## INSTRUCTIONS FOR HEAVY DUTY PENDULUM DRIVE

This heavy duty pendulum drive is the first of it's kind. It was designed to operate a 40" pendulum that weighs 8 ounces for more than a year on one "D" cell battery. It is perfect for making low cost grandfather size clocks, but if you use your imagination, it will do so much more.

- 1. When opening the device, please note that there is a separate battery well with wires and a connector (figure B) that needs to be connected to the pendulum drive (figure C). In most cases it is best to mount the battery well above the pendulum drive.
- 2. This heavy duty pendulum drive has a very unique feature. The part of the device that powers the pendulum is actually "hinged". This means that if properly installed, your clock can actually be a few degrees out of level, from front to back, and still work properly. If you cut a 2" wide by 5 5/16" long hole in the board you are mounting this to (this is the measurement of the rectangle when looking at the back of the device), this will allow the hinged pendulum drive (figure A) to move back and forth if needed.
- 3. Both the battery well and the heavy duty pendulum drive were designed to be installed with screws. We do not supply the screws because the type of screw you use should be determined by the material you are mounting this device to. You will need six screws. The mounting positions for these screws are indicated in the drawing to the right.
- 4. Mounting tips: Please consider how far behind the dial of your clock you want the pendulum to swing. You will need to attach the heavy duty pendulum drive to a board of some type that is hidden behind the dial of your clock. Please make sure that this board is installed so that this device can easily be made level.
- 5. Swing Adjustment: This device is operated by an electro magnet that is positioned between two magnets (D) that are on the pendulum arm. If the swing of your pendulum is to wide, then you can put a piece of tape over one or both of the magnets to reduce the width of the swing of the pendulum.

