CABINET DUCT SYSTEM INSTALLATION INSTRUCTIONS

Preparation for Installation

1. Remove everything from the cabinet including shelving.
2. Determine the best location for the duct system – back left, center, right. The primary consideration is where it will be least likely to get in the way of wiring or inhibit working on the system. It is not going to matter where the duct is installed as long as it runs the height of the cabinet.
3. Once you are certain and have double and triple checked the best location, notch the shelving to accommodate the duct. The diagram to the right is an example of two of the more likely placements of the unit and how the shelving should be notched.
4. Next measure the height of the inside of the cabinet and if necessary, cut the duct to the proper height – cut it at least a ¼” short to accommodate the end cap. If the cabinet is significantly taller than the duct, ensure to order an extension piece (sold separately). For cutting the duct, we recommend hand cutting with a hacksaw as the material is brittle and power saws may damage the unit unless a specialty blade is used. Just ensure that the cut is straight by either drawing a cut line directly onto the duct or wrap it with masking tape and draw the line on the tape (a carpenter’s square should be used for drawing the line) – tape can also help prevent chipping as well.
5. Now prepare to cut the holes for the exhaust which will involve cutting a hole in the short duct piece (the bottom piece) and the bottom of the cabinet. Using the supplied template and a 2 ¾” hole saw, cut the hole in the bottom of the duct piece and also the bottom of the cabinet – the objective is to obviously have these holes match (the template includes more detailed information on cutting these holes).

Positioning the Fan Units

1. Now you have the critical task of determining where your shelves will be located (at what heights). This involves laying out the AV system but for the purposes of the duct system, this will determine the location of the fan units.
2. Once the equipment and shelf locations have been determined, now determine the locations for the fan units. The obvious position for one of the fan units is in the very top of the cabinet/duct system. The next location should be in one of the shelf areas where there is heat producing equipment. For example, if you have an amplifier on the bottom shelf, a fan unit should definitely be installed high in that shelf area. The system comes with two fan units but additional units can be purchased separately.
3. Now that the locations for the fan units have been determined, cut, using a 2 ¼” hole saw, a hole in the duct. Ensure the hole is centered on the duct.

Determining Power Jack Location

The Power Jack can essentially be located anywhere on the duct system but with the following considerations. 1) You need accessibility to the hole for the jack from inside the tube as the power jack assembly is inserted through the hole from inside the duct. 2) Hanging power wires will not obstruct the fans. For this reason, we recommend installing the power jack below the lowest fan unit. 3) Ensure the power wires for the fans will reach the power jack. Additional cables can be used, such as an extension cable, but consideration should be made to keep wiring neat and prevent obstructions. 4) The power jack is easily accessible to the power feed and that it is in a location that is aesthetically pleasing which may mean that it is out of sight. With all of this said, the best and recommended locations for the power jack is within close proximity to the ends of the duct tubing and/or below the bottom fan unit.

It should also be noted that the power jack has three plugs and the standard unit as shipped, only requires one of the plugs as it comes with a y-cable to power both fan units that are included. If additional fan units are used, consider additional power wires that may be necessary (usually either a y-cable and/or extension cable).

Once the location has been determined, drill a 5/16” hole and install the power jack. Do not over-tighten the nut on the jack as the jack may separate – just tighten until it is snug.
Assembling the Duct System (Refer to drawing)

1. Top End Cap. Using the proper size gasket, strip off the paper on one side of the gasket and attach the gasket to the duct first. Then peel off the paper on the other side of the gasket and attach the end cap ensuring proper alignment.

2. Install the fan units by connecting the power wire and then screw the fan assembly to the duct. When installing the fan units, this is when wiring management is critical as you must ensure that the fans will not be obstructed. If necessary, route and tape the power wires to the side of the fan units.

3. With the fans installed now and if the power jack is installed in the bottom duct piece (the short piece which is not connected at this point), gently pull the power wires out the bottom of the long duct piece to remove any slack from the fans which may interfere with the fans. If the power connector is installed in the top/long piece of the duct, everything should be plugged together at this point ensuring to watch polarity (align Tip to + on the ends of the power wires). Now you can plug in the unit to test if the fans are interfering with the power wires. At this point, the long end of the duct is complete and you will have the power wire coming out the end with the angled cut.

4. Now on the bottom piece of the duct, if the power jack is in the short piece, install the larger foam gasket on one of the 45° pieces, the longer piece may be preferable, then remove the piece of paper on the other side of the gasket as well.

5. Now connect the power wires from the fans to the power jack and ensure to align Tip to + on all of the connections.

6. Now join the two duct pieces together.

7. At this point, plug in the system in again and ensure the fans are running. This is just another simple test to ensure that it is working and that wiring is not hitting the fans. Do not worry about the power setting at this point.

8. Now install the large round ‘donut’ gasket on the bottom hole and the solid round gasket on the back of the tall section. These gaskets will be used to hold the duct system in place.

9. Now you can mount the duct system in the cabinet. If preferred, you can also screw the duct to the cabinet – a screw behind the fan unit/s and/or screw the bottom of the duct unit to the cabinet prior to installing the end cap will hold it securely in place.

Final Testing and Setting

1. Plug in the system and ensure the fans are working and if there are odd noises coming from the unit, this would most likely be a wire hitting a fan blade. If this does occur, remove the fan and simply push the wire down or to the side.

2. For setting the speed of the fans (voltage setting on the power supply), wait until the equipment is installed and then determine the best setting considering noise and effectiveness.

UNIT NOT WORKING?

Do Not Return Damaged or Defective Products to Point of Purchase

If the unit arrived non-functional or if there was a installation mishap (reversed polarity), we will resolve the issue quickly and hassle-free.

For Problems, Defects & Warranty Claims, Please Contact Us On The Web At

www.coolcomponents.com (then go to ‘Contact Us’)

Warranty Information

Hassle-Free Warranty & Returns

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 of the products.