

Progress Report 9

April 9, 2002

Project Title: Platform for arm support during radiologic procedures

Team Members: Matt Harris, Luke Harris, Brandon Verdoorn, and Andrea Rozmenoski

Client: Michael Tuite

Advisor: Paul Thompson

Date: 4/03/02 – 4/09/02

Problem Statement:

The goal of this project is to design platforms that will offer maximum comfort to patients, especially older people, while they undergo radiologic procedures involving the spine. By supporting their arms during these procedures these platforms will allow patients to relax and not be in pain. Presently, patients must lie on their stomach and hold their arms outstretched to allow access of the x-rays. However, in older individuals, this becomes tiresome and painful during the exam.

Restatement of Team Goals:

1. Bring the dimensions of the plastic parts of the prototype to the Mechanical Engineering Shop – specifically Bill Hagquist
2. Find funding for the production of the prototype of the arm support
3. Search for Velcro and fabric companies that provide fabric and Velcro similar to what we are looking for – If possible purchase them
4. Start thinking about the possibility of getting a patent

Summary of Team Accomplishments:

1. Continued looked for Velcro© and fabric companies online for components of prototype
2. Prototype for plastic mold is still in the process of being made by the Mechanical Engineering Shop. Bill Hagquist has been sick so the production has been slow but it will hopefully be done by next week Friday
3. Contacted an online Velcro© company – <http://www.fastenation.com> – This company had velcro© that fit our design but they only allowed orders of bulk amount
4. Contacted an online fabric company – <http://www.outdoorfabrics.com> – Luke had asked this company about cloth that was durable, washable, and would fit out purpose and they had emailed back a suggestion. We called the company and ordered some fabric.
5. Shopped for Velcro© at local homecenters and craft stores – The stores we went to included Home Depot, Staples, Jo-Ann’s Fabric, Office Depot, and Handcrafters
6. Bought about 5 yards of sew-on Velcro© from Handcrafters

Summary of Individual Accomplishments:

Matt (Leader):

1. Searched web for Velcro and fabric for prototype
2. Contacted online Velcro company – <http://www.fastenation.com>
3. Went to fabric stores in Madison and bought Velcro from Handcrafters
4. Brainstormed possible testing ideas for prototype

Luke (Communicator):

1. Looked online for fabric and Velcro for prototype.
2. Called outdoorfabrics.com and ordered raven black furniture fabric - \$24.69
3. Went to Fabric stores in Madison and bought Velcro - \$37.39
4. Thought of possible tests for our prototype.

Bill (BWIG):

1. Shopped for Velcro at stores in Madison
2. Updated project website
3. Discussed product options with team
4. Updated notebook

Andrea (BSAC):

1. Shopped for velcro
2. Talked with ME shop to get prototype made
3. Discussed product options with team
4. Updated notebook

Statement of Team Goals:

1. Search for Velcro and fabric companies that provide fabric and Velcro similar to what we are looking for – If possible purchase them
2. Start thinking about the possibility of getting a patent
3. Go to the WARF office as soon as possible to begin the patent process
4. Build prototype with the materials we ordered
5. Test prototype

Project Schedule:

3/1 - 4/26	Work on final design (i.e. Develop a prototype, testing, etc)
4/26 - 5/10	Prepare final presentation and paper
5/10	Final poster presentation
5/12 - 5/18	Final meeting with advisor

Difficulties:

None at the moment.

Activities:

Matt:

Searched web for Velcro and fabric for prototype – 1.5 hours
Contacted online Velcro company – <http://www.fastenation.com> – 0.5 hours
Went to fabric stores in Madison and bought Velcro from Handcrafters – 1.5 hrs
Brainstormed possible testing ideas for prototype - 0.5 hours
Total: 4.0 Hours

Luke:

Looked online for fabric and Velcro for prototype – 2 hours
Ordered raven black furniture fabric from outdoorfabrics.com for \$24.69 - 0.5 hours
Went to fabric stores in Madison and bought Velcro - \$37.39 – 1.5 hours
Thought of possible tests for our prototype - 0.5 hours
Total: 4.5 Hours

Bill:

Shopped for Velcro at stores in Madison -1.5 hours
Updated project website – 1.0 hours
Discussed product options with team - 0.5 hours
Updated notebook - 0.5 hours
Total: 3.5 Hours

Andrea:

Shopped for velcro -1.5 hours
Talked with ME shop to get prototype made -0.5 hours
Discussed product options with team - 0.5 hours
Updated notebook - 0.5 hours
Total: 3.0 hours

Team Total Hours for this week: 15.0 hours

Cumulative Team Hours up to date: 202.50 hours