

TORIT® BACKWARD INCLINED FANS

FOR DUST COLLECTORS
AND AIR HANDLING SYSTEMS

Torit Backward Inclined (TBI) Fans provide a convenient, cost-effective method of integrating a high efficiency fan with a Donaldson Torit dust collector.

- Mounts directly to the clean-air plenum of the dust collector, eliminating costly transition ducting, and reducing footprint of the system
- Sizes range from 3 to 30 hp
- Capacities from 1,400 to 10,300 cfm (2,378 to 17,496 m³/h)
- Backward inclined fan wheel provides high efficiency operation
- Direct-drive operation eliminates maintenance of fan bearings and belts
- Computer balanced fan and motor assembly ensures vibration-free operation
- All necessary hardware for quick and easy installation is included
- Standard paint finish is blue
- All 60 Hz motors are EISA compliant and meet or exceed NEMA Premium** Efficiency Standards
- Fan inlet spool piece is flanged and punched for easier installation



TBI-15 (60 CYCLE)

EQUIPMENT OPTIONS

High performance Torit-Built® silencer (60 cycle only)

Aluminum fan wheel

Explosion-proof motors - NEMA rated

Outlet dampers

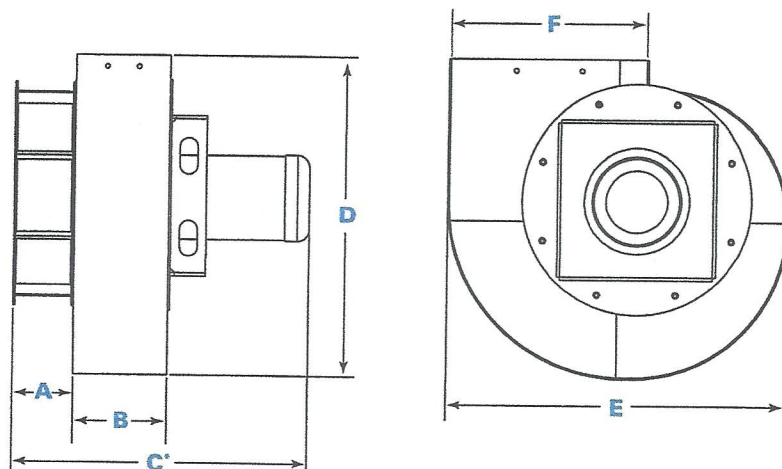
High temperature version available

50 cycle/IEC motor configurations

Flanges for exhaust ductwork

* NEMA Premium is a registered trademark of National Electrical Manufacturers Association.

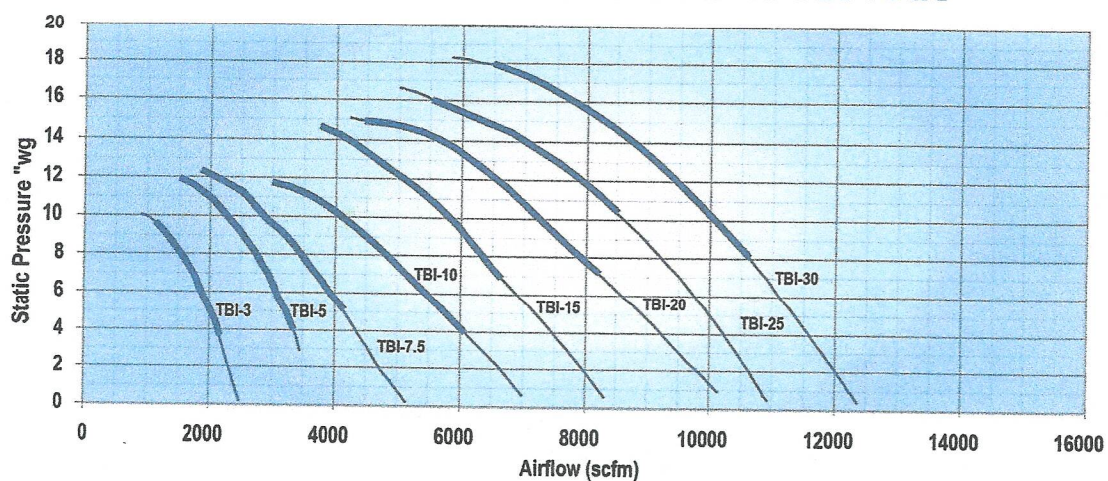
DIMENSIONS & SPECIFICATIONS FOR 60 CYCLE TBI FAN



60 Cycle Fans	Dimensions												Shipping Weight	
	A		B		C*		D		E		F			
	in	mm	in	mm	in	mm	in	mm	in	mm	in	mm	lb	kg
TBI-3	5.2	132.1	7.9	200.7	26.7	678.2	26.9	683.3	28.7	729.0	16.8	426.7	230	104
TBI-5	5.2	132.1	8.7	221.0	27.4	696.0	26.9	683.3	28.7	729.0	16.8	426.7	246	112
TBI-7.5	5.2	132.1	10.1	256.5	31.5	800.1	26.9	683.3	28.7	729.0	16.8	426.7	310	141
TBI-10	5.2	132.1	11.4	289.6	32.8	833.1	26.9	683.3	28.7	729.0	16.8	426.7	327	148
TBI-15	5.2	132.1	11.9	302.3	37.3	947.4	32.3	820.4	34.8	883.9	20.4	518.2	541	245
TBI-20	5.2	132.1	13.6	345.4	39.0	990.6	35.5	901.7	34.8	883.9	20.4	518.2	634	288
TBI-25	5.2	132.1	14.2	360.7	41.3	1049.0	37.3	947.4	38.3	972.8	22.4	569.0	750	340
TBI-30	5.2	132.1	14.8	375.9	41.9	1064.3	37.3	947.4	38.3	972.8	22.4	569.0	806	366

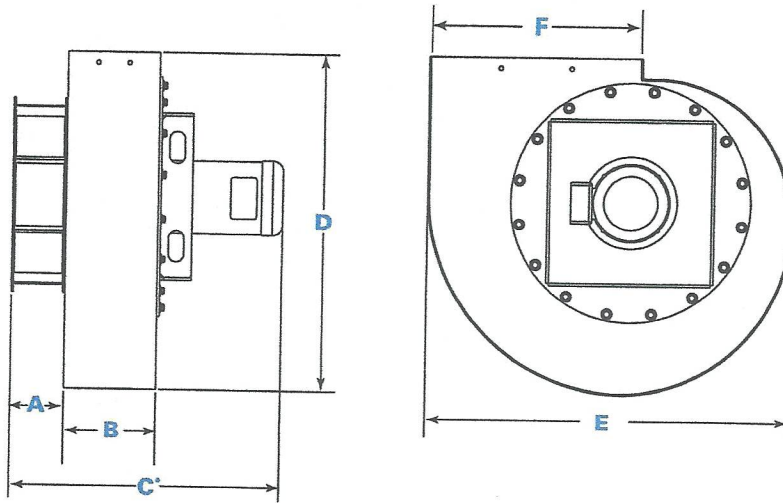
* This dimension is subject to change based on the motor manufacturer chosen and on the motor enclosure type (TEFC or EPL). If this dimension is critical, you should verify the information with your sales representative.

PERFORMANCE CURVES FOR 60 CYCLE TBI FAN



The thicker portions of the lines show the allowable usage ranges in the state of California. If this information applies to you, you should verify with your sales representative.

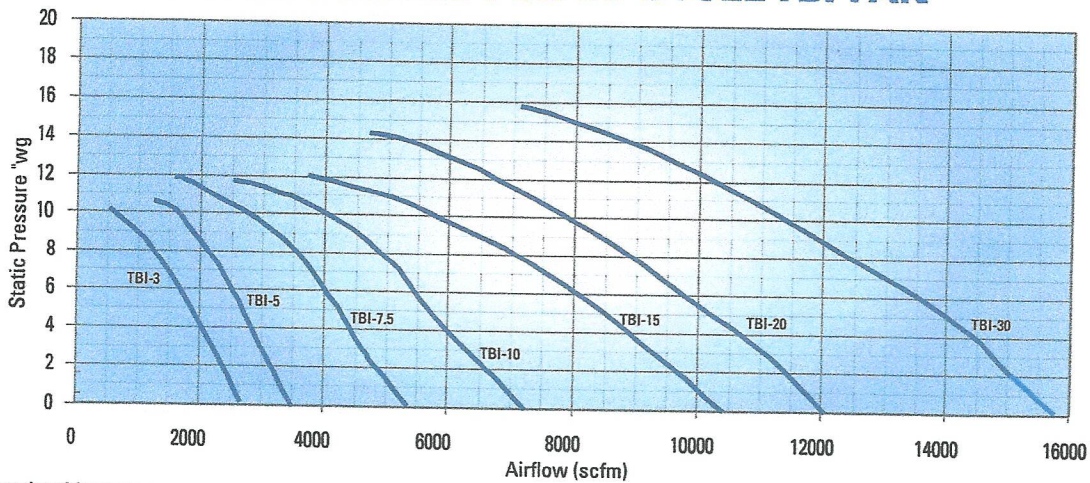
DIMENSIONS & SPECIFICATIONS FOR 50 CYCLE TBI FAN



50 Cycle Fans	Dimensions												Shipping Weight	
	A		B		C*		D		E		F			
	in	mm	in	mm	in	mm	in	mm	in	mm	in	mm	lb	kg
TBI-3	5.2	132.1	8.9	226.1	27.9	708.7	32.3	820.4	34.8	883.9	20.4	518.2	315	143
TBI-5	5.2	132.1	10.3	261.6	29.3	744.2	32.3	820.4	34.8	883.9	20.4	518.2	331	150
TBI-7.5	5.2	132.1	11.9	302.3	33.9	861.1	32.3	820.4	34.8	883.9	20.4	518.2	395	179
TBI-10	5.2	132.1	13.6	345.4	35.6	904.2	32.3	820.4	34.8	883.9	20.4	518.2	412	187
TBI-15	5.2	132.1	13.9	353.1	40.4	1026.2	32.3	820.4	34.8	883.9	20.4	518.2	578	262
TBI-20	5.2	132.1	15.4	391.2	41.9	1064.3	37.3	947.4	38.3	972.8	22.4	569.0	632	287
TBI-30	5.2	132.1	16.3	414.0	43.6	1107.4	40.4	1026.2	42.5	1079.5	24.9	632.5	804	365

* This dimension is subject to change based on the motor manufacturer chosen and on the motor enclosure type (TEFC or EP). If this dimension is critical, you should verify the information with your sales representative.

PERFORMANCE CURVES FOR 50 CYCLE TBI FAN



60 CYCLE TBI FAN SOUND DATA* & AMCA FAN CLASSES

Model	Fan Speed (RPM)	Overall Assembly Sound		Exhaust Only With HP Silencer			Exhaust Only With 70 dBA Silencer		
		Inlet Ducted Lp (dBA) ¹	Inlet/Outlet Ducted Lp (dBA) ²	Lp (dBA) ³	CFM	Silencer DP *wg	Lp (dBA) ³	CFM	Silencer DP *wg
TBI-3	3,500	86	77	69	1,400	1.0	70	1,400	0.3
TBI-5	3,500	88	79	68	2,050	1.0	70	2,050	0.6
TBI-7.5	3,500	93	83	70	3,300	1.2	70	3,300	1.1
TBI-10	3,500	89	80	75	4,250	1.9	70	4,250	0.8
TBI-15	3,500	93	82	74	5,650	0.2	70	5,650	0.6
TBI-20	3,500	95	84	74	7,600	0.6	70	7,600	0.6
TBI-25	3,500	95	85	77	8,840	0.3	70	8,840	0.7
TBI-30	3,500	96	85	77	10,300	0.3	70	10,300	0.9

50 CYCLE TBI FAN SOUND DATA* & AMCA FAN CLASSES

Model	Fan Speed (RPM)	Overall Assembly Sound		Exhaust Only With 70 dBA Silencer			Exhaust Only With 80 dBA Silencer		
		Inlet Ducted Lp (dBA) ¹	Inlet/Outlet Ducted Lp (dBA) ²	Lp (dBA) ³	CFM	Silencer DP *wg	Lp (dBA) ³	CFM	Silencer DP *wg
TBI-3	2,920	82	72	70	1,300	0.1	80	1,300	0.1
TBI-5	2,920	85	74	70	1,900	0.1	80	1,900	0.2
TBI-7.5	2,920	88	77	70	2,880	0.6	80	2,880	0.3
TBI-10	2,920	89	79	70	4,000	1.0	80	4,000	1.7
TBI-15	2,920	92	82	70	5,800	1.0	N/A	N/A	N/A
TBI-20	2,920	94	83	70	7,600	1.0	N/A	N/A	N/A
TBI-30	2,920	95	85	70	11,700	1.0	N/A	N/A	N/A

*All cases are for uniform free-field propagation into hemisphere (i.e., reflecting ground plane and neglecting any sound directionalities).

Sound pressure levels are an overall average determined at the point of fan peak mechanical efficiency at one fan speed, (3500 rpm for 60 Hz fan/motor assemblies, 2920 rpm for 50 Hz.)

dBA sound levels are an average of measurements made in a laboratory environment. Installed sound levels will vary depending on the measurement location, operating conditions, and installation.

1 Sound pressure level at 1 meter (39") from fan case with fan inlet ducted and fan outlet open.

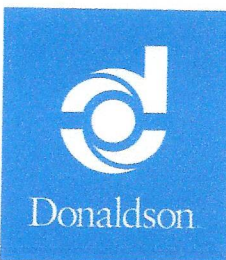
2 Sound pressure level at 1 meter (39") from fan case with fan inlet and outlet ducted.

3 Sound pressure level (Lp) at 45 degrees and 1 meter (39") from silencer discharge. No fan case/motor noise (silencer discharge noise only).

Significantly improve the performance of your collector with genuine Donaldson Torit replacement filters and parts. **Call Donaldson Torit at 800-365-1331.**

Important Notice

Many factors beyond the control of Donaldson can affect the use and performance of Donaldson products in a particular application, including the conditions under which the product is used. Since these factors are uniquely within the user's knowledge and control, it is essential the user evaluate the products to determine whether the product is fit for the particular purpose and suitable for the user's application. All products, product specifications, availability and data are subject to change without notice, and may vary by region or country.



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Phone: +65-6311-7373

US Duct, Inc.
PO Box 2537
Kemersville, NC 27285

Voice: 855-487-3828
Fax: 336-904-0116

MATERIAL "GALV"

SALES ORDER PICKING LIST

Sales Order Number: 44549
Sales Order Date: Apr 14, 2022
Ship By:
Page: 1

To:

Air Quality Systems
207 W. Main St. Suite 202
Allen, TX 75013

Ship To:

Stanley Black and Decker
15100 North Beach St.
Attn: Robert Jackson 401-699-5329.
Fort Worth, TX 76177

Customer ID #	PO Number	Sales Rep Name
1183	22SBD8046	Mel/Kyle
Customer Contact	Shipping Method	Payment Terms
	See Notes	Net 30 Days

Quantity	Item	Description	Box 1	Box 2	Box 3	Box 4	Box 5
		Ship Via Best Way on 5/15					
		paulparkinson@airqualitysys.com					
1.00		Metal Surcharge					
1.00		[] Application GENERAL DUST- STANDARD CONSTRUCTION					
21.00	21	[RP06.G18] 6 in. Rolled Lip 5 ft. Pipe Laser Welded 18ga Glv [NR]	21				
5.00	5	[RP09.G18] 9 in. Rolled Lip 5 ft. Pipe Laser Welded 18ga Glv [NR]	5				
1.00	1	[RP10.G18] 10 in. Rolled Lip 5 ft. Pipe Laser Welded 18ga Glv [NR]	1				
4.00	4	[RP14.G18] 14 in. Rolled Lip 5 ft. Pipe Laser Welded 18ga Glv [NR]	4				
44.00	14	[RAS06.G22] 6 in. Rolled Lip Adj Sleeve- w/ Buna N O-Ring (12) 11 in. OAL (2) 6 in. OAL 22ga Glv		14			
4.00	4	[RAS09.G22] 9 in. Rolled Lip Adj Sleeve- w/ Buna N O-Ring (3) 11 in. OAL (1) 6 in. OAL 22ga Glv		4			
1.00	1	[RAS10.G22] 10 in. Rolled Lip Adj Sleeve- w/ Buna N O-Ring (6) OAL 22ga Glv		1			
2.00	2	[RAS14.G20] 14 in. Rolled Lip 11 in. Adj Sleeve- w/ Buna N O-Ring 20ga Glv		2			
5.00	5	[RA06.G24] 6" ROLLED LIP ADAPTER 6"RL TO 6 1/8 ID EXACT		5			
11.00	11	[RETS0690.G16] 6 in. Rolled Lip 90 deg Tubed-El- 1.5 x		11			

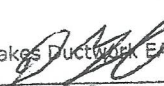
2 skids

700.165 +6"

408.165

Send Shipping Notifications to: jeanniewertz@airqualitysys.com

US Duct makes Ductwork EASY & RIGHT!

Shipping: 

Sales: 

US Duct, Inc.
PO Box 2537
Kernersville, NC 27285

Voice: 855-487-3828
Fax: 336-904-0116

SALES ORDER PICKING LIST

Sales Order Number: 44549
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Page: 2

To:

Air Quality Systems
207 W. Main St. Suite 202
Allen, TX 75013

Ship To:

Stanley Black and Decker
15100 North Beach St.
Attn: Robert Jackson 401-699-5329.
Fort Worth, TX 76177

Customer ID #		PO Number	Sales Rep Name				
1186		22SBD8046	Mel/Kyle				
Customer Contact		Shipping Method	Payment Terms				
		See Notes	Net 30 Days				
Quantity	Item	Description	Box 1	Box 2	Box 3	Box 4	Box 5
1.00	1	D HVY STYLE 16ga Glv					
		[REGS0990.G16] 9 in. Rolled Lip 90 deg EI- 1.5 x D -		1			
		Welded Segments-HVY STYLE 16ga Glv [NR]					
3.00	3	[RETS0645.G16] 6 in. Rolled Lip 45 deg Tubed-EI- 1.5D		3			
		HVY STYLE 16ga Glv					
1.00	1	[REGS0945.G16] 9 in. Rolled Lip 45 deg EI- 1.5D Welded		1			
		Segments-HVY STYLE 16ga Glv [NR]					
1.00	1	[REGS1445.G16] 14 in. Rolled Lip 45 deg EI- 1.5D		1			
		Welded Segments-HVY STYLE 16ga Glv [NR]					
59.00	59	[RCL06.B] 6 in. Rolled Lip STD Clamp w/Buna-N Gskt		59			
		Bga SS					
13.00	13	[RCL09.B] 9 in. Rolled Lip STD Clamp w/Buna-N Gskt		13			
		Bga SS					
3.00	3	[RCL10.B] 10 in. Rolled Lip STD Clamp w/Buna-N Gskt		3			
		Bga SS					
8.00	8	[RCL14.B] 14 in. Rolled Lip STD Clamp w/Buna-N Gskt		8			
		Bga SS					
1.00	1	[RBL1045.G18] 10 in. RL-Branch Lateral @ 45deg		1			
		10RL-9RL-9RL-45deg-18ga 18ga G [NR]					
1.00	1	[RBL1445.G18] 14 in. RL-Branch Lateral @ 45deg		1			
		14RL-10RL-6RL-45deg-18ga 18ga G [NR]					
2.00	2	[RBY0945.G18] 9 in. RL-Y branch @ 45 deg		2			
		9RL-6RL-6RL-45deg-18ga 18ga G [NR]					
5.00	5	[RCO06.Gn/a] 6 in. Rolled Lip Cut-Offs Full Glv		5			

Send Shipping Notifications to: jeanniewertz@airqualitysys.com

Voice: 855-487-3828
Fax: 336-904-0116

Sales Order Number: 44549
Sales Order Date: Apr 14, 2022
Ship By:
Page: 3

Ship To:
Stanley Black and Decker
15100 North Beach St.
Attn: Robert Jackson 401-699-5329.
Fort Worth, TX 76177

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Send Shipping Notifications to: jeanniewertz@airqualitysys.com



INSTALLATION INSTRUCTIONS:

(NOTIFY US IMMEDIATELY OF ANY DAMAGE TO THE CONTAINER!)

Step 1: Stay calm! You may have a lot of boxes and a lot of parts, but they will all go together quickly— as long as you remain organized.

Step 2: DO NOT START TEARING INTO BOXES. Your packing slip will tell you what box the various parts are in and help you organize the process.

Step 3: Find the box with the first piece, typically the adapter to the dust collector or fan (you will want to work out from the fan or collector). Once you've located the first piece, make sure that it does indeed connect to the fan or collector.

Step 4: Layout the horizontal run of your duct and remove as many obstacles from the floor as possible.

Optional: many find it helpful to run the hangers first. Cable hangers can be used to make trapezes (tie off both ends to the beams and form a big loop) along the path. After the duct is hung in the trapeze, you can come back and place the hangers appropriately and level the duct. (*See back page for more on using cable hangers*).

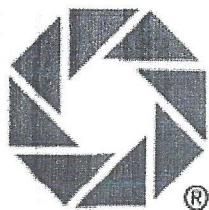
Step 5: Systematically unbox your parts using the packing slip. Place them along the line of installation in the general location they will be needed, but out of the way of your Hi-lift or ladder. **Refrain from standing the duct on end. If it falls you may knock the end out of shape, making it more difficult to clamp securely.**

Step 6: Start from the collector/fan and work your way out.

Step 7: Refrain from branching off the trunk line with long runs that extend the 30 or 45 degree branch. Trying to hit a distant point at an angle is VERY difficult. Even the slightest change in degree can cause you to be feet off. Instead, try to run at 90 degrees to the trunk and take each lateral run as you encounter it, completing each lateral run before continuing with the trunk line. That way you can adjust the trunk line without impacting the rest of the system.

Step 8: The Adjustable Sleeve For Clamp Together Duct. If you are using clamp together duct, the adjustable sleeve will be a huge advantage to you as you make field adjustments. The sleeve is 11" long, with an inside diameter large enough to allow it to slide over a piece of pipe, once the rolled lip is cut off the pipe. (See more details on back about Clamp Together Duct installation).

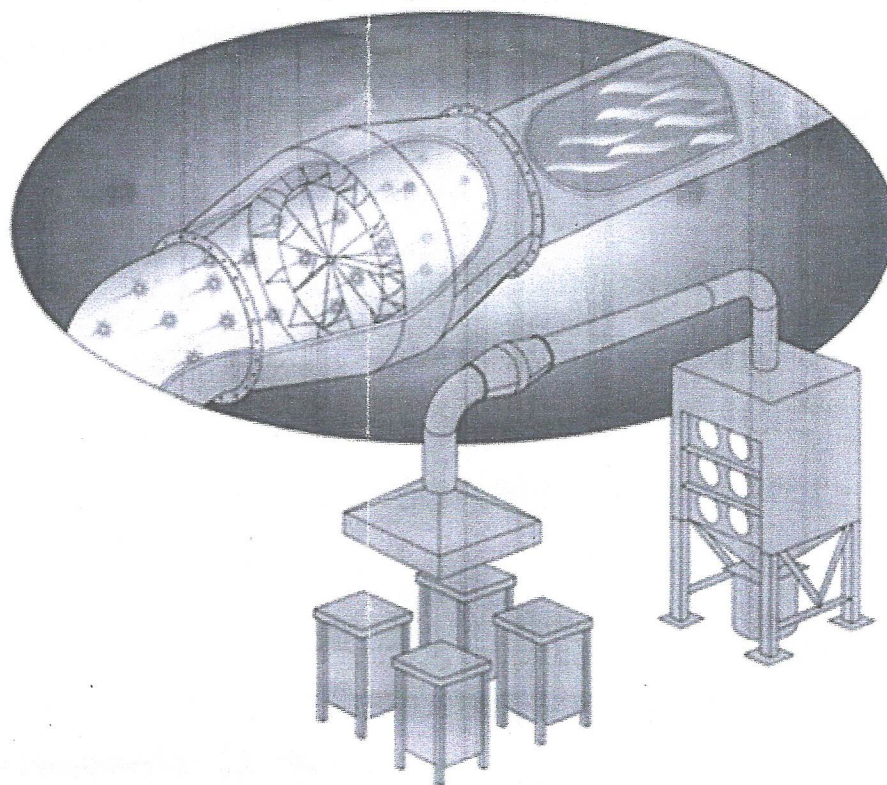
Call US Duct 1-855-487-3828 with any questions or concerns.



**Blender^{INC}
Products**

MARCH 2012

SPARK COOLER[®]

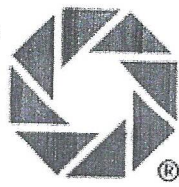


OWNER'S MANUAL

TERMS AND CONDITIONS OF SALE

APPLICATIONS AND PERFORMANCE CRITERIA

INSTALLATION, OPERATION AND MAINTENANCE (IOM) MANUAL



**Blender^{INC.}
Products**

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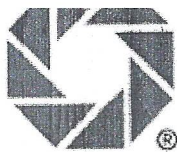
OWNER'S MANUAL

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**B|
P|****1****Terms &
Conditions,
Limited
Warranty****BLENDER PRODUCTS, INC., TERMS & CONDITIONS**

Terms and Conditions of Sale. The SPARK COOLER® is sold to Customer and Customer accepts delivery of the equipment on the following terms, conditions and subject to the following agreements.

Limited Warranty Blender Products, Inc. ("Blender") warrants that the SPARK COOLER® will perform in accordance with published specifications for a period of one (1) year from the date of delivery and that the equipment will be free from defects in material and workmanship under normal use for one (1) year from the date of delivery. This limited warranty is valid only if the equipment is installed on approved applications, and maintained and serviced in accordance with the Owner's Manual (the "Manual") and any other product information included with the equipment. This limited warranty shall be void if the SPARK COOLER® is not installed, maintained and serviced in accordance with the Manual. Blender's sole obligation and

Customer's sole remedy under this limited warranty is the replacement and repair, at Blender Products' option, of the defective component at Blender's Denver, Colorado facilities. Such obligation and remedy are expressly conditioned upon (i) installation and operation of the equipment in strict conformity with the Manual; and (ii) the equipment not having been altered, mishandled, misused, damaged or repaired (except for repairs performed by Blender). Defective components shall be shipped freight prepaid to Blender's Denver, Colorado facility. Customer shall pay inbound and outbound freight and insurance on all components returned to Blender for repair or replacement. This limited warranty is the exclusive warranty of the product.

BLENDER MAKES NO OTHER WARRANTY OF ANY KIND OR DESCRIPTION, WRITTEN OR ORAL, EXPRESSED OR IMPLIED, INCLUDING, WITHOUT LIMITATION, ANY WARRANTY OF MERCHANTABILITY, WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE OR WARRANTY ARISING OUT OF ANY COURSE OF PERFORMANCE, COURSE OF DEALING USAGE OF TRADE.



**Blender^{INC.}
Products**

BLENDER PRODUCTS, INC., TERMS & CONDITIONS (CONTD.)

Cautionary Statement Customer expressly acknowledges and understands that the SPARK COOLER® system does not preclude the possibility of fire or explosion. The purpose of the system is to minimize the frequency of spark ignition by creating turbulence in the airflow. Additional fire and explosion suppression systems, flame barriers or explosion venting may be necessary or advisable to reduce fire and explosion risks. . Customer acknowledges that the technology is of such complexity and that each application is unique and distinct from all others so that performance and effectiveness will vary widely., and that, in addition, machine and operator variables will influence performance of the equipment. Blender Products cannot and does not warrant the complete detection or elimination of sparks. THE SPARK COOLER(R) SHOULD NEVER BE USED AS A STANDALONE DEVICE IN APPLICATIONS IN WHICH ABSOLUTE SPARK SUPPRESSION IS REQUIRED TO AVOID EXPLOSION OR CATASTROPHE.

Limitation of Liability The SPARK COOLER® is sold to Customer and Customer accepts delivery of the equipment upon the express understanding and conditions that Customer has read and understands the Cautionary Statement set forth above and Customer shall and does for itself, its affiliates officers, directors, employees, contractors and agents, release Blender Products, Inc., its affiliates, officers, directors, employees and agents from and against any and all liability or claim for any direct, indirect, special, incidental or consequential damages, including lost profits, death, or personal injury, or loss of use or other economic loss ("Damages"), arising in tort, contract or otherwise in connection with the purchase, installation, use, operation and maintenance of the SPARK COOLER® equipment. Customer acknowledges that its sole remedy is the limited warranty set forth above and that in no event shall Blender be responsible for Damages to Customer, its contractors, employees, invitees or agents. Customer shall indemnify and save harmless Blender from and against any claim(s) for such Damages.

Protection of Proprietary Information The SPARK COOLER® , related equipment and the Manual include patented and unpatented technology, trade secrets and copyrighted material (collectively, "Proprietary Information"). Customer shall not make or permit to be made Proprietary Information available in any form to any person other than Customer's employees and contractors whose job performance requires access. Customer shall not attempt to reverse-engineer or otherwise copy or use any Proprietary Information except in strict compliance with



BI
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2

and
Applications

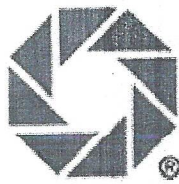
Performance
Criteria

APPLICATIONS AND PERFORMANCE CRITERIA

Applications and Performance Criteria The SPARK COOLER® is designed and applied as a preventive measure, to reduce the life and frequency of hazardous sparks within an industrial exhaust system. The SPARK COOLER® is *not* designed to extinguish actual fires. *Installation of the SPARK COOLER® does not assure elimination of all sparks and does not preclude the possibility of fire and explosion.* Please see the "Cautionary Statement" above.

The following are application guidelines to help improve product performance and safety. ***Please review this entire Manual for complete instructions and installation information.***

-
- **Location:** Install the SPARK COOLER® to allow a minimum of one duct diameter between the spark source and the inlet of the SPARK COOLER®. Leave a minimum of 10 duct diameters between the outlet of the SPARK COOLER® and the air-material-separator.
 - **Flow:** Performance of the SPARK COOLER® is best operated at duct velocities greater than 1000 fpm, but not exceeding 5,000 fpm.
 - **Temperature:** Performance of the SPARK COOLER® is dependent on the conveying air being at a lower temperature than the spark ember itself. Therefore, the SPARK COOLER® typically operates in air streams with temperatures well below the ignition point of the suspended particulates, but in no case greater than 500°F.



APPLICATIONS AND PERFORMANCE CRITERIA (CONTD.)

Flow Rate, Pressure Drop, Distance Requirements

SIZING		FLOW RATE					OPTIMAL DISTANCE (inches)*			
Spark Cooler Model #	Duct Diameter (inches)	CFM					Upstream Distance	Downstream Distance - GOOD	Downstream Distance - BETTER	Downstream Distance - BEST
SC6	6	490	590	690	790	880	6	30	45	60
SC8	8	870	1050	1220	1400	1570	8	40	60	80
SC10	10	1360	1640	1910	2180	2450	10	50	75	100
SC12	12	1960	2360	2750	3140	3530	12	60	90	120
SC14	14	2670	3210	3740	4280	4810	14	70	105	140
SC16	16	3490	4190	4890	5590	6280	16	80	120	160
SC18	18	4420	5300	6180	7070	7950	18	90	135	180
SC20	20	5450	6540	7640	8730	9820	20	100	150	200
SC22	22	6600	7920	9240	10560	11880	22	110	165	220
SC24	24	7850	9420	11000	12570	14140	24	120	180	240
SC	30-66	12270-106910					-	-	-	-
Velocity (fpm)		2500	3000	3500	4000	4500				
Pressure Loss (w.g.)		0.32	0.46	0.63	0.82	1.04				

* Approx. 1 duct diameter required upstream from Spark Cooler inlet. Required downstream distances from Spark Cooler outlet:
Good = 5 duct diameters, Better = 7 duct diameters, Best = 10 duct diameters

** Standard sizes available up to 100,000 CFM. Please contact the factory for specifications of larger or alternate sizes.

Applications: The SPARK COOLER®

can function to mitigate sparks in metal dust and other carbonaceous dust applications, with low to moderate loading. Applications involving materials prone to accumulation on blades or interior duct surfaces, and applications producing moderate to heavy dust loads can compromise function.

PROCESSES	Ideal Applications
	• Metal Grinding • Resistance Welding • Plasma Cutting • Laser Cutting • Thermal Spray • Carburization • Metal Quenching
SPECIFIC APPLICATIONS	• All Metal Process Industries • Fabrication facilities • Automotive plants • Foundries • Metal Recycling • Robotic weld cells • Battery Recycling • Ball Bearing Manufacturing • Charcoal manufacturing • Shoe grinding (rubber) • Coffee manufacturing
VELOCITY	Optimal: 1500-5000 fpm
TEMPERATURE	Optimal: up to 300°F primary air stream
PARTICLE SIZE	Small-to-medium sized embers
DUCT DISTANCE	Optimal: 10 diameters Effective: 5 diameters Functional: > 1 diameter



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Installation,
Operation, &
Maintenance

INSTALLATION, OPERATION, & MAINTENANCE

Installation: Install the SPARK COOLER(R) to allow a minimum of one duct diameter between the spark source and the inlet of the SPARK COOLER®. Leave a recommended minimum of 10 duct diameters between the outlet of the SPARK COOLER® and the air-material-separator. If ten duct diameters are not available, then install at a location along the duct that leaves the maximum distance possible between the outlet of the SPARK COOLER® and the air-material-separator.

No specialty tools are required for installation or operation. Provide adequate structural support when installing and operating the SPARK COOLER®. On some units, a lifting lug may be included to facilitate installation. This lug is not designed nor intended to bear a long term weight load. Using the lug to support the installed Spark Cooler will void the warranty.

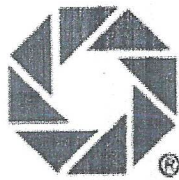
Observing the directional flow arrow on the SPARK COOLER®, install the SPARK COOLER® in line with the duct. For flange mounting, supply gasket material between mating flanges to assure an air-tight seal. For slip-fit mounting, make sure the mating duct connection or mating flex hose connection is air-tight.

Operation: Turn on your system fan and draw process air through the SPARK COOLER®. In appropriate applications, the SPARK COOLER® can function to cool sparks that pass through the unit. The SPARK COOLER® is a static device with no moving parts, so it is off when the system fan is turned off and is on whenever the system fan is turned on.

Maintenance: There are no electronic controls and no water or chemical retardants, making the SPARK COOLER® virtually maintenance-free.

To avoid combustible dust accumulation, periodically check the inside of the SPARK COOLER® and observe whether or not solids accumulate within. In applications where solids arrest against the internal blades of the SPARK COOLER® and/or appreciably adhere to the inside surfaces, a regularly scheduled cleaning should be considered to prevent obstruction.

Warning: If the SPARK COOLER® is provided with access doors, never open the doors when the system is operating. Also, never open access doors when a duct fire is suspected.



**Blender^{INC.}
Products**

CONTACT INFORMATION

Please contact the factory with any questions regarding application, or the contents of this owner's manual.

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