Product Support & Contact Information

Snap-Fans are high efficiency ventilation fans designed to be used in ventilation applications. Using this equipment for any other purpose or in a manner not consistent with the operating recommendations within this manual will void the warranty and may cause personal injury.



Fogco 600 S 56th St, Ste 9 Chandler, AZ 85226 480-507-6478

For claims, please contact your retailer directly or email us at: info@fogco.com Visit snap-fan.com for replacement parts

RETAIL RETURN POLICY Only applicable if you ordered directly from Fogco.

The goal of Fogco is that its customers be completely satisfied with their purchase. If you are not completely satisfied, you have 30 days from the date of purchase to return the unused, undamaged product. Please first contact Fogco to obtain authorization for the return and RGA # and then return the product to Fogco. All returns are subject to a 25% restocking fee. Upon receipt, the purchase price, less any restocking fee, will be refunded so long as the product and its packaging is in merchantable condition. No returns will be accepted for products that are not in a merchantable condition. No returns will be accepted without prior authorization and all shipping costs are the sole responsibility of the purchaser. No returns will be accepted for products purchased from somewhere other than directly from Fogco – any such returns should be made to that location and made in conformance with that location's own return policy, (if any), Finally, no returns will be accepted for custom made or special order items. If you have any questions about this policy, please contact us. LIMITED WARRANTY

WARRANTY AND DISCLAIMER: Fogo extends this limited warranty to the original purchaser (the "Purchaser") and warrants that fans supplied by Fogco shall be free from original defects in workmanship and materials for five years from date of shipment, and warrants that electronics and fan accessories be free from original defects in workmanship and materials for one year from date of shipment provided those products have been properly handled, stored, installed, serviced, maintained and operated. This warranty shall not apply to products which have been improperly installed, altered or repaired without Fogco's express authorization, or altered or repaired in any way so as, in Fogco's judgment, to affect its performance or reliability or subjected to misuse, negligence, or accident, or incorrectly used in combination with other products. Improper installation specifically includes, but is not limited to: (1) the use of the Product in an environment where it is exposed to nominal voltage in excess of 24 volts DC, or in the case of an AC Product, in excess of the voltage specified on the Product

("overvoltage"); (2) use or storage in a setting where the product is exposed to inclement weather. Any damage that Fogco determines, in its sole discretion, as resulting from misuse shall not be covered by any warranty.

LIMITATION OF REMEDY AND DAMAGES: All claims under this warranty must be first made by telephone to Fogco at 480-507-5478, within 15 days after discovery of the defect and prior to the expiration of five years from the date of shipment by the Company of the product claimed defective, and Purchaser shall be barred from any remedy if Purchaser fails to make such claim within such period.

Within 30 days after receipt of a timely claim, Fogco will authorize the Purchaser to return the product to Fogco at Purchaser's sole expense for inspection by Fogco. Following such inspection, Fogco will replace, or at its option repair, free of charge, any product it determines to be defective, and it shall ship the repaired or replacement product to Purchaser F.O.B. point of shipment; provided, however, if circumstances are such that as in Fogco's sole judgment repair or replacement is impractical or that the repair or replacement would result in further warranty work due to the particular use of the Product, the Purchaser's sole and exclusive remedy shall be a refund to the Purchaser of any part of the invoice price paid to Fogco for the defective Product or part.

Under no circumstances shall Fogco be responsible for the cost of removal of the defective Product or part, damages due to removal, or any expenses incurred in shipping the Product or part to or from Fogco, or the installation of the repaired or replaced Product or part. The warranties set forth above do not apply to any components, accessories, parts or attachments manufactured by other manufacturers; such being subject to that manufacturer's warranty, if any. To the extent not prohibited by that manufacturer's warranty, Fogco shall pass through to Purchaser such manufacturer's warranty.

THIS WARRANTY IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, ARISING BY LAW OR OTHERWISE, INCLUDING WITHOUT LIMITATION THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, WHICH ARE HEREBY EXPRESSLY DISCLAIMED AND WAIVED. THIS WARRANTY CONSTITUTES SNAP-FAN'S SOLE AND EXCLUSIVE WARRANTY FOR DEFECTIVE GOODS AND PURCHASER'S SOLE AND EXCLUSIVE REMEDY FOR DEFECTIVE

No employee, agent, dealer, or other person is authorized to give any warranties on behalf of Fogco or to assume for Fogco any other liability in connection with any of its products except in writing and signed by an officer of Fogco.

TECHNICAL ADVICE AND RECOMMENDATIONS, DISCLAIMER: Notwithstanding any past practice or dealings or any custom of the trade, sales shall not include the furnishing of technical advice or assistance or system design. Any such assistance shall be at Fogco's sole option and may be subject to additional charge.

Fogco assumes no obligation or liability on account of any recommendations, opinions or advice as to the choice, installation or use of products. Any such recommendations, opinions or advice are given and shall be accepted at Purchaser's sole risk and shall not constitute any warranty or guarantee of such Products, their performance, or their suitability for any particular purpose

LIMITATION OF LIABILITY: The cumulative liability of Fogco to the Purchaser and any other persons for all claims in any way relating to or arising out of the Products, including, but not limited to, any cause of action sounding in contract, tort, or strict liability, shall not exceed the total amount of the purchase price paid for those Products which are the subject of any such claim. This limitation of liability is intended to apply without regard to whether other provisions of this agreement have been breached or have proven ineffective even if Fogco has been advised of the possibility of such claims or demands. In no event shall Fogco be liable to the Purchaser or any other person for any loss of profits or any incidental, special, exemplary, or consequential damages for any claims or demands brought by the Purchaser or such other

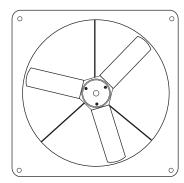
INDEMNITY: Fogco's maximum liability to Purchaser and to any other user is as set forth above. Fogco makes no warranty to anyone for any products not manufactured by it and shall have no liability for any use or installation of any Products (whether manufactured by Fogco or other manufacturers) not specifically authorized by this sale. Purchaser acknowledges various warnings by Fogco regarding the products and its installation and use and acknowledges that the Product should only be installed by a competently trained and licensed electrician or contractor. If Fogco incurs any claims, lawsuits, settlements, or expenses (including attorney fees) for any loss, injury, death or property damage including, but not limited to, claims arising out of the Purchaser's or any end user's installation or use of the products, the

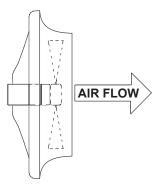
shall indemnify and hold Foqco harmless unless such injury, death, or property damage unless such was the result of Foqco's sole nealigence or willful misconduct...

SNAP-FAN INSTALLATION



Only a qualified and licensed electrician or contractor should install or service Snap-Fan products. If someone other than a licensed electrician installs a Snap-Fan, Snap-Fan disclaims all warranties for the product, and specifically disclaims any warranty for consequential damages.





Safety Information



All applicable electrical safety precautions and building codes must be adhered to and followed when installing this product.



Occupational Safety and Health Administration (OSHA) requires finger guards at locations under seven feet from the floor.



Refer to installation and operation manuals before installing, servicing or operating this unit.



DO NOT CUT AWAY ANY FRAMING FROM THE ORIGINAL STRUCTURE, AS IT MAY EFFECT LOAD BEARING CAPACITY.

AC FAN WIRING

 $\overline{\mathbb{N}}$

Only qualified personnel should install or perform maintenance on Snap-Fan, Snap-Fan controllers and Snap-Fan motor.

INPUT POWER

CONTROL INPUT

Brown = VARIABLE SPEED: Frequency 10-95%

Blue = VARIABLE SPEED: + 2-10 VDC

Red = VARIABLE SPEED: 4-20mA

Black = VARIABLE SPEED : Common

Yellow = 10 VDC Source

White = Speed Reference

Red = Voltage

Selection Jumpers

Green = POWFR: Ground

Black = Neutral

White = Line

Follow instructions in sections 1-4 to correctly configure your Snap-Fan for operation.

Complete the following steps BEFORE connecting your fan to power.

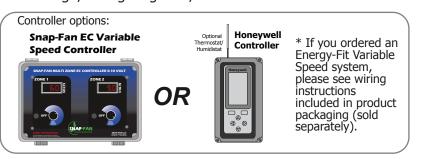
- 1. Motor Voltage Selection
- 2. Verify Rotation Direction
- 3. Verify Speed Mode
- 4. Complete Fan Mounting

NOTE: If Local Speed Adjust is selected in step three, fan will start as soon as connected to power supply. Ensure fan is securely mounted before wiring motor to power supply.

Once all above sections have been reviewed, and desired settings confirmed, make line, neutral and ground connections according

to nameplate details and wiring diagram above. Make sure that all unused conductors are insulated to avoid malfunction or damage. Install compatible weather tight cord grips or plugs in motor's junction box knockouts appropriate to wiring configuration. For remote speed adjustment low voltage signal conductors should be routed through separate cord grip from line voltage conductors.

DANGER! Connect the motor properly to power supply by means of safe and permanent contacts. Always review carefully the information on the motor nameplate and instructions, such as rated voltage, wiring diagrams, etc.



3.3 Adjusting Maximum Speed Value:

- 1. Select Local Speed Adjust with DIP switch number 1 (switch in ON position).
- 2. Using the tact buttons, adjust the speed to the value desired to be maximum.
- 3. Select Remote Speed Adjust in the DIP switch number 2 (switch in OFF position).
- 4. Motor will now not exceed your locally selected max RPM when running under remote adjustment control.

3.4 Status LED

This Snap-Fan motor has an LED in the opening on the back side of motor drive that indicates the motor status.

- LED will stay ON while the motor is running.
- LED will stay OFF while the motor is stopped.
 - o LED OFF does not mean that there is no power to the motor drive. Ensure power is disconnected before performing any maintenance.

LED Status Codes				
Blinking Periods	Fault	ON Time	OFF Time	Wait/Interval Time (off)
2	Under Voltage	0.1 sec	0.1 sec	-
3	Overload/Over Current	0.25 sec	0.25 sec	2 sec
6	Overvoltage			
9	Communication Timeout			
10	Watchdog Timeout			
11	Locked Rotor			

4. Fan Mounting:

- 1. The motor must always be positioned so the drain hole is at the lowest possible position.
- 2. Motors leave factory with drain hole plugs in closed position. Drain plugs should remain in closed position during normal operation.
- 3. Drain holes should be opened periodically during maintenance procedures to allow the exit of condensed water.







Figure 5.1 - Drain position

Figure 5.2 - Drain closed

Figure 5.3 - Drain onen

ATTENTION: Motors installed outdoors or in vertical position require the use of additional shelter to protect them from water.

3.2 Remote Speed Adjustment:

The motor speed can be adjusted by the input signals available in the control cable.

- DC Voltage: 2-10V DC (Blue & Black signal wires figure 3.2)
- DC Current: 4-20mA DC (Red & Black signal wires figure 3.3)
- Frequency Duty-Cycle: 10-95% (Brown & Black signal wires figure 3.4) o Voltage 10-24Vpk
 - o Frequency 80Hz
- The motor will turn off if it receives signals lower than 2V DC, 4mA DC or 10%.

NOTE: The DC voltage signal can be applied by an external power supply or by using the built-in 10V DC source and an additional potentiometer for speed adjustment (figure 3.1).

ATTENTION:

- The built in power supply has output limit of 25mW, or 2.5mA
- The motor can be permanently damaged if connected to signals out of the specification.
- Make sure that all unused conductors in control cable are insulated to avoid malfunction or damage.
 - Control cable electrical connections diagram:

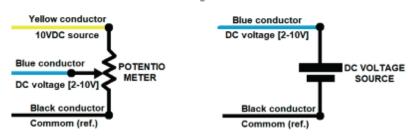


Figure 3.1 - DC voltage input (using built-in power supply)

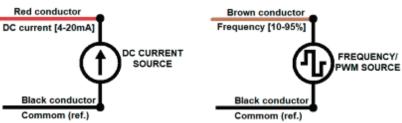


Figure 3.3 - DC current input Figure 3.4 - Frequency input

Figure 3.2 - DC voltage input (using external

power supply)



four retention screws in corners. Install compatible weather tight cord grips or plugs in motor's junction box knockouts appropriate to wiring configuration. For remote speed adjustment low voltage signal conductors should be

1. Motor Voltage Selection:

1. **Interconnect** the jumper leads in motor junction box to select for connection to **115V** input voltage supply.





2. Keep the jumper leads disconnected to select for connection to 208-277V input voltage supply. (DEFAULT)



ATTENTION: Always ensure that junction box cord grips and cover are securely installed before powering and operating fan. Make sure that all unused conductors in control cable are insulated to avoid product damage.

Remove the cover of motor's junction box by loosening and removing the

routed through separate cord grip from line voltage conductors.

Make line, neutral and ground connections according to nameplate details and wiring diagram on page 2.

DANGER!

- Make sure the jumper terminals in motor junction box are insulated to avoid electrical shock.
- SHOCK RISK! Do NOT touch the jumper terminals after the product is powered.
- Always connect equipment to ground protection.

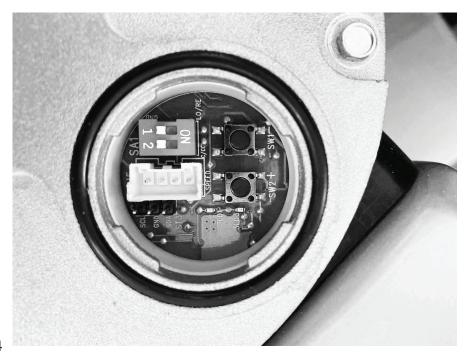
2. Rotation Direction:

NOTE: The correct rotation direction for your Snap-Fan has been preset from the factory. For best performance do NOT change the direction of rotation.

- 1. Remove the plastic lid from the back side of the motor drive cover by rotating counter clockwise.
- 2. Use the DIP switch #2 to select the rotation direction (as viewed from the shaft end of motor).
 - a. ON position counter clockwise (CCW) rotation
 - b. OFF position clockwise (CW) rotation (DEFAULT SETTING)
- 3. Reinstall the plastic lid to the back side of the drive cover after adjust.

NOTE: If the rotation direction is changed while the product is running, the motor will decelerate, reverse the direction and accelerate to the same speed that was running before.

ATTENTION: After removing and reinstalling, make sure the plastic lid from the back side of the drive cover is securely closed to guarantee proper protection.



3. Speed Adjustment:

NOTE: Remote Speed Adjust is the default setting from the factory. If you are using a compatible external speed controller no change is needed. If you will not be using an external speed controller, switch to Local Speed Adjust. When fan is in Local Speed Adjust mode it will run as soon as motor is connected to power. Ensure fan is securely mounted before connecting to power.

Motor speed can be adjusted with local adjust (buttons on motor) or remote adjust (via control cable).

To select between local or remote speed adjust:

- 1. Remove the plastic lid from the back side of the motor drive cover.
- 2. Use the DIP switch number 1 to select between Local Adjust (switch in ON), or Remote Speed Adjust (switch in OFF).
- 3. Reinstall the plastic lid to the back side of the drive cover after completing adjustment.

3.1 Local Speed Adjust:

- 1. Remove the plastic lid from the back side of the drive cover.
- 2. Use the two tact buttons located in the opening of the back cover to change speed.
- 3. Keep pressing SW1 to decelerate, or SW2 to accelerate the motor.
- 4. The motor will turn off when the speed reaches a value lower than the minimum run speed.
- 5. The motor will not go to speeds higher than the value set to be the maximum speed by manufacturer.
- 6. Reinstall the plastic lid to the back side of the drive cover after completing adjustment.

NOTE: The standard maximum speed value is preset by Snap-Fan to be the highest value of the speed range, but it can be changed by the user.

NOTE: The product has speed memory when operating in local speed adjustment. The last speed adjusted will be kept in the memory when the input power supply is removed. The motor will accelerate to the memorized speed when the input power supply is reconnected.

NOTE: The local controls inside the opening on the back cover are totally insulated. There is no risk of shock when touching any internal part of this opening, even when motor is running.