

Blower Frame System



Owner's Manual

Sonny's Enterprises, LLC. 5605 Hiatus Road Tamarac, Florida 33321



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SAFETY REQUIREMENTS

**WARNING*

- 1. All employees must be thoroughly trained in safe operation and standard maintenance practices. All employees must review this entire manual monthly.
- 2. Do not enter the wash tunnel when the equipment is operating. Death or dismemberment may occur.
- 3. Do not wear loose fitting clothing or jewelry around moving equipment. Do not allow any part of your body or other objects (including ladders, hoses or tools) to come in contact with moving equipment. Entanglement may result causing death or dismemberment.
- 4. Do not leave a ladder or any other items such as wash down hoses or tools in the wash tunnel while equipment is running. Vehicle damage and injury, including death, can occur.
- 5. Always exercise caution when walking (never run) through the wash tunnel as there may be slippery conditions. Be careful so you do not bump into or trip over equipment.
- 6. Only those employees specifically instructed and trained by the location management are permitted to enter the wash tunnel to perform inspections or maintenance. At least two qualified maintenance people must be present when performing equipment repairs or preventive maintenance.
- 7. Do not perform any maintenance or work on equipment unless you first perform Lock-Out Safety Precautions. All electrically powered equipment must have manually operated disconnects capable of being locked in the "OFF" position. Equipment that has been "locked out" for any reason must be restarted only by the person who performed the "lock out" operation.
- 8. When working on any equipment that is higher than your shoulders, always use a fiberglass ladder that is in good condition.
- 9. Do not attempt to repair or adjust any pressurized liquid or pneumatic part, hose, pipe or fitting while that equipment is in operation.
- 10. Electrical connections and repairs must be performed by a Licensed Electrician Only.
- 11. Emergency "STOP" buttons must be well marked and their location and proper use reviewed with all personnel. Any activated "STOP" button must be reset only by the person who activated it. Clear the wash tunnel of any people, ladders, hoses, tools and other loose items before restarting the equipment. An audible device must sound to warn people that the equipment is starting.

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- 12. Do not operate any piece of equipment that requires safety covers with those covers removed or improperly installed. Do not operate any piece of equipment if any component of that piece is suspected to be defective or malfunctioning.
- 13. Store all cleaning and washing solutions and oils in a well-ventilated area. Clean up fluid spills immediately to prevent hazardous safety conditions. Be certain to follow all safety procedures on SDS Sheets for each chemical product used.
- 14. All hydraulic and electric systems in the wash tunnel equipped with a torque relief or overload should be checked and set at the minimum amount that will allow for proper functionality under normal washing conditions.
- 15. No unauthorized people should ever be permitted in the wash tunnel or near the equipment at any time.

* * *

!! CAUTION!!

When a piece of equipment must be in operation during inspection or maintenance, one qualified technician must stay at the power disconnect switch while another qualified technician performs the inspection or maintenance.



INTRODUCTION

This Manual contains information that is vital to the successful installation, operation and maintenance of your Sonny's vehicle washing equipment.

Please read, and understand, the full contents of this manual before installation and operation of the equipment. Keep this booklet in a location where it may be used for ongoing reference.

Should you have any questions on the operation or servicing of this equipment please contact:

TECHNICAL SERVICES DEPT. SONNY'S ENTERPRISES INC. 5605 Hiatus Road TAMARAC, FLORIDA 33321

TELEPHONE: 800-327-8723 **FAX**: 800-495-4049

THANK YOU FOR YOUR CONFIDENCE IN SONNY'S!





Product Features

- > Available in 8 (120HP), 10 (150HP), and 13 (195HP), Blower Configurations.
- Frame and legs are constructed from aluminum, with optional finish powder coating in multiple color choices.

8 Blower Configuration (120HP)



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10 Blower Configuration (150HP)



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13 Blower Configuration (195HP)



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Product Specifications

Footprint Length	97" (8 Blower); 172" (10 Blower); 235" (13 Blower)
Footprint Width	130" Beams : 138" (8 Blower); 154" (10/13 Blower)
	144" Beams : 152" (8 Blower); 168" (10/13 Blower)
Unit Height	132"
Vehicle Clearance	90"

Multiple Voltage Options are available:

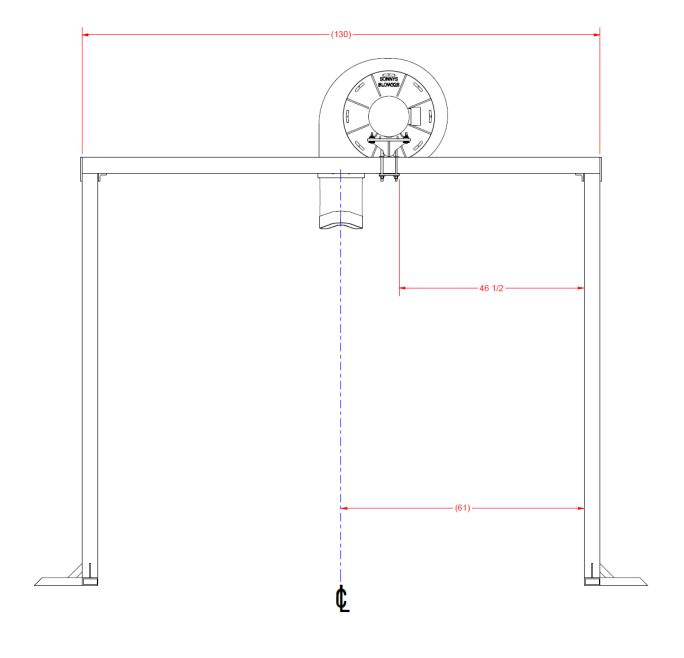
- > 208V/3-Phase/60 Hz
- > 230V-460V/3-Phase/60 Hz 190V-380V/3-Phase/50 Hz

For parts and accessories information, please refer to our catalog or visit our website at **SonnysDirect.com**.



DIMENSIONS

One Blower for Single V-Nozzle – Dimensions and Mounting Specifications

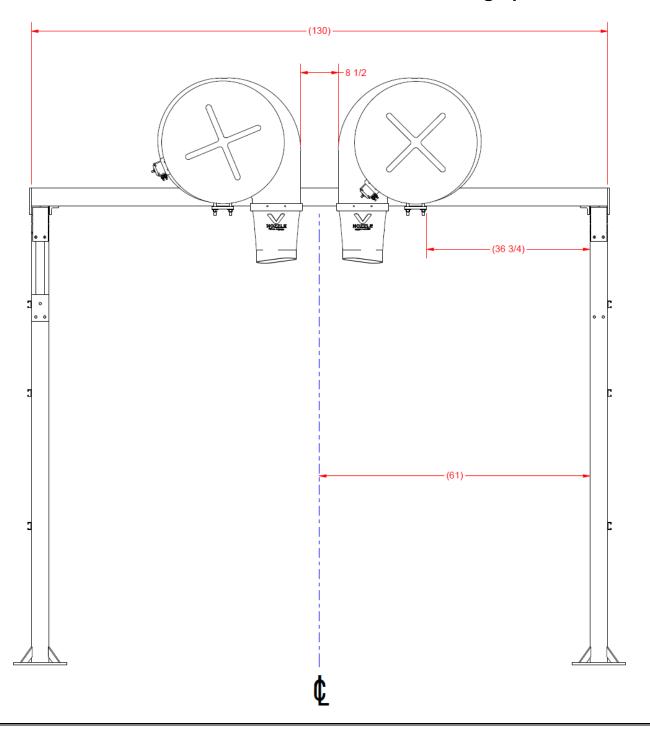


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Two Blowers for Half V-Nozzle - Dimensions and Mounting Specifications

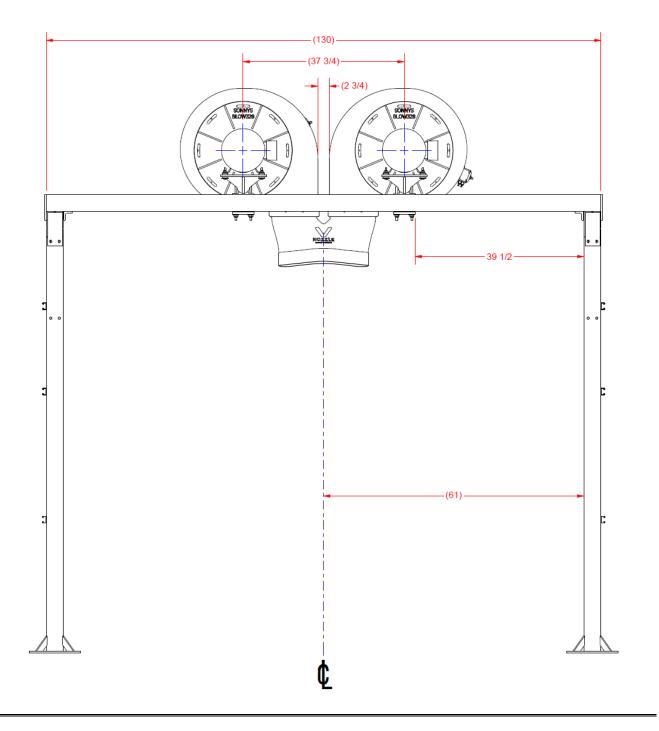


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Two Blowers for Dual V-Nozzle – Dimensions and Mounting Specifications

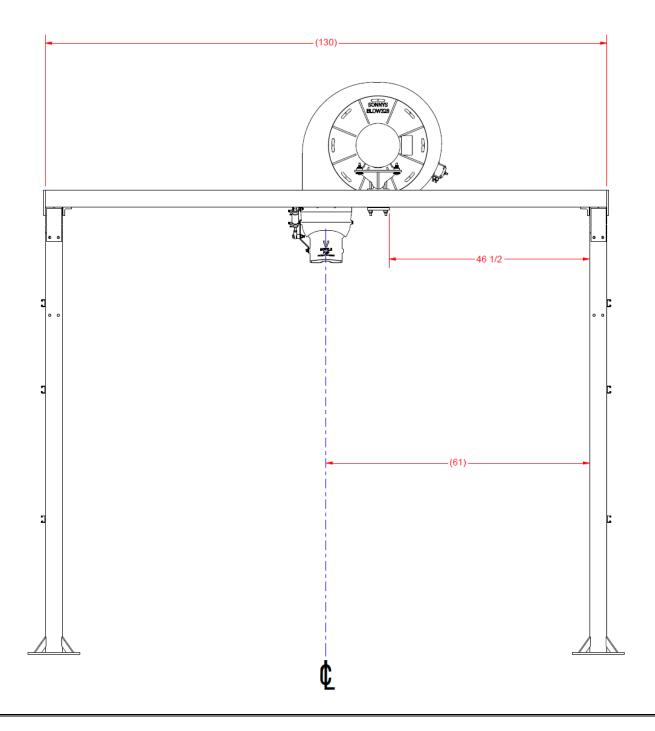


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One Blower for Flip V-Nozzle - Dimensions and Mounting Specifications



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PARTS

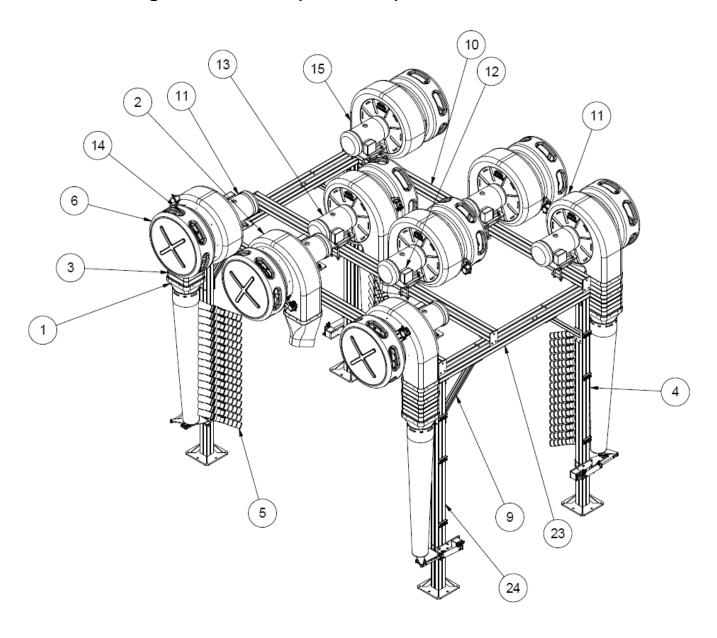
8 Blower Configuration - Parts

ITEM	QTY	PART NUMBER	DESCRIPTION
1	4	10005940	Blower, Elephant Ear Attachment Black
2	4	10007267	Blower, Universal Fan Housing Black
3	8	10009634	Blower, Extension Rectangular Black
4	4	10012375	Blower, Mammoth Dryer Nozzle, Black
5	4	10012665	Mammoth, Green Trunk 12in Set of 16
6	8	10012958	Blower Inlet Silencer, Housing Black
7	1	10013085	Blower, Single V Nozzle Black
8	1	10013088	Blower, Double V-Nozzle Black
9	4	20001961	Brace, Standard
10	3	20004647	Blower, Top Weldment 130"
11	2	20005389	Blower, Mammoth CW Producer Black
12	1	20005440	Blower, 15HP CW Producer Sub-Assembly
13	3	20005441	Blower, 15HP CCW Producer Sub-Assembly
14	6	20005457	Blower, Gator Black Kit
15	2	20005464	Blower, Mammoth CCW Producer Black
16	1	20016428-DS	Mammoth Pivoting Cylinder Mounting Kit
17	1	20016428-ENT-DS	Mammoth Pivoting Cylinder Mounting Kit
18	1	20016428-ENT-PS	Mammoth Pivoting Cylinder Mounting Kit
19	1	20016428-PS	Mammoth Pivoting Cylinder Mounting Kit
20	2	20016429	Mammoth Pivoting Bracket DS Mounting Kit
21	2	20016430	Mammoth Pivoting Bracket PS Mounting Kit
22	1	20018832	Blower, Flip V-Nozzle Assembly Black
23	2	20018842	Blower Frame Leg Top Beam Weldment
24	4	20018860	Blower Frame Leg Bottom Post Weldment

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8 Blower Configuration – Parts (Continued)

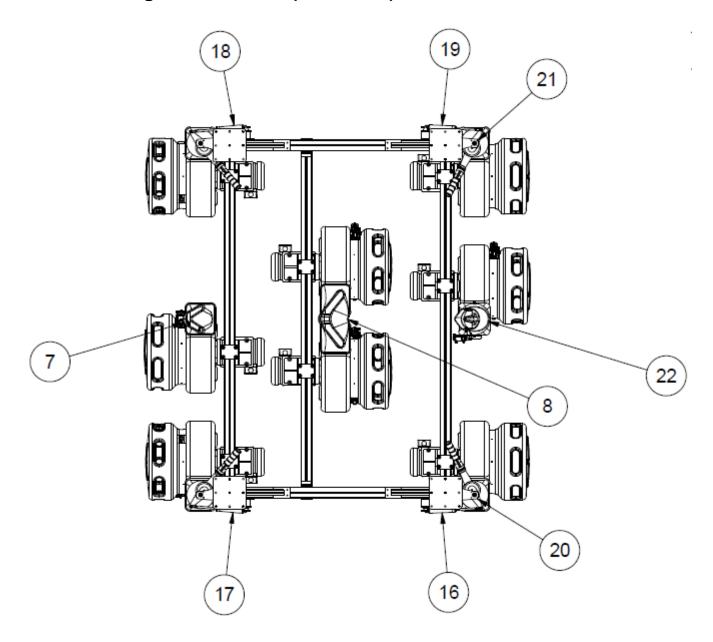


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8 Blower Configuration – Parts (Continued)



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10 Blower Configuration - Parts

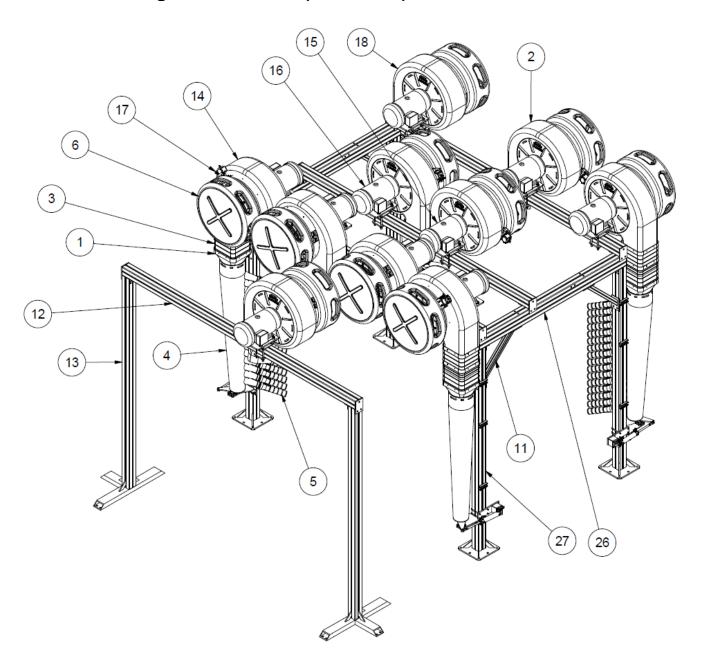
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2	6	10007267	Blower, Universal Fan Housing Black
3	8	10009634	Blower, Extension Rectangular Black
4	4	10012375	Blower, Mammoth Dryer Nozzle, Black
5	4	10012665	Mammoth, Green Trunk 12in Set of 16
6	10	10012958	Blower Inlet Silencer, Housing Black
7	1	10013085	Blower, Single V Nozzle Black
8	1	10013088	Blower, Double V-Nozzle Black
9	1	10013524	Blower, Half V-Nozzle DS Black
10	1	10013527	Blower, Half V-Nozzle PS Black
11	4	20001961	Brace, Standard
12	4	20004647	Blower, Top Weldment 130"
13	2	20004649	Blower, Leg Weldment
14	2	20005389	Blower, Mammoth CW Producer Black
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23	2	20016429	Mammoth Pivoting Bracket DS Mounting Kit
24	2	20016430	Mammoth Pivoting Bracket PS Mounting Kit
25	1	20018832	Blower, Flip V-Nozzle Assembly Black
26	2	20018842	Blower Frame Leg Top Beam Weldment
27	4	20018860	Blower Frame Leg Bottom Post Weldment

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10 Blower Configuration - Parts (Continued)

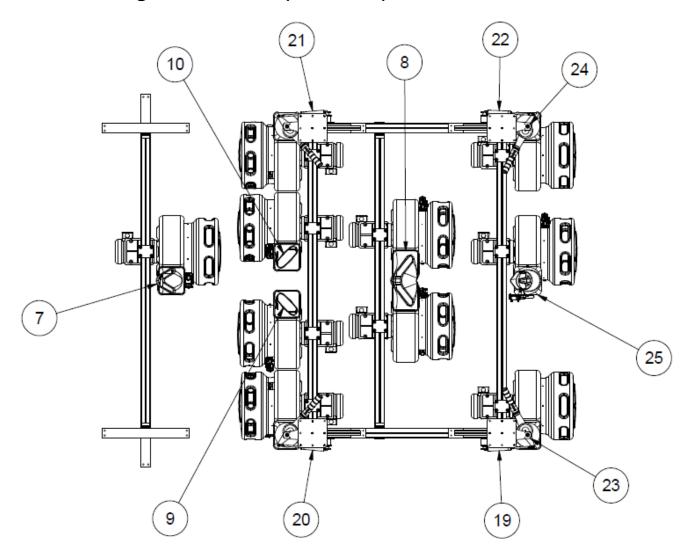


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10 Blower Configuration – Parts (Continued)



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13 Blower Configuration – Parts

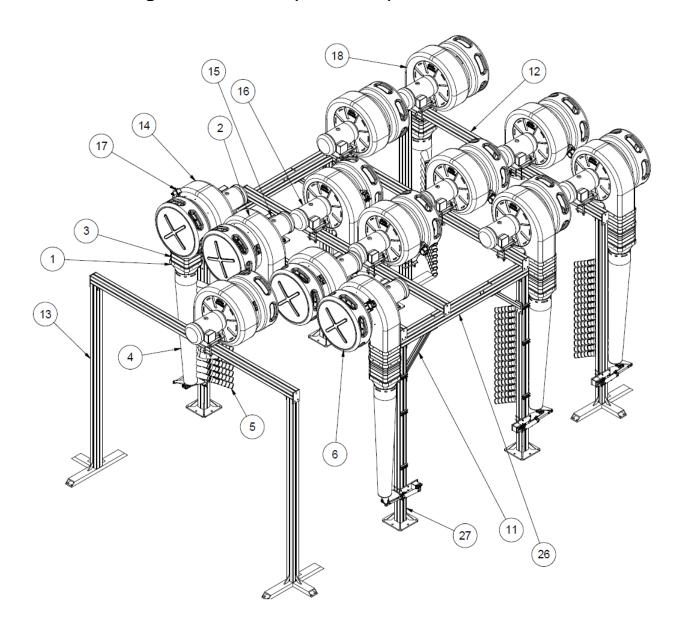
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2	7	10007267	Blower, Universal Fan Housing Black
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5	6	10012665	Mammoth, Green Trunk 12in Set of 16
6	13	10012958	Blower Inlet Silencer, Housing Black
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11	4	20001961	Brace, Standard
12	5	20004647	Blower, Top Weldment 130"
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14	3	20005389	Blower, Mammoth CW Producer Black
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13 Blower Configuration - Parts (continued)

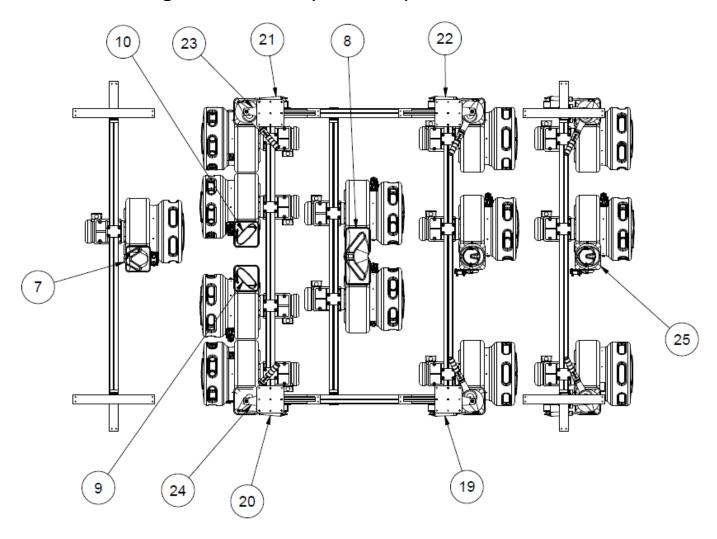


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13 Blower Configuration - Parts (continued)



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INSTALLATION

Utilities Requirements

Utilities interconnection and the materials required for interconnection to Sonny's equipment are the responsibility of the customer.

Perform all trade work to all applicable local and national codes.

Electric

The Customer's Electrician is responsible for:

- The Customer's Electrician is to provide materials and install single phase power from the Customer's equipment programmer (equipment start-stop system) to the actuation controls for each electric motor on the air dryer.
- The Customer's Electrician is to provide materials and install 3-phase power (see voltage options below) to the air dryer electric motors on the blower arch system through properly sized 3 pole circuit breakers and motor starters with 3 thermal overloads.

Voltage Options:

- 208V/3-Phase/60 Hz
- 230V-460V/3-Phase/60 Hz 190V-380V/3-Phase/50 Hz

BE CERTAIN THAT ALL ELECTRIC MOTORS ARE PROPERLY WIRED FOR THE SUPPLY VOLTAGE BEING USED!

Technical Disclaimer

 Although building codes have been considered in developing all drawings, verification of sitespecific conditions and compliance with federal, state, and local building codes is the exclusive responsibility of the customer and/or architect and engineer.

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Arch Installation

Tools

- 1. Safety Glasses
- 2. 1/2" Drive Ratchet Set
- 3. Standard Combo Wrenches
- 4. Impact Wrench Set
- 5. 4' Level
- 6. 3 lb. Sledgehammer
- 7. 1" Hammer Drill
- 8. Pry Bar
- 9. Tape Measure
- 10. Permanent Marker

Consumables

1. Teflon Paste or Teflon Tape

Work Force

(2) person

Time (assuming no problems)

2.00 - 3.00 hours

Installation Steps

- 1. Determine where the arch is to be installed.
- 2. Sweep any debris from where the arch will stand.
- 3. Place the arch mounting posts on the passenger and driver sides according to the dimensions on the tunnel layout diagram. DO NOT permanently anchor the base plates.

Note: Before anchoring the frame into position have a second person double check all measurements against your tunnel equipment layout drawings to ensure all measurements were performed correctly.

- 4. Check that the side leg posts are vertically plum and the top cross beam is level.
- 5. Shim the mounting pads as necessary to achieve level and plum conditions.
- 6. Anchor the mounting pads to the concrete floor using the wedge anchors provided.

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Blower Installation

Tools

- 1. Safety Glasses
- 2. ½" Drive Ratchet Set
- 3. Standard Combo Wrenches
- 4. Large Standard Screwdriver
- 5. 1" Hammer Drill
- 6. 3 lb. Sledgehammer
- 7. Tape Measure
- 8. Lifting Strap

Work Force

Two (2) persons

Consumables

1. Stainless Shims

Time (assuming no problems)

1.00 - 6.00 hours

Installation Steps

- 1. Using the lifting strap, wrap it around the blower motor and raise the blower with the forklift.
- 2. Using the forklift, bring each blower into the tunnel area, one at a time.
- 3. The first blower(s) to be installed will be the center blower(s) beginning at the area closest to the entrance and working your way outward as needed.
- 4. Unscrew the U-bolts on the blower motor bracket and remove the bottom portion of the bracket, setting it aside.
- 5. Lower the blower onto the crossbeam, making certain that the edge of the blower housing lines up with the **Dimensions and Mounting Specifications** drawing (this will depend on the blower layout.)

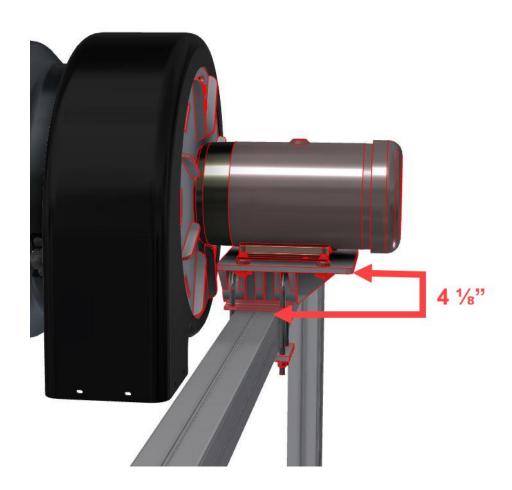
Note: Refer to the **Dimensions and Mounting Specifications** drawings (pages 10-13) for blower placement.

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- 6. Replace the bottom portion of the bracket and the U-bolts, sandwiching the cross beam between the two (2) brackets.
- 7. Make sure the upper bracket is level with the blower mounting bracket. It should measure four and one eighth inches (4 1/2") from the top of the crossbeam to the bottom of the motor mount plate. Tighten the U-bolts being sure to have even thread spacing on both sides of the U-bolts.



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MAINTENANCE

FOR THE FIRST MONTH OF OPERATION CHECK ALL HARDWARE AND FITTINGS FOR TIGHTNESS EACH WEEK!

DAILY

- Check each producer for proper operation, listening for any unusual noises and correct the cause of any unusual vibration.
- Remove any debris from the air inlet screen on the air producers.
- Check the optional top oscillator or flip nozzle for proper operation.

MONTHLY

- Inspect all hardware and fittings for tightness.
- Thoroughly clean the framework, blower housing and each impeller of dirt and debris.

ANNUALLY

- Measure and Record Full Load Amp Readings.
- Measure and record, full load current readings from each of the three legs of each of the three phase electric motors.
- If the differential of current load exceeds 10% between the legs, or the balanced load current of all three legs has increased over 10% since the most recent measurements, order a replacement motor.
- Record readings in the semi-annual log.
- Grease all electrical motors on the blowers with a high-temperature grease, rated for at least 160 degree Fahrenheit.



CUSTOMER SERVICE

Need more help?

For questions regarding **installation and/or operational issues and settings**, please contact Sonny's Tech Support at extension 234 or email at Sonnys-Support@SonnysDirect.com.

To order **replacement parts**, contact Customer Service at ext. 200, email us at CustomerService@SonnysDirect.com or visit us on the web at www.SonnysDirect.com.

 Toll Free Main Line
 800-327-8723

 Local Number
 954-720-4100

Customer Service Option 3
Equipment Sales Option 4
Technical Support Option 5

Or you can email Equipment Sales at sales@SonnysDirect.com

Thank you for being a Sonny's car wash equipment owner!

From all of us here at





WARRANTY

SONNY'S ENTERPRISES, INC. FACTORY LIMITED LIFETIME WARRANTY

Equipment manufactured by SONNY'S ENTERPRISES, INC. is warranted to be free from defect in material and workmanship. Welded metal framework and other non-moving, non-wearable fabricated metal components manufactured by Sonny's are warranted for the life of the equipment to the original purchaser. Fabricated metal wearable surface and moving components manufactured by Sonny's are warranted for a period of one (1) year to the original purchaser of the equipment.

All components assembled to Sonny's equipment that are manufactured by others are warranted by the appropriate manufacturer and subject to that manufacturer's limited warranty. Contact Sonny's for the specific information on other component manufacturer's warranty terms. All new cloth shipped with new Sonny's equipment is warranted for a period of one (1) year or 80,000, whichever occurs first.

This warranty is not assignable or transferable. The warranty period begins the first day following installation or 30 days from the original invoice date, whichever occurs first. The Seller's liability shall be limited to repair or replacement of materials found to be defective within the warranty period. In the event of repair or replacement this limited warranty is noncumulative. The Purchaser must supply the Seller with immediate written notice when any defects are found. The Seller shall have the option of requiring the return of defective material to establish the Purchaser's claim. Neither labor nor transportation charges are included in this warranty. Transportation damage claims are to be submitted to the carrier of the damaged materials.

This warranty is based upon the Purchaser's reasonable care and maintenance of the warranted equipment. It does not apply to any equipment which has been subject to misuse, including neglect, accident or exposure to harsh chemicals or chemicals that react violently with: water, organic acids (e.g. acetic acid), inorganic acids (e.g. hydrofluoric acid), oxidizing agents (e.g. peroxides), and metals (e.g. aluminum). Chemicals corrosive to: aluminum alloys, carbon steel, and other metals. Nor does it apply to any equipment which has been repaired or altered by anyone not so authorized by Sonny's. Further, the equipment must be properly installed with proper accuracy of all specified plumbing, electrical, and mechanical requirements. This warranty does not apply to normal wear and tear or routine maintenance components.

EXCEPT AS EXPRESSLY STATED HEREIN, SONNY'S SHALL NOT BE LIABLE FOR DAMAGES OF ANY KIND IN CONNECTION WITH THE PURCHASE, MAINTENANCE, OR USE OF THIS EQUIPMENT INCLUDING LOSS OF PROFITS AND ALL CLAIMS FOR CONSEQUENTIAL DAMAGES. THE LIMITED WARRANTY EXPRESSED HEREIN IS IN LIEU OF ALL OTHER WARRANTIES EXPRESSED OR IMPLIED. SONNY'S NEITHER ASSUMES NOR AUTHORIZES ANY PERSON TO ASSUME FOR IT ANY OTHER OBLIGATION OR LIABILITY IN CONNECTION HEREWITH.