Implant-retained Finger Prosthesis

Week 1 – September 7 to September 13, 2007

Team Members: Dustin Gardner – *Team Leader*

Karen Chen – *Communicator*

Richard Bamberg – *BSAC*

Allison McArton – *BWIG*

Alex Kracht – *Communicator*

Client: Greg Gion

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Advisor: Willis Tompkins, PhD

Professor – Dept. of Biomedical Engineering

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Problem Statement

The focus of this project is to improve the connecting mechanism which holds prosthetic fingers onto people's hands. Currently, the only method used in the United States is a slip-cover which holds the prosthetic on by suction. New approaches have been used in other countries which involve using an implant where the finger will connect to the hand to increase motility and usability of the prosthetic finger without having the prosthetic fall off. Our team is to design a connection apparatus which will successfully meet these goals.

Restatement of Team Goals

The team will meet with the client sometime after September 23 to receive information about this subject and define clear semester goals. Some more work needs to be done yet in terms of researching the project and discussing the preliminary product design specification (PDS).

Individual Goals

Dustin	Research of finger prosthetics, preliminary brainstorming, send out progress report.
Karen	Research of finger prosthetics, preliminary brainstorming
Richard	Research of finger prosthetics, preliminary brainstorming, deciding team meeting time.
Allison	Research of finger prosthetics, preliminary brainstorming, setting up team webpage.
Alex	Research of finger prosthetics, preliminary brainstorming, contacting client and advisor.

Summary of Accomplishment

The team assigned roles and contacted the advisor only to find out he is not available yet for at least another week. The team also began researching prosthetics, and researched hand surgeons in the Madison area. A group photo has been taken and a time to meet outside of class has been decided.

Statement of Team Goals

The team needs to meet with the client as soon as possible to receive proper guidance and obtain information critical to this project. The team also needs to research more into implant-retained finger prosthetics and begin discussing the preliminary product design specification (PDS).

Difficulties

The biggest difficulty is finding a time to get together with the client. Until that time, research and efforts are limited.

09.07.07	Team: Met during class and decided team roles, exchanged background and contact information, talked with advisor	1.50h
09.13.07	Team: First team meeting, discussed research and hand surgeons, contacted client	1.00h
9.12.07	Dustin: Research of finger prosthetics	0.75h
9.11.07	Karen: Research of finger prosthetics and hand surgeons	1.25h
9.12.07	Richard: Research of finger prosthetics, decided time slots for meetings	1.00h
9.10.07	Allison: Research of finger prosthetics, worked on webpage	1.00h
9.11.07	Alex: Research of finger prosthetics, contacted client	1.00h

Project Timeline

	September																	
Tasks	7																	
Project Research																		
Brainstorming																		
Prototype Design																		
Prototype Building																		
Testing																		
Re-designing																		
Re-testing																		
Meeting with Client																		
Group Meeting																		
Presentation																		