Accessible Syringe Dosing
Week # 6
2/23/05-3/2/05
Karen Young

**Work completed:**
During the week since the last report I was able to complete the drilling and tapping of the holes on the left side of the case. At first only one hole lined up so I had to re-drill many times until the hole became large enough to mesh with the holes in the battery bottom. The third hole for the end piece didn’t line up but since the piece is going to be glued to the bottom of the box it was not a necessity, therefore I did not bother to struggle to get the holes to align properly. I was also able to measure places to screw in the top of the box. I then center drilled the holes and used a #40 drill to make the initial holes. Then I used a punch to mark the where the holes are onto the side pieces to aide in properly aligning the holes. I drill and tap the holes for the large piece of the top of the box. Three out of the four holes aligned the first time drilling. I tried to re-drill the hole that was not aligned but that did not work. So I had to make the hole larger using a 1/8 drill and using a size A drill to make the screw fit easier into the hole.
Left side of Box

Top of Box screwed and battery bottom screwed together
Box together as of this week

**Current status:**

Currently, I am still working on drilling and tapping the holes for the top of the battery, the sides and end piece which the battery top lays on. The angle iron is ready to be mounted to the side after appropriate spot is figured out using the maximum and minimum dimensions of the linear actuator.

**Future work:**

During the next week, plans are continue to drill the holes on the bottom part of the case and the angle iron and mount the actuator. Once this is completed the battery bottom and end pieces are to be milled down to fit the syringe diameter. And drill the holes for the PCB board and driver. Obtain a bottle of insulin from a local pharmacy or the infirmary for the design of the bottle piece.
Project review:

The drilling process is coming along but little miscues have taken me long to correct than expected, but the majority of the drilling is completed. Due to snow storms and I have not been able to get into the shop as much as desired this past week.

Hours worked: 11