Laboratory EKG Pre-Amplifier - Bug # 169: Enclosure Marking/Machining Accuracy Issue

Status:	New	**Priority:**	Normal
Author:	Amanda Wozniak	**Category:**	
Created:	09/03/2013	**Assignee:**	Amanda Wozniak
Updated:	09/03/2013	**Due date:**	
Subject:	Enclosure Marking/Machining Accuracy Issue		

Description

I exported a DXF of the mechanical layers of the top assembly, and used that to laser-mark the enclosure lids for pilot drills. ***But aligning the drill press by hand when you care about alignment tolerances is a poor choice.***

In the first five units, I wasn't able to machine the enclosure lids or bodies to any reasonable tolerance, so my fits were poor. I had to compensate by using stepped drill bits to add a lot of slop to all the holes.

I need to fabricate a registration guide/jig that I can clamp to my work-piece which allows me to more precisely align my drills.

PROPOSED SOLUTION:

1. dimension/draw enclosure lid perimter with mounting holes
2. Use DXF to laser-cut a jig for the pilot holes - include perimeter with mounting holes for registration
3. figure out a way to clamp/fixture the workpiece on my drill press
4. test-drill using jig
5. if that works - repeat process for enclosure body

History