

Product Overview

For venting hot air from equipment rooms and closets. The unit easily installs in a standard 2'x2' ceiling grid and uses nine professional grade 120mm DC fans to vent up to 1000cfm of air (standard version 575cfm). The fans are generally divided into 2 banks of fans, one bank with 4 fans, one with 5 and 3 banks on the ALT version. Each bank can be powered and controlled independently to provide for efficiency and redundancy in the cooling system. There are various control options with the main feature of automatically turning the fans on and off. More advanced control options can change the speed of the fans and provide various other features. This means that the fans only run when necessary which saves energy and increases the life of the system. If noise is an issue, a controller should be used that varies the speed of the fans based on temperature (ALT controller) or reduce the voltage supplied to the unit (7 or 9V compared to 12V).

IMPORTANT The Ceiling Grid Vent System is intended to be professionally installed and by someone with professional experience with drop ceiling installation. Serious damage and/or bodily injury may occur if the product is installed incorrectly and is not supported properly (ensure the grid can support the unit).

*****It is strongly recommended to test the unit prior to installation which the primary purpose is ***
to ensure the wiring is correct as that is our main support issue with these units.**

Installation (General Instructions – there may be variations based on the control option selected)

1. Determine the best location for the Ceiling Grid Vent which is typically directly over the heat producing components. Note that the unit will require 2 open outlets to power the power supplies for the 2 banks of fans (may vary depending on version purchased). When determining placement, consideration should be given to how air will flow unobstructed and for how the unit will be powered and to avoid obstructions.
2. The Fan Panel comes pre-assembled for easy installation. To attach the pre-assembled Fan Panel to the Ceiling Grid Vent, you must first remove the packaging material and the Fan Panel from the Ceiling Grid Vent.
3. As noted, bench testing first is recommended and once that is completed, the Fan Panel attaches to the Ceiling Grid Vent by inserting the offset edge of the Fan Panel, under one side of the Ceiling Grid Vent with the fans protruding through the back/top side of the vent and the sensors facing down toward the room. It's a tight fit so may have to apply extra pressure to get the panel past the 'stops' in the housing. Once the panel is seated, attach the panel with the included #6 X 1/2" self-tapping screws.
4. Once the unit is in place and secured, locate the power wires for the fans, they should be obvious among the fans and are two 2-pin male connectors. If using the BSC, ALT, or AVC units, the power supply will connect directly to these connectors. For the ASC version these will then connect to the Fan Output on the controller. Ensure that power wires are clear of the fans and secured. The two wires for powering the fans should be obvious among the fan units.

On All Low Voltage Connections, Ensure to Align Tip to + or + to +

5. Set the controllers.
 - **BSC** – These are fixed set points at 80°F and the other at 90°F and these controllers turn the fans on and off only (there can be a 2-3° variance with these controllers). These run at a fixed speed but to change speed of the fan, new power supplies can be purchased at lower voltages (7 or 9V DC).
 - **ALT** – This controller independently controls 3 banks of fans and turns the fans on and off and varies the speed of the fans automatically. There are 5 modes, 70°, 80°, 90°, 100°, and 110°F. There is also an alarm at 115° and 125°F. See the instructions for the controller for programming.
 - **ASC** – Once connected follow the instructions for the controller to program and control the fans.
 - **AVC** – Also follow the instructions for the controller and especially the wiring for the unit. It is recommended to install outlet/s up by the fan unit and controlled by the AVC controller.
6. Once everything is installed, ensure that no wiring or other obstructions are in close proximity to the fans. Ensure the unit is working properly and if not the first thing to check are the connections to ensure all connectors align Tip to + or + to +.
7. Maintenance. Annually the unit should be inspected, the fans blown off to remove dust and ensure fully functional.

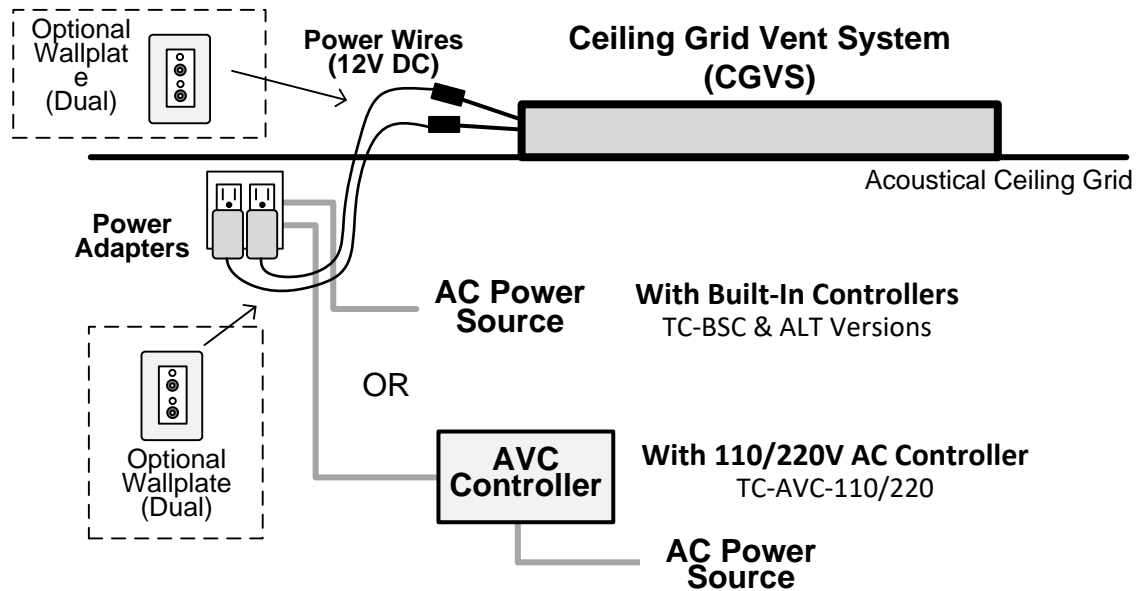
Unit Not Working? First thing to do is check the connectors for proper polarity. If the power supplies are variable voltage, ensure are turned up to at least 7V. If still not working, contact us at support@coolcomponents.com to troubleshoot the system as can usually resolve issues quickly.

Warranty Information This unit is guaranteed to be free of defects for a period of one year from the date of purchase. This warranty excludes damage caused by misuse or for applications other than the intended use. Contact us on the web at www.coolcomponents.com/warranty

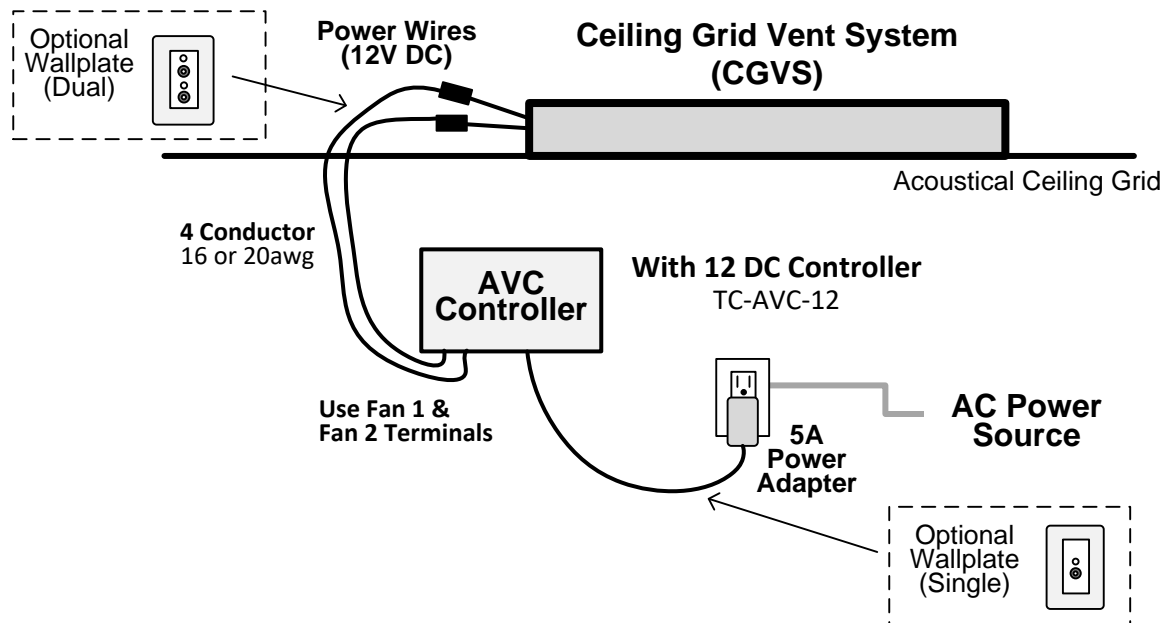
Feedback We truly value feedback, please send feedback to feedback@coolcomponents.com

Ceiling Grid Vent System – Wiring based on Controller Type

Wiring for Units with Built-In Controllers (BSC & ALT) and AVC (110/220V AC) Controller



Wiring for Unit with AVC (12V DC) Version



Optional Wallplate for DC Wiring

Wallplates utilize a decora insert so can be used in a multi-gang box.

Use 16-20awg wire to connect wallplates and units – 2 conductor or 4 for the Dual Wallplate

