

Home Conversion Exhaust Kit for the Ryobi Gasoline Powered SDS Drill

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I modified my Ryobi Gas Powered SDS drill soon after I got it by changing the exhaust port. This allows you use your drill in tight or narrow cave passages where the exhaust fumes can steal your oxygen. This is not only a safety feature, but an inexpensive method to assist your cave digging needs.

The tools needed to modify the exhaust kit include the following:

- 1) 2 pieces of 2 ½' x 5/8" flexible metal pipe
- 2) a 50' section of 5/8" or ¾" plastic garden hose
- 3) brass fittings to connect the flexible metal pipe to the garden hose
- 4) brass fitting to connect the Ryobi exhaust port to the flexible metal pipe
- 5) Welder's Kit

The procedure:

Go down to your local appliance/hardware store and look for the flexible metal pipe that contractors use to hookup gas lines to gas hot water heaters. The pipe is 5/8" in diameter and should be gray in color, this comes in 2' and 2-1/2' lengths. Buy two pieces. After this is done, find a 50' section of 5/8" or 3/4" plastic garden hose. Next you will need the brass fittings necessary to connect your flexible metal pipe to your new garden hose. Lastly, you will need a brass fitting to have welded onto your Ryobi Drill exhaust port so that it becomes the new exhaust port. This brass fitting will also connect to the flexible metal pipe, so it must fit.

In the cave:

When you take your Ryobi gas drill into a confined cave dig, bring along your two sections of flexible metal pipe and your garden hose. Connect one of the flexible metal pipes to the modified Ryobi exhaust port, connect the second metal pipe to the end of the first metal pipe, and then connect it to the garden hose. Fire up the drill. It will take some getting used to because the gray flexible metal pipe extends about 4 feet.

I would suggest that you wear dig gloves and a caving suit. Don't touch the flexible metal pipe once you fire up the Ryobi drill because it gets quite hot to touch. However, the two sections of flexible metal pipe will act as a heat exchanger and get rid of enough heat so that the garden hose can pipe it away without melting.

You do not need to go any longer than 50' for your garden hose because backpressure builds up. I found the end of the garden hose exhausts fumes at very high rate.

It is possible to use plastic garbage bags on the back end of the garden hose to collect the exhaust fumes as well. These fumes are not hot, but are lethal. You may need to upgrade your gasoline to a medium grade in order for this conversion to work properly.