ / ₁₆ "	10"	12 ¹ / ₂ "	14 ¹ / ₁₆ "	10 ¹ / ₂ "		1 ³ / ₁₆ "	
SQBI-130	11 ³ / ₄ "	⁷ / ₁₆ "	4"	6 ⁹ / ₁₆ "	7 ¹¹ / ₁₆ "	7 ⁵ / ₈ "	11"	13 ³ / ₄ "	15 ³ / ₈ "	11 ¹ / ₂ "		1 ³ / ₁₆ "	
SQBI-150	13 ¹ / ₁₆ "	⁵ / ₈ "	4"	7 ¹³ / ₁₆ "	8 ⁹ / ₁₆ "	8 ¹ / ₂ "	12"	15 ¹ / ₄ "	17 ⁵ / ₁₆ "	12 ³ / ₄ "		1 ⁷ / ₁₆ "	
SQBI-160	14 ³ / ₈ "	⁵ / ₈ "	4"	8 ¹ / ₁₆ "	9 ³ / ₈ "	9 ⁷ / ₁₆ "	13"	16 ³ / ₄ "	18 ¹⁵ / ₁₆ "	14"	1 ⁷ / ₁₆ "	1 ⁷ / ₁₆ "	
SQBI-180	15 ⁷ / ₈ "	⁵ / ₈ "	4 ¹ / ₂ "	8 ¹³ / ₁₆ "	10 ³ / ₈ "	10 ¹³ / ₁₆ "	14 ¹ / ₄ "	18 ¹ / ₂ "	20 ¹³ / ₁₆ "	15 ⁷ / ₁₆ "	1 ⁷ / ₁₆ "	1 ¹¹ / ₁₆ "	
SQBI-200	17 ³ / ₈ "	⁵ / ₈ "	4 ¹ / ₂ "	9 ⁹ / ₁₆ "	11 ³ / ₄ "	11 ¹³ / ₁₆ "	15 ¹ / ₂ "	20 ³ / ₈ "	22 ⁵ / ₈ "	17"	1 ¹¹ / ₁₆ "	1 ¹⁵ / ₁₆ "	2 ⁷ / ₁₆ "
SQBI-220	19 ³ / ₈ "	⁵ / ₈ "	4 ¹ / ₂ "	10 ³ / ₁₆ "	13 ¹ / ₄ "	12 ¹¹ / ₁₆ "	17"	22 ⁹ / ₁₆ "	25"	18 ⁷ / ₈ "	1 ¹¹ / ₁₆ "	1 ¹⁵ / ₁₆ "	2 ⁷ / ₁₆ "
SQBI-240	21 ⁵ / ₁₆ "	⁵ / ₈ "	4 ¹ / ₂ "	11 ¹⁷ / ₃₂ "	14 ³ / ₄ "	13 ³¹ / ₃₂ "	18 ¹ / ₂ "	24 ¹³ / ₁₆ "	27 ³ / ₈ "	20 ³ / ₄ "	1 ¹¹ / ₁₆ "	1 ¹⁵ / ₁₆ "	2 ⁷ / ₁₆ "
SQBI-270	23 ¹ / ₂ "	⁷ / ₈ "	4 ¹ / ₂ "	12 ⁷ / ₈ "	16 ¹ / ₂ "	15 ³ / ₈ "	20 ¹ / ₄ "	27 ¹ / ₄ "	30 ¹ / ₂ "	22 ⁷ / ₈ "	2 ³ / ₁₆ "	2 ³ / ₁₆ "	2 ⁷ / ₁₆ "
SQBI-300	26 ¹ / ₈ "	⁷ / ₈ "	4 ¹ / ₂ "	14 ³ / ₁₆ "	18 ¹ / ₂ "	17 ³ / ₃₂ "	22 ¹ / ₄ "	30 ¹ / ₄ "	33 ¹¹ / ₁₆ "	25 ⁵ / ₁₆ "	2 ³ / ₁₆ "	2 ⁷ / ₁₆ "	2 ¹¹ / ₁₆ "

Model	X	Z			AA	CC note 3			DD	OP	RS	MML note 4		
		Class II	Class IIP	Class III		Class II	Class IIP	Class III				Class II	Class IIP	Class III
SQBI-120	1 ¹ / ₈ "		¹ / ₄ "		13 ⁷ / ₁₆ "		29 ¹⁵ / ₁₆ "		12"	22 ¹ / ₂ "	24 ⁹ / ₁₆ "		19 ¹ / ₂ "	
SQBI-130	1 ¹ / ₈ "		¹ / ₄ "		15 ⁷ / ₁₆ "		31"		13 ¹ / ₄ "	24 ³ / ₄ "	26 ⁷ / ₈ "		19 ¹ / ₂ "	
SQBI-150	1 ¹ / ₂ "		³ / ₈ "		16 ⁹ / ₁₆ "		37 ¹ / ₂ "		14 ⁵ / ₈ "	27 ¹ / ₄ "	30 ¹ / ₁₆ "		24"	
SQBI-160	1 ¹ / ₂ "	³ / ₈ "	³ / ₈ "		18 ⁹ / ₁₆ "	38 ¹³ / ₁₆ "	38 ¹³ / ₁₆ "		16"	29 ³ / ₄ "	32 ¹⁵ / ₁₆ "	24"	24"	
SQBI-180	1 ¹ / ₂ "	³ / ₈ "	³ / ₈ "		20 ⁹ / ₁₆ "	40 ¹ / ₂ "	40 ¹ / ₂ "		17 ¹³ / ₁₆ "	32 ³ / ₄ "	36 ¹ / ₄ "	24 ¹ / ₂ "	24 ¹ / ₂ "	
SQBI-200	1 ¹ / ₂ "	³ / ₈ "	¹ / ₂ "	⁵ / ₈ "	22 ⁹ / ₁₆ "	42"	44"	46"	19 ⁷ / ₁₆ "	35 ⁷ / ₈ "	39 ⁵ / ₈ "	24 ⁵ / ₈ "	27 ³ / ₄ "	30 ⁵ / ₁₆ "
SQBI-220	1 ¹ / ₂ "	³ / ₈ "	¹ / ₂ "	⁵ / ₈ "	24 ⁹ / ₁₆ "	44"	46"	48"	21 ⁵ / ₈ "	39 ⁹ / ₁₆ "	43 ⁷ / ₈ "	24 ⁵ / ₈ "	27 ³ / ₄ "	30 ⁵ / ₁₆ "
SQBI-240	1 ¹ / ₂ "	³ / ₈ "	¹ / ₂ "	⁵ / ₈ "	27 ¹ / ₂ "	47 ¹⁵ / ₁₆ "	49 ¹⁵ / ₁₆ "	49 ¹⁵ / ₁₆ "	23 ¹³ / ₁₆ "	43 ⁵ / ₈ "	48 ¹ / ₈ "	27 ³ / ₄ "	30 ⁵ / ₁₆ "	30 ⁵ / ₁₆ "
SQBI-270	2"	¹ / ₂ "	¹ / ₂ "	⁵ / ₈ "	30 ¹ / ₂ "	53 ¹¹ / ₁₆ "	53 ¹¹ / ₁₆ "	56 ⁷ / ₁₆ "	26 ¹ / ₄ "	47 ¹ / ₂ "	53 ⁵ / ₈ "	30 ⁵ / ₁₆ "	30 ⁵ / ₁₆ "	32 ⁷ / ₈ "
SQBI-300	2"	¹ / ₂ "	¹ / ₂ "	⁵ / ₈ "	33 ¹ / ₂ "	56 ⁵ / ₁₆ "	56 ⁵ / ₁₆ "	59 ¹ / ₁₆ "	29 ³ / ₁₆ "	52 ¹ / ₂ "	59"	30 ⁵ / ₁₆ "	30 ⁵ / ₁₆ "	32 ⁷ / ₈ "

INLET AND OUTLET FLANGES



Optional Inlet Collar and Flange

Note—Flanges will be drilled per these dimensions unless otherwise specified.

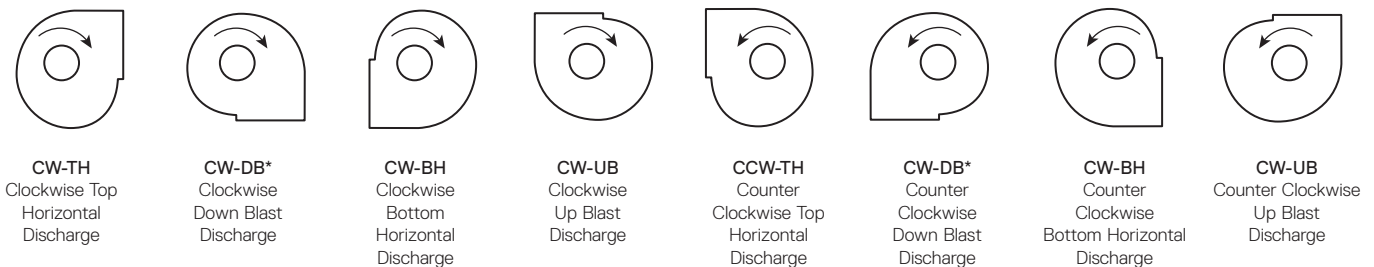
Standard Outlet Flange

Dimensions shown are for 100% width housings. Consult Cincinnati Fan for reduced width outlet flange dimensions. Outlet flange standard on all models.

Model	Inlet Collar Only		Inlet Collar with Inlet Flange					Discharge Flange								
	C	AA	A	B	AA	CF	MM	D	E	F	G	H	K	X	DD	NN
SQBI-120	1 5/8"	13 7/16"	16 3/16"	15"	13 7/16"	3 3/16"	8	10 11/16"	12 15/16"	14 1/4"	7/16"	2	2	1 1/8"	12"	12
SQBI-130	1 5/8"	15 7/16"	18 3/16"	16 1/2"	15 7/16"	3 3/16"	8	11 3/4"	14"	15 1/2"	7/16"	2	2	1 1/8"	13 1/4"	12
SQBI-150	1 5/8"	16 9/16"	19 3/16"	18 1/8"	16 9/16"	3 1/4"	8	13 1/16"	16 1/16"	17 5/8"	5/8"	3	2	1 1/2"	14 5/8"	14
SQBI-160	1 5/8"	18 9/16"	21 3/16"	20 1/8"	18 9/16"	3 1/4"	8	14 3/8"	17 3/8"	19"	5/8"	3	3	1 1/2"	16"	16
SQBI-180	1 5/8"	20 9/16"	23 3/16"	20 1/4"	20 9/16"	3 1/4"	8	15 7/8"	18 7/8"	20 13/16"	5/8"	3	3	1 1/2"	17 13/16"	16
SQBI-200	1 5/8"	22 9/16"	25 3/16"	24 1/16"	22 9/16"	3 1/4"	16	17 3/8"	20 3/8"	22 7/16"	5/8"	4	3	1 1/2"	19 7/16"	18
SQBI-220	1 5/8"	24 9/16"	27 3/16"	26 1/8"	24 9/16"	3 1/4"	16	19 3/8"	22 3/8"	24 5/8"	5/8"	4	4	1 1/2"	21 5/8"	20
SQBI-240	2 1/8"	27 9/16"	31 3/16"	29"	27 9/16"	4 1/4"	16	21 5/16"	24 5/16"	26 13/16"	5/8"	5	4	1 1/2"	23 13/16"	22
SQBI-270	2 1/8"	30 9/16"	34 3/16"	32 3/16"	30 9/16"	4 1/4"	16	23 1/2"	27 1/2"	30 1/4"	7/8"	6	5	2"	26 1/4"	26
SQBI-300	2 1/8"	33 9/16"	37 3/16"	35 3/8"	33 9/16"	4 1/4"	16	26 1/8"	30 1/8"	33 3/16"	7/8"	6	6	2"	29 3/16"	28

Eight Rotation and Discharge Positions Available.

Discharges shown are determined by viewing fan from motor or drive side



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TECHNOLOGIES

