

Installation & Maintenance



MFT-S MIXED FLOW IN-LINE FANS

SAFETY INSTRUCTIONS

NOTICE MFT-S mixed flow in-line fans are not explosion proof and should not be used when a potentially explosive situation exists. Do not use where temperatures will exceed 140 F/60 C.

A WARNING

TO REDUCE THE RISK OF FIRE, ELECTRIC SHOCK, INJURY TO PERSONS, PLEASE READ THESE INSTRUCTIONS CAREFULLY

- Before servicing or cleaning the unit, ensure that the electrical service to the fan is locked in the "OFF" position to prevent power from being switched on accidentally. When the service disconnecting means cannot be locked, securely fasten a prominent warning device such as a tag to the service panel. Do not re-establish power supply until the fan has been completely installed.
- 2. Use this unit only in the manner intended by the manufacturer. If you have questions, contact the factory.
- 3. A qualified person(s) must perform installation work and electrical wiring in accordance with all applicable codes and standards, including fire-rated construction codes and standards.
- 4. The combustion airflow needed for safe operation of fuel burning equipment may be affected by this unit's operation. Follow the heating equipment manufacturer's guidelines and safety standards as published by the National Fire Protection Association (NFPA), the American Society of Heating, Refrigeration, and Air Conditioning Engineers (ASHRAE), and the local code authorities.
- 5. When cutting or drilling into walls or ceilings, take care not to damage electrical wires and other hidden utilities.
- 6. When used to exhaust moist / humid air, fans must always be vented to the outdoors.
- 7. This unit may have sharp edges. Use caution to avoid injury when installing and cleaning.
- 8. The fan is intended to be hard wired to a properly rated electrical circuit, and must be properly grounded. Do not use an extension cord.

A CAUTION

- 1. For general ventilating use only. For use in non-fire installations only. Do not use to exhaust hazardous or explosive materials and vapors.
- 2. For interior use only. Mount with the lowest moving parts at least 8 feet (2.5 meters) above the floor or grade level.
- 3. To avoid motor damage and noisy and/or unbalanced impeller, keep the fan clean from drywall spray, construction dust, etc.
- 4. Before installing the unit, check for any visible damage to the impeller and housing. The housing internals must be free of debris, which can damage the impeller blades.
- 5. Please read the specification label on product for further information and requirements.
- 6. Not for installation by any person that is unable to follow these safety guidelines.
- 7. Connect through switch built into fixed wiring. The gap between the breaker contacts on all poles must be no less than 1/8".
- 8. To ensure optimal airflow, do not close or block the unit inlet or outlet. Do not sit or put objects on the unit.
- 9. Store the fan in manufacturer's packaging in a ventilated room at temperatures between 41 F and 104 F. Relative humidity should not exceed 80%.

MFT-S MIXED FLOW IN-LINE FANS

MFT-S fans are made of white plastic. Delivery set includes:

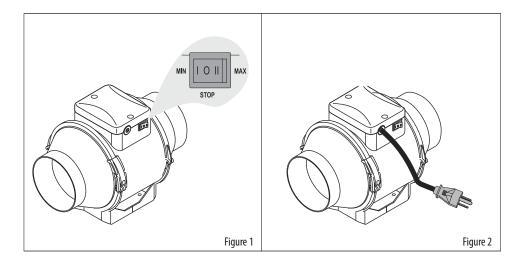
- Fan -1
- Screws with plugs 4

Depending on model, fan is compatible with 4" (100 mm), 5" (125mm), or 6" (150mm) diameter duct.

MFT-S fans are equipped with an integrated three-position speed switch (Figure 1), and feature the following operation modes:

- "0" turned off, the fan is not operating
- "I" the fan is operating at minimum speed
- "II" the fan is operating at maximum speed

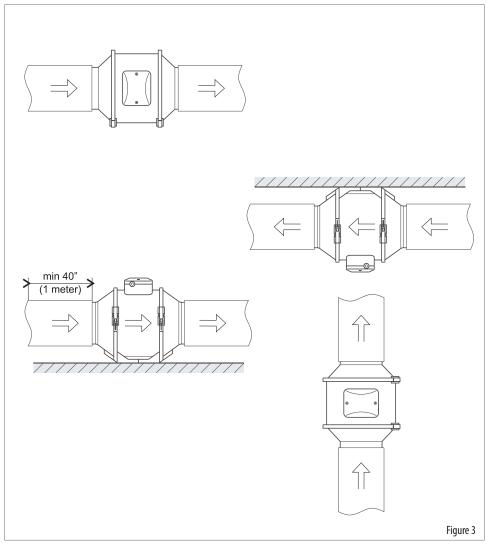
MFT-S-C fans are equipped with a power cord. (Figure 2)



The wiring diagram for MFT-S models is shown in Figure 14 and for MFT-S-C models in Figure 15. Fans are designed for continuous operation. Protection rating from access to dangerous parts and water penetration is IPX4. Fans can be operated at ambient temperatures between 37 F and 107 F.

TYPICAL FAN INSTALLATION

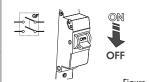
Fans may be mounted either vertically or horizontally (Figure 3) and used separately or as a set for parallel or in-line mounting. An air duct at least 40 inches (1 meter) long should be connected to the inlet. The outlet should always be connected to an air duct.

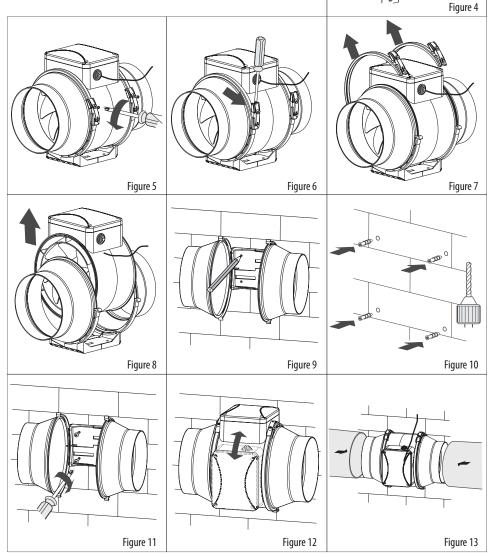


FAN INSTALLATION

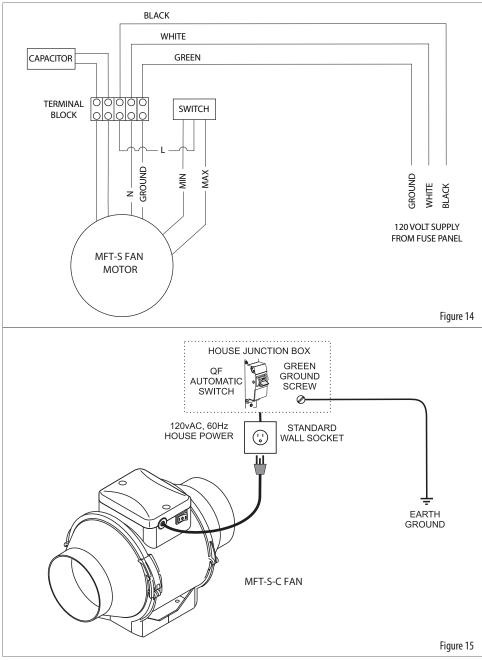
▲ WARNING Disconnect and lock out power supply before performing any installation work. Working on or near energized equipment could result in death or serious injury.

Fan installation is shown in Figures 4-13. The airflow direction should match that indicated on the fan housing. Exhausted air must not contain any dust or other solid impurities, sticky substances or fibrous materials.





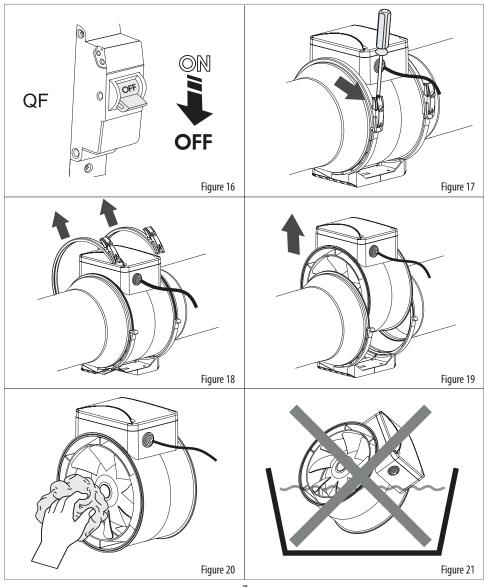
WIRING DIAGRAMS



RECOMMENDED MAINTENANCE

A WARNING Make sure to disconnect the fan from the power mains prior to any cleaning. Proper maintenance (Figures 16-21) includes periodic cleaning of the fan surfaces from dirt and dust.

The impeller blades require thorough cleaning every 6 months. Remove the self-tapping screws (Figure 18) and disconnect the grill from the casing (Figure 19). Wipe the fan blades with a soft cloth soaked in a mild detergent, avoiding dripping on the electric motor.



ACCEPTANCE CERTIFICATE

The MFT-S fan has	s been duly certified as serv	iceable.
☐ MFT100S	☐ MFT125S	☐ MFT150S
☐ MFT100S-C	☐ MFT125S-C	☐ MFT150S-C
Manufactured on (o	date):	
Date of sale:		
Sold by:(name of trading enterprise	, stamp of store)	
	CONNECTION CERT	TIFICATE
Company name:		
Electrician name: _		
Date:	_Signature:	
Due to constant prodithis manual.	uct improvements, some models ma	ay differ slightly from those portrayed in

MFT-S-I&M-1705

