

How to build a CD Dowser – the quick and easy way with real tools

Divide the disc mentally into 4 quadrants. **Do not draw on the disc with a Sharpie** the ink causes a chemical reaction softening the disc and will lead it to break along the lines.

Prior to drilling holes use a Sharpie to mark where you will drill (on the writeable side of the disc) and let it sit for about 5 seconds. This reduces burrs and greatly reduces the chances of cracks.

Hole numbers reference **Figure 1**.

All holes drilled at $\frac{3}{16}$ ".

All holes drilled $\frac{3}{16}$ " to center from the edge of the disc.

Hole 1: is placed on the horizontal center line of the disc (for pivot point).

Hole 2: measure down the edge of the disc 1" from Hole 1 (for rubber band attachment).

Hole 3: located $\frac{1}{4}$ turn of the disc from Hole 1 on the vertical center line (for pull line attachment).

Mounting on a 2x4*

Cut to 3" in length

Using the dimensions in **Figure 2** connect the disc to the 2x4 with a 1" screw. For prolonged or repeated use I suggest placing 2 washers between the disc and wood which will prevent the rubber band from rubbing against the 2x4.

Place a second 1" screw halfway in to the 2x4 using the dimensions in **Figure 2**. Slip a 2" rubber band through *Hole 2* on the disc **Figure 1** and connect both ends back to the screw. Rubber band size is adjustable and may need to change depending on your mounting, the distance and the frequency that the dowser is opened. The key is that there is enough tension to hold the disc in the down/closed position.

When the 2x4 is set on end the disc should rest directly on the same surface. I generally attach the 2x4 to a plywood base (the disc rests on the top of the plywood) which is then secured in front of or under the projector.

A pull line is then attached to *Hole 3* which allows you to open/close the dowser from almost any distance. (I have used tie line in combination with eye hooks to allow control from over 50' away.)

Place a piece of gaff tape over the hole in the center of the disc and you're done.

