

It's the final blog post...

Posted on [July 31, 2015](#) by [sbeadle](#)

Well presentations are over, our paper is turned in, and soon we'll be leaving the VRAC for the last time (as REU kids at least). All the feels, everybody.

Poster presentations were really fun. It was interesting to talk to the people who have come to talk to us this summer about our project and get feedback. I would do a poster presentation over a talk any day. I loved seeing what other projects did this summer, I think Turtle Camp may have been my favorite group name. Our presentations definitely had an exCYtment factor with the demos. Dr. Sweet and I discussed how our projects were probably the easiest to grasp and see the application of (not that we're biased). It seemed like everyone understood our project and the need for such research, which made presenting our research a lot easier. Dr. Sweet and Dr. Meissner both talked to us about continuing to work on the project, particularly getting a publication, so that's pretty great and exciting!

Please play Don't You Forget About Me and envision the end of The Breakfast Club as you read this <https://www.youtube.com/watch?v=Sv1I4q6lOpo>

This summer on the whole has been a fantastic experience. It challenged me, taught me, helped me grow, and allowed me to put my skills to use. I never expected to learn all of the technologies we did or work with people with such different experiences. I couldn't have picked 11 better and more different people to spend 10 weeks with. We were all highly motivated, intelligent students who had a complimentary set of interests. It was nice to not be competing but to be collaborating. I couldn't have done our project without Nancy and Alex, that's for sure. Although I got a little annoyed from time to time, I'll definitely miss having two coding geniuses at my side. You can ask me how my summer went and what I have to say is....

In the end, I found out that each of us is... a brain...

... a programmer...

... an engineer...

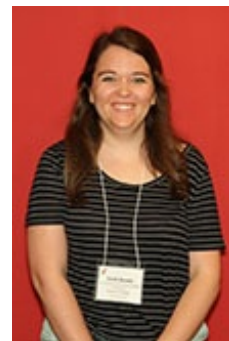
... a designer...

... a chemist...

... and an academic...

Does that answer your question? Sincerely yours,

2015 SPIRE-EIT Interns (throws fist into the air and walks into the distance)



Next to Last Day

Posted on [July 30, 2015](#) by [sbeadle](#)

Well things are moving fast today. We had a quick morning, I worked on adding results to our paper and editing our introduction. It is really awkward to write half of the results, but I know that it will be a lot more useful than leaving a hole in our paper. Nancy and Alex went to Dr. Meissner's lab with Dom to start installing our interface on his computers.

I had my 15 minute meeting with Dr. Gilbert this morning as well. I wish we would have spent more time getting to know him and Dr. Winer this summer because they're both so interesting. I didn't realize that Dr. Gilbert studied Cognitive Science so it was kind of interesting to hear his take on graduate school in that regard. I definitely have a lot to think about in the next few months as I apply for graduate school that's for sure.

We had our post focus group this morning as well. It was a completely different dynamic now that we all know each other (as opposed to our first week). We were definitely a lot chattier, with the exception of Alex and Nancy who are only chatty when not in discussion groups. Hopefully all useful feedback!

Next to last blog is done!

Game Night and Last Wednesday

Posted on [July 29, 2015](#) by [sbeadle](#)

Yesterday was team meeting day, which turned into Dom, Dr. Sweet, and I talking about other things while Nancy and Alex installed Qt Creator on her computer. It was productive in that Dr. Sweet and I got to scheme about me bringing my psych club up for a speaker they have coming this fall.

After work, we had a game night and played Munchkin. Desmond, you put up a good fight.

This morning, we worked on poster speech and paper edits. We have quite a bit to add to make our intro beefed up for potential publication. We've decided to focus more on that end of the writing since we only have half of the results we need. Hopefully we can get that and the methods cleaned up so Sweet and Meissner can use chunks for a paper they submit or present.

Other than that, we're winding down pretty fast. Only one more full day before presentations!

If I don't title my blog something about it being the last week, does it even count?

Posted on [July 27, 2015](#) by [sbeadle](#)

But seriously, it's our last week, when did that happen?

Friday night, I took the hooligans to my stomping ground for an adventure and some exciting hot air ballooning! We got there at a perfect time to grab some food and then watch the balloons go up. The Nadas didn't disappoint! After it got dark and the band was done, we went to my favorite ice cream place on the planet, The Outside Scoop, and then went on a quick car tour of Simpson. It's not as exciting at night, I promise it's super cute in daylight guys. The group felt the need to explore the park before we left, where I acquired Alex and Nancy.

Saturday, I slept in, it was great. I met up with some friends in Des Moines for dinner and then went to see Hillary Clinton at the Alumni Center on Sunday.

When I got home Sunday afternoon, I edited our poster to add results from Dom and then sent it to our mentors for review. It was really challenging to navigate getting results at 4:30 on Friday and trying to include them in our poster due at 8 am Monday. We owe our free time to Dom for giving us a couple stats to include from the behavioral data. I added some usability info from qualtrics too. Overall, I think we got a lot accomplished in the last week and I'm

excited to actually have results on our poster!

This morning, we kind of took it easy after all we had to do last week for participants. I worked on our elevator pitch for our poster and Nancy and Alex started working on some of the suggestions we had for our interface. Hopefully we get the rest of the petty cash today from Dr. Sweet so we can pay our lovely participants. This week we're going to have Dom come teach us about R and go through analyses.

Reflection

Posted on [July 24, 2015](#) by [sbeadle](#)

So I was kind of a slacker when Dr. Gilbert had us write letters to ourselves at the beginning of the program apparently. I believe the prompt was to comment on 3 things we value and why. So here's my reflection on that:

My most profound "value" was being able to experience new and different things, and I think the program has been good for that. I still value exploring and did quite a bit of that this summer whether it was kayaking/tubing, cruising on my new bike, or just being willing to play volleyball and learn a new game or two. As far as the actual learning goes, I had a lot of new experiences academically this summer as well. I really respect the people who are experts at the technology we learned because that was definitely a challenge. One way this has also been fulfilled is simply how much we got to learn about what is new in research. From Dr. Stone's creations in mechanical to Dr. Kelly's navigation in virtual environments, we heard about a lot of new things and had the experience to interact with a lot of things we didn't even know existed. I loved that part of this program, and think it definitely plays a role in my desire to go to grad school.

Another thing that I value is my education. I am so grateful that I've had the type of education that set me up to spend a summer in a virtual reality center. How many people get to say that?? I think kind of along with the value of education comes the value of support. I can't imagine being told I was unable to do something and that lack of "you can't" has probably led to me being qualified to be here. Additionally, I value the differences we all have in backgrounds. I have so much respect for Alex and Nancy and what they can do with code (even if I'm not the first to show my admiration when we're working together) (*follow up to that: Nancy and Alex please do not freak out when you read this*). It's kind of fascinating that we can all come together and create something tangible after knowing each other for 9 weeks.

Overall, I haven't had a lot of change over the summer, but solidification of my interests to go with what Allie said in her blog. It is always a challenge to live with people you don't know and to work in a group of unfamiliar people, but I think we handled it well. It seems like we had quite a few similar values and did a good job of not stepping on each other's so kudos team.

A couple busy days

Posted on [July 24, 2015](#) by [sbeadle](#)

Our team is deep in the cycle of participant testing, so I had a little hiatus from blogging. We've had people off and on since Wednesday morning, so today was the first day I came in at 9 and didn't have anything before. On Wednesday things went smoothly, we didn't have any problems with participants showing up or technology so that's a win.

Thursday, I met up with one of my professors from Simpson and showed him our project. He wishes he could go back to school for a summer and play with HCI stuff so I'd call that a success. And I got Panera for lunch so that's always a plus.

Also in the participant running process, I got to hear about some torture research! (Don't worry guys it was a perception study in social psych that was IRB approved) One of our participants was a psych grad student so she

talked to me about her work with Dr. Meissner. In return, I talked to her about VRAC projects and gave a half tour so she could see some of the cool stuff over here. Apparently she wants to get a masters in HCI so *self-five* (For the record, I do not think I had anything to actually do with this realization but I would like to give myself credit for at least not getting rid of this interest).

Dr. Gilbert also tried out our interface. It was kind of intimidating to show him our baby and hear what he thought. Overall, good feedback on how to make sure our project doesn't die when we leave and to clean up the code, so hopefully we can implement those ideas!

Participation is going well otherwise, hopefully you all get your monies today!

Blog going up... On a Tuesday

Posted on [July 21, 2015](#) by [sbeadle](#)

To those of you who sang that in your head, kudos. To those of you who didn't, don't worry about it. I think it might make it onto the Freshest Album of 2015, however.

So yesterday afternoon we had work time in the afternoon. I made our running draft document and edited our poster some more. Dr. Sweet came by at 4:15 and we schemed on how to do the eye tracking set up and worked on the interface to make some final changes. After that, we built Betty, our fancy new computer with a "sexy" case. Later last night, we went bowling as well.

This morning, we just had work time. Our main goal is recruiting participants and finalizing the interface for trial runs this afternoon.

For Luncheon Lecture, we kind of got fire hosed today. Dr. Rover came and talked to us first about her experience in Computer Engineering. She has a really interesting background and a lot of cool experiences under her belt. I can't believe she turned down IBM and HP. But also, I can because I like having a flexible schedule too. She gave great advice about becoming a "T" student, I love the analogy!

Panera was fantastic, A+ lunch choice, Sally.

Dr. Gentile was a hoot. Apparently Jordan thinks we have the same kind of humor, which I think is a huge compliment. He was so blunt about his experiences and I could absolutely see where he was coming from with the problem of being so competitive. I've been narrowing my grad school list more each day and I've found that I'm happier with professors who are more excited about their mutual success and collaboration than being *the* best. His research is pretty cool, I definitely love the public policy part of doing human research. And I would love a job that gives me an excuse to go to the White House and Congress.

IRB APPROVAL

Posted on [July 20, 2015](#) by [sbeadle](#)

We had quite the weekend! It seems like a lot happened. Friday, we played Smash Bros. I appreciate how you can just button mash and play the game. Insomnia cookies were a plus.

Saturday I went to the Farmer's Market in town and then met up with one of the psych grad students to play with the eye tracker. I thought I knew where they lab was, surprise surprise, I definitely didn't. I eventually found it and was expecting to kind of have a meeting with him, but he just kind of let me do my thing, which was kind of nice. And probably a good practice for what grad school will be like. I went to upload our videos and the format didn't work, even converted once, so I had to convert them again. Eventually I was able to upload them into the system and test a protocol to make sure it would work. I'm still struggling with the other video conversions because they are clips put

together to make one longer video so converters are not enjoying that. Hopefully I can get that figured out this week.

We played a game Saturday night with David's brother and friend. It was a lot of fun, particularly because I got to be a "spy" every time. Maggie blames it on my Slytherin nature. On Sunday, we went to Big Creek Marina with Anna and hung out by the lake before we hit the water on hydro bikes and paddle boards! Last night, David, Alex, Gabe, and I went to Trainwreck, too.

This morning WE GOT IRB APPROVAL! Hooray!!!

(click on it, it explains how I feel in gif form)

So after editing our paper and poster, I started printing out our forms and making arrangements for running participants later this week. Everyone come do our study! You get \$25! (No seriously, we'll give you money) This afternoon we get to do more preparations for our study and have a meeting with Dawn.



SClowa

Posted on [July 17, 2015](#) by [sbeadle](#)

We finished the day off yesterday with Craft of Research. Our peer editing for abstracts went a lot better with the shorter texts to read through. Justin provided me some good feedback on what to fix and helped us edit our title. After Craft of research we had a little bit of project work time before heading out for the evening.

On the way home, the tornado sirens went off and I'm pretty sure all of us thought it was a test because the skies were clear and people were just acting like everything was normal, but we opted to playing it safe in the 1st floor hallway of Freddy. Apparently everyone else was too cool because none of the other building occupants came out to join us. Glad the tornado was just south of Ames so it didn't disrupt our day.

After the crisis averted, we made a trek out to Amy's camping spot just outside of town to hang at the lake and make some smores. It was a nice way to relax at the end of the way and the water felt great!

This morning, we went to one of my favorite places, the Science Center. I personally enjoy the bubble station more than I should. It was really interesting to hear how they did exhibit design and have changed their programming to adapt to technology and the variety of users they have. I enjoyed hearing about the ways they analyzed exhibit usage and hearing about their upcoming projects! Lunch at Cafe Barratas in the Historical Society was a great break before coming back to Journal Club. It was kind of fun to see the challenges Desmond threw at us. I am weirdly excited for next week's where he plans to make it even more intense.

Happy Weekend!

Thursday 7/16

Posted on [July 16, 2015](#) by [sbeadle](#)

After work last night, we went home and had a quick break before Nancy, Alex and I ordered pizza and got down to business. We worked for a couple hours on Journal Club for Friday then had a treat yo self moment and went to Cold Stone. We spent most of the time trying to figure out what in the world was going on in our paper for data analysis. You all get figure out what that means before Friday afternoon. Our article seemed really simple until we analyzed it in the Journal Club format, but I'm glad I'm getting this experience now before I have to do these on my own for my senior seminar class. I've done paper presentations before but not as extensively as we do for Journal Club, so it's nice to have more practice.

This morning, I worked on our paper sections due this week and Nancy and Alex edited the interface with Tuesday's feedback. Not a whole lot to report there- hopefully we get some good feedback on our abstract today and can finally name our project (oops still haven't named the interface).

For Luncheon Lecture, we had Hannah Deering, and alum of the graduate program. She provided a really good example of industry experience and how it differs from academia. I enjoyed hearing about her research as well. Her eye tracking study on Autism Spectrum Disorders had me pretty excited. I was kind of sad she didn't have a psych adviser to be honest. She gave us a lot of advice on how to be successful in grad school. I especially appreciated her insights on how to start out on the right foot and pick advisers.

Why did the pig walk into the kitchen? It felt like bacon

Posted on [July 15, 2015](#) by [sbeadle](#)

We've had a long 24 hours since the last blog. Yesterday we had our team meeting and worked on all things interface, experiment prep, and reporting. We spent the time having our graduate student mentor, Dom, try out the interface and adjust things as needed. We got feedback on what to do for our expected results and hopefully can get those drafted in the next couple days.

This morning, we worked on our project more, largely just practicing for our presentations this afternoon. It was a little bit too warm for me to be enthused about group pictures. All in all, we had another sufficiently awkward series of photos to explain our group dynamic from today, if last week wasn't enough.

Presentations were draining this afternoon. Three hours of my attention was a little much to ask in one of the busiest weeks in the summer. We have so much to do for Craft of Research tomorrow and our milestones this week. Not to mention our team has journal club. But we're ordering pizza so hopefully we can power through all of our homework tonight.

Another day

Posted on [July 14, 2015](#) by [sbeadle](#)

Yesterday in the afternoon we practiced our presentations. I definitely thought it was just an informal Anna and Desmond thing where we were talking more about content than anything but boy was I wrong. Either way, we made it through and got a lot of good feedback for how to improve our presentation. That took up a lot of our time, so we had a meeting with Dr. Sweet at 4:30 then were pretty much done for the day. Dr. Sweet checked up on us and said that our IRB is supposedly at the top of the list for today so hopefully that comes through in the next couple of days. We got a lot of feedback on our tutorial for the system and now have quite a bit of work to do.

This morning, I worked on updating my parts of the presentation, our abstract, and our poster. We have a LOT to do by the end of this week so I'm kind of glad I decided to opt out of the movie tonight. I hope to get a draft done and go over it with Alex and Nancy sometime tomorrow.

Luncheon Lecture today was really interesting. I am obsessed with the work DR. Huffman. I hadn't quite realized the scope of Anna's writing classes until we saw the writing tutor today. I NEED that thing in my life. Wow I feel like writer's block is so quickly alleviated when you have a tool like that and it progresses you so much to writing publishable papers. Anna and Jamiahus talking today gave us a really good idea of what graduate school is like at ISU but also how nice the resources are here. I hope we can log into the writing tutor before the end of the summer and I can use it for all it's worth while I have the resource.

MOA: Group 2

Posted on [July 13, 2015](#) by [sbeadle](#)

So we left the Mall of America to go to Target Field for the Twins game and had our challenge on this journey. The UX aspect of this largely came from the light rail because Target Field is pretty surprisingly low tech, except the jumbo screens, which gave Mak and I a lot of joy. In order to get on the light rail you “had” to buy a ticket at one of the machines at the entrance. They had around 6 machines that looked like a video game. We had to select what ticket we wanted and then keep it with us throughout the day. This was a great idea- allows users to move at their own pace and should eliminate need for a person to be paid all day everyday to give people tickets. However, when we were there, a person was still standing with the machine helping users purchase tickets. It wasn’t really explained how to use the machines or even how the light rail system worked, which posed a challenge to people buying tickets that don’t use the system often. In addition, one of the burdens of technology is sometimes it doesn’t work, and we could only use credit cards on one machine.

Here’s Desmond using the magic ticket box.

Another flaw in the design of the system from a creator/business point was that there was no way to enforce ticket purchasing or usage. The entire way there and back we were not asked for our tickets. This feature was nice for us when we were running late or if they were to have bad weather, but not so nice for them because I’m sure they’re losing money.

As far as cities go, Minneapolis has a very large transportation system and it was pretty easy to navigate from one end to the other (helpful that Gabe knew what he was doing). I’ve been on the light rail in Denver and bus systems quite a few other places, but Minneapolis was very clean in comparison. One thing I think they were lacking was a clear map. Sometimes it confuses people, but I like to see what’s around the stops when I travel in case I’d rather get off earlier and walk a bit or see other sites. For how my project can work in the Mall of America, Light Rail, and Target Field, it’s a very easy fit. Those three things are basically the perfect places for examining a system like our interface. In all three of these there were security officers and surveillance systems. With as many people as we saw in all of these places, public safety is absolutely essential. Adopting monitoring practices that are more up to date and supported by research could help officers at all three of these points prevent violence.

Murphy’s Law

Posted on [July 13, 2015](#) by [sbeadle](#)

For anyone who doesn’t know that’s “anything that can go wrong, will.” and it seems all too appropriate for our team today.

We were on the way to actually testing participants and collecting data, but all of that is on pause now. We submitted our IRB almost three weeks ago, and today Dr. Sweet called and now IRB says they don’t have the application, so we had to resubmit. Hopefully they expedite the process because we can’t afford to wait another two weeks for approval. The worst part is the whole thing is out of our control so we just have to wait for approval again.

That was kind of the biggest part of our morning.

Friday afternoon we had another rowdy game of volleyball then went to Tropical Sno. Saturday we had a long (but very successful) trip to Minneapolis. I was on the team that just had a couple of hours at the Mall of America and then went to the Twins game. Mak and I got a good laugh out of the comedian who was in charge of the jumbo-tron, they had a good sense of humor that’s for sure. After a few innings at the game we had to venture back to the mall

on the light rail. After we got back from Minneapolis, the group went out to Applebee's for half price apps and then we all crashed. We got together last night and worked on our presentation for our video conference with USC last night.

This afternoon, we are working on practicing our presentation and presenting the interface updates to Dr. Sweet.

Posted on [July 10, 2015](#) by [sbeadle](#)

Yesterday afternoon, we had Intro to HCI. It was interesting to hear what advice Anna had and to read the resources she sent us about presenting at a conference as someone who's done a poster at a regional conference. I definitely had the same issue she did where at a conference of THOUSANDS a whopping 4 people talked to me over 50 minutes about my poster. I was also on the farthest wall and put into a session completely unrelated to my project because of group travel so I like to attribute my lack of success to those factors. Either way, I definitely learned a lot from Anna and have a lot to consider before I do more big kid presentations. We had some solid feedback on our poster too, so thanks team!

We had a group pow-wow with our faculty advisers after class. We schemed on how to make our interface better and Nancy and Alex worked their butts off last night to make it happen. I edited our poster according to the correction ideas we got from the group yesterday. We also worked a little on our mid-summer presentation for next week.

Pizza and other important parts of the last 24 hours

Posted on [July 9, 2015](#) by [sbeadle](#)

Yesterday afternoon, we worked on our Intro to HCI project and did our prototype testing. Maggie made the bomb.com app interface you can see on our project blog. We had other group members test our interface and they provided great feedback, thanks team. Adam helped us create an executable for our project as well, which solved a lot of struggle we had in the morning. It was kind of affirming to see him have to go ask Glen and Paul for help, we don't have to have it all together.

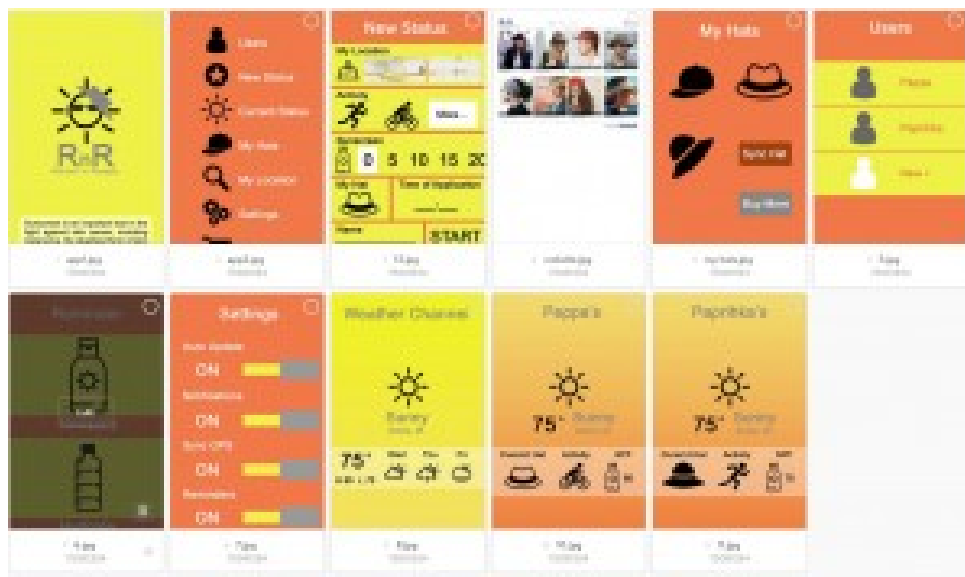
We also took group pictures, which turned out pretty impressively goofy like all of us. Kudos to Jordan for surviving whatever bit/stung you gracefully. I think Detecting Threat had the best group pictures, because guns are kind of our thing now.

This morning, our group worked on making our interface 'prettier' as well as get our mid-summer presentation ready. It's coming along nicely. Hopefully our poster discussion goes well today and we can make some headway on that before it's due next week! It seems like we have a lot to do as a group in the next couple of weeks so the poster is hard to focus on, but I think we will get it all figured out!

Today's lunch was really interesting and a lot of fun with the grad students, not to mention the fantastic pizza. They have really cool projects, I never thought I'd be so excited about a group of beetles and their fungi, but even that seemed pretty cool. They gave us a lot of good advice and a better expectation of how things can be different and what challenges we're going to inevitably face.

Prototype_HCI_RnR

Posted on [July 8, 2015](#) by [sbeadle](#)



Here is our prototype of RnR or Remind and Reapply- our new app and sun wear! We had our users test the interface and features as well as see the general size of the chip that would be in the hats. Users went through several screens to interact with the product and got a feel for how it would work. The usability survey included questions about the ease of use of the product and likelihood of someone buying and utilizing it.

We had good feedback from our users on the ease of using the product, each of them said that they did not find it unnecessarily complex and imagine people would learn to use it quickly. We also had positive responses when it came to consistency. Our users did differ on confidence and feelings about how cumbersome the product was, meaning we probably have a few places to clarify.

One user commented that it seemed like we were showcasing the app as opposed to the hat, which we definitely were. It is good feedback to keep in mind however because people don't want to buy something or test something and find out it's something completely different or go a different direction.

Wednesday

Posted on [July 8, 2015](#) by [sbeadle](#)

Yesterday after blog time we had another research team meeting. Dr. Meissner was back after his many travels in the last few weeks and provided us a lot of helpful feedback. We showed them the interface and then created the usability and demographic survey in qualtrics. After talking, we decided I'll be going to play with the eye tracking system while Nancy and Alex run usability studies with the interface and make it prettier.

Our current challenge is naming the interface... how do you pick a name for something like this?? We are on the struggle bus when it comes to that level of creativity.

This morning, we tweaked our poster and the interface after hearing their feedback yesterday. I'm hopefully going to show my programming abilities when it comes to generating a batch or executable file to run our project without using the command line file. The struggle is real with switching from python to c++ and it's not going so well, but hopefully I can get it figured out today!

Who wants to make some blankets?

Posted on [July 7, 2015](#) by [sbeadle](#)

But seriously, who wants to make some blankets? I volunteer during the school year at a brain injury rehabilitation

center called On With Life (<http://www.onwithlife.org/>) in Ankeny and they need a few more fleece blankets for their persons served. I think on Sunday I'm going to buy some fabric and scissors so comment if you're willing to help! All you have to do is tie knots or cut lines!

Back to real blogging:

Yesterday after blog time, we worked more on our project. Nancy and Alex made some serious progress on the interface and we have a poster format worked out! I went home and got my car and picked them up to get some food and work on our project some more. Hopefully we have IRB approval this week so we can start recruiting and running participants!

This morning, we had a little bit of work time before we went to the Graduate School Info Session with Thelma from the Graduate College. She provided a lot of useful information I wish I had a year ago to be honest. I was relieved to see I was following her advice and timeline, however. I took the GRE in January and already have my list of schools figured out. The hardest part now is contacting professors because social skills are hard sometimes.

For lunch today, we had Jared Danielson from Vet Med come for Luncheon Lecture. He was really funny and did a good job of both asking us about our interests and talking about his research. I enjoyed hearing about how he chose and interest and it took him a route he didn't expect. And bonus points for teaching us how to do a blood smear?

USA! USA!

Posted on [July 6, 2015](#) by [sbeadle](#)

What a great weekend to be in the US. Obviously because of the 4th and all that jazz, but also WORLD CUP CHAMPIONS! I am definitely a conditional sports fan, and this weekend was one of those times.

To rewind, on Thursday we left early to get the long weekend started. After we all took power naps, we took a late night adventure to the High Trestle Trail in Madrid. I had heard that it was a good idea to park at the Flat Tire Lounge... which is true if you're on a bike... so much if you're walking. We started out going the wrong way and realized about a mile in. After we started going the right direction, we learned it was a 2.5 mile walk to the bridge. YIKES. But we did it anyway. A mile and a half in, we discovered there was a place to park and walk a mile away from the bridge... Which in hindsight would have been a better place to park, but we got a workout in! It took us a couple hours to do the 6 mile journey, but seeing the bridge was pretty neat.

On Friday, we attempted to play some volleyball then grilled out by Freddy Court. After dinner, we went to Reiman Gardens to see the fireworks!

On Saturday, the squad went to Des Moines for a little exploration. We attempted to go to Valley Junction, but most of the stores were closed unfortunately. We went downtown and everyone saw the capital before we went to Jethros for dinner.



On Sunday, I met up with a friend from school and we went kayaking in Boone. The weather was perfect and my shoulders are only a little sore. After I got back, I crashed for a bit before going with Maggie to go see the World Cup Finals and VICTORY. We got home and then went with David, Gabe, and Allie to Applebees for late night appetizers.

Overall, a successful long weekend, hope you had a good birthday, David!

This morning, my team worked more on our coding and poster. It seems like we have no time left to get things done, but also not a lot else going on. Our team is still waiting on IRB approval. We also have the Mid Summer Presentation and Journal Club coming up next week so we have quite a bit to do in the next few days. Hopefully we can get our interface done in the next couple of days and then work on those bigger projects while we wait for IRB.



I remember my first walking taco....

Posted on [July 1, 2015](#) by [sbeadle](#)

Proud of you Alex for having your first walking taco today, I hope it was everything you imagined.

Yesterday after blog time, we had a team meeting upstairs. We started out talking about tech stuff, then switched to writing, and ended with our next steps. We got a good laugh out of Dr. Sweet going to pull down the screen for the projector and having it shoot off the holder and swing down to the wall. No people or equipment were harmed! But it was so unexpected it was just kind of funny. We talked a lot about the interface, and hopefully that's functional by next week so we can get started testing. My assignment is to edit our paper again and adjust the video sizes so we can work on eye tracking too. The hardest part now is not knowing whether or not we have IRB approval, hopefully we find out next week!

Last night, I got to go cruising on my new bike! It was a perfect night for it. I went to the VRAC for a test run and then back through the park down by the watershed. That trail is beautiful!

This morning, we worked on projects and talked more about our interface. Nancy got a lot done last night and it is almost ready! It is always interesting to see what I see as opposed to what my teammates think about because of our different backgrounds. Either way great work Alex and Nancy!

I've also become very attached to Parks and Recreation over the last couple weeks so be prepared for all the quotes in my future blogs, y'all.



Back to work.

Hyperreality

Posted on [June 30, 2015](#) by [sbeadle](#)

Wow I loved that Luncheon Lecture. Today we had Sherry Berghefer of Journalism/Mass Communication. I honestly didn't expect much when I saw what she taught, but then I was so fascinated when I heard what she wants to do for her Ph.D.. I hadn't heard of the Avatar Effect before today, but I share Professor Berghefer's fascination that's for sure. I can't wait to hear how her study comes out and to see the eye tracking findings! She was also hilarious.

Yesterday, we had another Ethics seminar after blog time. I enjoyed talking as a group about the articles we picked before Eliot got there almost as much as I enjoyed the actual class. We all did a good job talking about the issues in a calm way and analyzing the issues.

After class, we worked on our projects for a little bit. And then I become the proud owner of a brand new bike:



Yes, this is the actual bike I purchased.

Just kidding.

This morning, we also had how to make posters with Stephen. The breathing exercises took me back to my choir days. Stephen gave us great advice on how to make talks less awkward (one of my downsides, shocking, I know.).

It was really helpful to go through the exercise of making a quick presentation. Sometimes I focus so much on getting through the presentation and getting my point across, I think I forget to breathe and take it all in, e.g. finishing our 3 minute presentation in 1 minute and 30 seconds (sorry Maya). It was a good way to practice what things we can do even in short presentations that make a huge difference overall.

End of Week 5

Posted on [June 26, 2015](#) by [sbeadle](#)

We are halfway through the summer, how did this happen? Five more weeks and then we'll be back in the real world

guys....

Yesterday afternoon, we had Craft of Research. I had a rough case of the 3 pm crash, my apologies Anna. Overall, it was useful to get a lot of feedback on our introduction though. I wish we had more time to edit before we sent out that section, however. We have so much to do before we leave today with relatively no work time, which is kind of frustrating, especially when I want to read the Supreme Court decisions that came out over the last couple days instead of work... Just me? Probably. A challenge my group faced is that we should have been more collaborative on our writing. It seems easier for someone in the group to do the task, but in the end I think our introduction would have been better if we spent more time going through it together. It is hard to find that balance when we have so much to do as a group, hopefully we can improve that the next time we have a writing assignment.

Before we left last night, we worked on making edits for a bit, but honestly my brain was just fried from the amount of information we had coming at us this week.

After work, Jordan and I got together and worked on our Intro to HCI project. That went by pretty easily, but apparently we should have put a little more thought into it with the constructive comments from Desmond. You live, you learn!

This morning, we had our last modeling course with Alex. It was fun to see how everyone made the model they did and what things they took into consideration I wouldn't necessarily have. I enjoyed hearing the questions Alex and the group brought up when we presented our design.

Before lunch, we had our first group led journal club. I thought their article was interesting with my background of some chemistry and physiology. I really don't understand why they chose to put the sensor on the deltoid during a leg workout.... I also wonder if they considered tapping into the voltage power of neurons firing to power their sensor. It was nice to use the more "wet" science part of my brain for an hour. I definitely was challenged to see what I retained from physiology. Overall, I wish we had more time for discussion on the article, it seemed like we didn't get a chance to ask many questions or really dive into the paper.

Stormy Night

Posted on [June 25, 2015](#) by [sbeadle](#)

Yesterday, we had some work time after our etiquette lunch and blog time we had project work time. I worked on our intro and methods for a bit before we went to stats class with Dr. Jordan. She is so nice and enthusiastic, but lecturing on statistics is just not my way of learning. The course was all review for me as one of the older members of the group so I just tried to stay focused. The flow chart she gave us for doing analyses is awesome, however.

This morning, we had work time on our projects until 11. It was nice to come in and just have some time to get started at our own pace and figure out what we still have to get done. I started our mid summer presentation slides because our group actually has a little bit of a lull in the next few days, or at least I do, while Alex and Nancy work on coding.

For lunch, we were joined by Dr. Jon Kelly – professor of Cognitive Psychology and HCI. I was excited to hear from him because once again, up my alley. He has some interesting research. I don't know if I could spend my life doing something as specific as depth perception in VR environments. But he provided some great insight on work life balance and academia. The chicken today was also excellent. It was nice to get to meet (even briefly) the McNair program visitors from Wisconsin.

This afternoon, we have more work time and Craft of Research! We sent our introduction to our grad student mentor last night, and he did some serious editing, so I hope today goes well for us!

Don't burn your bacon (and other life lessons from this Wednesday)

Posted on [June 24, 2015](#) by [sbeadle](#)

So I set off the fire alarm this morning... and made most of the group miss the bus... but we're closer because of it right guys? No? Okay....

But seriously, thanks for not hating me, roommates.

On another note, yesterday was a busy day after blog time. Our group split up and worked on IRB/coding, which went well. We had the documents pretty well done and then Dr. Sweet asked Dr. Gilbert about turning it in, and a series of panicked exchanges later, we determined it had to be finished, signed and turned in within an hour WOO. So Dr. Oliver oh so graciously agreed to sign it before he left, allowing us to deliver it to the IRB on time for review. We didn't realize our program IRB deadlines were kind of arbitrary and that we needed to get the ball rolling on our own, but research has hiccups like that all the time so everyone handled it well overall.

During our meeting yesterday, Dr. Sweet also proposed that we work on another experiment to have us accomplishing as much as possible in the time we have here. I'm excited because it means we're doing eye tracking! Basically, as we work on testing the interface, we're also going to have people viewing the videos and being monitored on eye tracking equipment to collect more data. I think this is a good fit for our group because as Nancy and Alex are debugging and getting into the level of programming I don't quite understand well enough to be helpful with, I can work on the other project where I have a more clear skill set. And now that we had the IRB turn over of yesterday afternoon, it made that IRB super easy and we're already editing that one.

This morning, we had work time and then ethics class with Eliot. I loved ethics class, but that's also what one of my majors is centered around (if you didn't know guys, philosophy isn't just deep thinking about our existence). I enjoy his bluntness and approach to the course. I'd love to read books on ethics in HCI and see how people are looking at it from different disciplines.

For lunch, we went to the Memorial Union for an etiquette luncheon. It's always nice to have a refresher and to hear about it from a more academic perspective. That was all fun and games until it POURED. But now we're back in the VRAC safely and working on our projects.

Taco Tuesday

Posted on [June 23, 2015](#) by [sbeadle](#)

Yesterday afternoon, we presented our OpenGL projects to the group. Nancy worked her butt off on that roller coaster but it was beaten by the also impressive Pacman. A formidable opponent, I suppose.

Later, we had a little bit of project work time. I cranked out our IRB draft for the most part. Today we have our research team meeting, so we'll see how that goes. We had a meeting with Dr. Sweet before the end of the day where she provided feedback on the procedure I had outlined as well. It was interesting to talk about the different HCI aspects we could incorporate into our research. I hadn't thought about the different ways you can analyze usability and get feedback really, but now we are thinking of all the different research we can do in that regard. Overall, a pretty productive meeting for being at 4:30 on a Monday!

After work, Mak and I went to yoga. It was a much needed break from the computer screen and research.

This morning, Adam taught another day of Modeling class. This time, it was much more clear how to go about making the objects and getting what we needed. It was extremely helpful to learn the keyboard shortcuts and different ways we could approach the design. Things became a lot more clear when we started fresh today.

For lunch, we had tacos obviously (the namesake of my post), but more importantly we met with Dr. Hayes from Mechanical Engineering. Her research is a great example of HCI with the virtual collaborations and how gestures

make a difference. I was really intrigued by her mentioning of the computer etiquette and how people are less likely to provide honest feedback on the same computer they used for the study. This is good info to have if we are asking our participants for that kind of response with our experiment.

A busy week ahead

Posted on [June 22, 2015](#) by [sbeadle](#)

The last week just kind of flew by and now we're on week 5 WHAT. I'm not ready for it. Or all the work that comes with it.

This weekend, I went to Des Moines and saw a concert on Friday with some friends from school. It was nice to get out once again. I think Ames gives me some sort of weird cabin fever. Saturday, we got to sleep in a little bit before we went to Boone for a tubing adventure! I loved being on the water for the day and enjoying the outdoors. I think even I forget how beautiful Iowa can be if you go to the right places. The river was the perfect temperature, we got just enough sun to be a little bit burnt, and all of us made it out of the water... eventually. As we ended our river journey, a few missed the ramp to get out of the water and ended up a little past, meaning they had to come upstream to get out. Yikes, that was a mess. It was kind of funny to watch from dry land (sorry guys). The end of our tubing excursion was a little stressful as a result, however. I'm sure we have some quality photos from the disposable camera Mak and Allie bought. Once we got back to Ames, the group went to BWW for dinner (it was 3pm so whatever meal that is). After a solid nap, David, Alex, and I went to "Inside Out" which is a super cute movie for those of you interested in seeing it. I'd give it 4 milkshakes.

On Sunday, my team came to the VRAC to work on our projects. Alex and Nancy focused on the roller coaster for OpenGL and I offered support while working on our IRB application and literature review. I got a lot done, a couple consent forms, our script, our debriefing, and a basic procedure, plus filling in a few of the blanks from our application. So on that front, we're starting off the week well, but we still have a LOT to do. Sunday night ended with a little relaxation. Maya, Allie and Mak made dinner for the group and we ate together and played some games.

This morning, we had another Modeling class and started working with Maya. It's a pretty cool program, but hard to really know what you're doing at any given moment. I made a model of the dog Adam gave us images of, but for some reason it has holes in its head? I don't really know what's going on there... But I'm going to keep playing and hopefully patch up the gaps.

Human Rights and HCI

Posted on [June 19, 2015](#) by [sbeadle](#)

Yesterday afternoon, we had another Craft of Research. Here we addressed an article that was published in a credible journal because it had results that seemed appealing to the public. The media blew the article and it's findings way out of proportion, making it a good lesson learned, because the authors admitted to doing it poorly just to see how far they'd get. This fall I'm the student leader in a class about myths in medicine at my school and I'm definitely going to use this article to articulate the point of information literacy!

For our afternoon activity, we ventured to student services to play with biofeedback! I have used similar equipment before and my adviser at school used to do biofeedback for migraines so I've heard a lot about it, but I didn't know the game based nature of new platforms. I thought that was a really cool HCI tie-in to see how game based designs could be used to treat mental health! Here's a link to the author's reveal if anyone wanted to read his perspective: <http://io9.com/i-fooled-millions-into-thinking-chocolate-helps-weight-1707251800>.

Last night, Maggie and I went to Stomping Grounds before we went home to work on our Journal Club presentation. I had the unpopular opinion of thinking our article was pretty interesting. I didn't necessarily agree with the method they went about collecting information as far as an academic journal publishing, but I think the article still providing

an interesting perspective on the field of HCI. I hadn't previously thought about the methodology of evaluating whether a project was ethical or respect human rights, so it was interesting to see how authors contributed to the literature and evaluated their work and others.

This morning, we worked on programming some more and then had Journal Club. We are still waiting to hear who the winner is of that challenge... And Dauntlepuuff is in 2nd by 1 point so pressure is on.

Interface_HCI (Let's Go to the Mall!)

Posted on [June 18, 2015](#) by [sbeadle](#)

Shoutout to anyone who gets this HIMYM reference....

So I did my interface analysis comes from the **Dillard's entrance** last night. I chose this because when we were there, almost all of us ran into the door on our way out... Here's part 1: the automatic door.

The task and context: Getting in and out of the store, without having to empty your hands of your many shopping bags. The behavioral principle is that it should open when the user approaches it. □

What is working/not working: The door works and is labeled in a way that makes sense right? But when you leave, you automatically assume the door opens on the right. The space is too small for multiple people to go through at once. I think they spent too much time on some design principles- like purposeful and pragmatic, as opposed to elegant design decisions.

What would make it better: widen the entryway, make it very clear which door is the exit- because most have it on the right side. They could use more interface-level principles to clearly identify the intended path of the user.

Interface 2: The other Dillard's door.

The task and context: get out of Dillards. □

What is working/not working: The door did a good job of saving space and making sure people didn't try to open it, but did a poor job of eliciting users. I think a big concern I have is if you were in an emergency situation, I don't think people would realize it isn't part of a glass panel.

What would make it better: although they focused on design values and behavioral principles, they lacked attention to conceptual principles- our schema of what a door looks like- as well as interface-level principles. Even an exit sign nearby wouldn't necessarily make users aware of this as an exit.

OpenGL is what dreams are made of

Posted on [June 18, 2015](#) by [sbeadle](#)

No literally guys, I had a dream last night about finding some super cool demo in OpenGL..... I don't remember what it was, but I remember thinking about OpenGL. Week 4 is hitting me hard I guess.

Yesterday afternoon, I worked on informed consent for our project and our research question. I don't know if anyone else has done their research question, but it is HARD to put everything you're doing into a sentence and question form. I hit a bit of a rough patch defining this one. Hopefully Dom can help us with that one today. While I was working on that, Nancy and Alex talked with Adam about the logic of our interface, giving birth to the loads of text happening on the whiteboard. #sorrynotsorry

This morning, we worked on our solar systems more. I managed to put my texture call outside of a Pop matrix and turned all of my planets different shades of Earth... Upside down... Order of operations is important I GUESS. It's

kind of funny for now, however.

For Luncheon Lecture, Dr. Lee from the Apparel, Merchandising, and Design program spoke to use about emerging technologies in human use designs. She did a great job of tying her work into the bigger picture of sustainability and HCI. I was especially interested in the synthetic leather she worked to create. It is kind of fascinating that bacteria can make that... also kind of horrifying. I think my favorite part of her talk was hearing how she talked about her own insecurities and the work life balance. I definitely identified with her logic of we can train you in computers, but we can't teach you how to think or work with others. I get that message a lot as someone from a small school. She highlighted the value of working in industry well.

On another note, our trip to Des Moines last night was much needed. I liked getting out and seeing things that were just familiar and comfortable. The saga of Iowa being ridiculously small continued when I saw a couple people I got to school with at Trader Joe's. Thanks for accompanying me Maya, Jordan, and Allie! 🐾

OpenGL is out of this world!

Posted on [June 17, 2015](#) by [sbeadle](#)

Get it... because we're making a solar system...



Yesterday afternoon, we had a very productive group meeting/work time. We started out as a group talking more about what our project will look like and trying to get everyone on the same page. After that, Alex and Nancy worked with our grad student mentor Adam on Qt and the program itself, while I did our IRB with Dr. Sweet and Dom, our Psych grad student. I enjoyed doing something I was knowledgeable about and getting to see a different institutions IRB. With that said, I now understand why many are not huge fans of Iowa State's Institutional Review paperwork... it's 26 pages. Holy moly that's a lot of questions to answer. Thankfully, the seasoned pros- Dr. Sweet and Dom,

talked me through the process and now we just have a few paragraphs and forms to add and we are well on our way to a completed application.

After group meeting time, we had IRB training, woohoo! It was an hour of hearing how IRB worked and what questions people had about the process. I think sometimes I struggle to find my place or feel productive with group work because of my limited programming knowledge, but it is nice to have the reminder that there are places for me to contribute and I have different training other members of my group may not. We determined that our project probably won't involve computer vision, but if any of us were to ever work on a project like this again, we know how to implement it and where to look so not a complete loss. Our project is definitely do-able in the time we have so I hope we actually get time to run trials and play with our interface! Now our project will take shape with the videos playing and people clicking on the image and pausing it, clicking the body parts they see as a concern and then being able to identify what behaviors are concerning with tabs and check boxes on the right of the interface. It is interesting to see the different questions we have that come up every time we work on our project. There is so much to be done with this program, I hope it continues to be useful for our faculty and eventually law enforcement in the future!

Last night, a few groups met up and worked on our Craft of Research homework of finding 10 journals we could potentially publish in. I think this was more of a struggle than I expected. For one of my research classes, a book we read talked about having a fear of your project not being scientific enough, and I feel like that's really common in social science research. When looking for journals, I felt like what we were doing at this point was such a stretch to publish anywhere so I had a hard time finding ones that seemed appropriate. With that said, we did end up finding a bunch that ranged from psychology to computer science we could potentially submit to. Another important revelation from work time last night is that Alex got super excited about the initials for Craft of Research being "CAR".... update for anyone who didn't notice, they're definitely not "car".

This morning, Vijay led another programming class. My solar system in OpenGL is coming along. With the help of my lovely teammates, I made my spheres solid this morning, so the next challenge is playing with lighting. Nancy worked on the logistics of making a roller coaster- our group's project. Vijay does a great job of explaining things, but sometimes it is hard to try and piece it all together for me. I am used to starting from a base code regardless of the project, so starting with example code and manipulating sections and different pages has been challenging. I think it is a useful skill to be able to read and understand someone else's code so it's hard to be frustrated. Overall, I'm learning a lot about OpenGL, which I couldn't have even explained or used a week ago.

I think a few of us are going to Des Moines tonight to go to the mall and just get out of Ames for a bit. I love Des Moines so I'm excited for food and a little shopping!

OpenGL and Stuff

Posted on [June 16, 2015](#) by [sbeadle](#)

Day 2 of OpenGL and week 4! OpenGL has come a lot faster than I expected. Overall, I get the concepts we're learning and haven't really struggled to implement the ideas. Today when Vijay was explaining how to make the solar system, it clarified a lot of the questions I had yesterday and pulled the concepts together. I tried to look through the rotating cube demo yesterday and play with it and failed miserably, but when he explained how it worked today something just clicked. Now I'm in no way a pro at OpenGL but I definitely can do more than I could have if you gave me this assignment on Friday.

Last night, we met with Dawn (our adviser) at 5 to talk about the progress with tech stuff. She had a lot of comments on our problem area paragraph, which is still kind of daunting. We have to have an IRB done by the end of the week, and although I've written a few IRBs in my time, it still stresses me out to have to have it done by Friday. I know we can do it, but I think I'd like having more time to make sure it is polished and perfect if I could go back in time. On another note, It was kind of funny to watch her and Nancy go back and forth last night. I like playing translator and

filling in the gaps for both. It is probably my favorite part of group work because I get to watch the a ha! moment happen.

Today we had luncheon lecture with Eliot. Holy cow he's done a lot of research and work. I think I was most intrigued by listening to what they've done with BodyViz and where they want to go with it. I have heard so much in psychology and neuroscience research about how long it takes to not only create a scan, but to analyze it and understand the data. If they can get the functional aspects of that figured out, it could do wonders for neuroscience research. I know the current struggle is that with functional images you see a starting point and what activates, but you can't see the way it necessarily moves. We could learn so much about neuronal tracts from a functional image of someone remembering something or processing which would be so helpful to that kind of research and application. (Insert impending life crisis about grad school path here)

In other news, since I went to Colorado, I've been feeling like exploring outside. Hopefully, my sister gets a bike up here this week for me to go adventure with, but for those of you who I haven't told about this, we need to go to the High Trestle Bridge like 20 minutes away. It goes over the river and lights up at night! Check it out team, lets go!



Ain't she a beaut!

Back to work

Posted on [June 15, 2015](#) by [sbeadle](#)

Well it seems like we haven't blogged in ages! A lot has happened since Friday afternoon. After we got done blogging, we had an Intro to HCI course where we talked about what HCI is as well as got to play with some toys. Stacy showed us the SUPER COOL Oculus Rift and we got to see the virtual Iowa State game set up. It was really encouraging to hear how Stacy came to ISU without any experience in programming or virtual environments and is

now up to pro status.

On Saturday, we went to Marshalltown for the ropes course. I was happy to see it wasn't your usual ropes course when we got there. They had us do a few group activities but then we got to the big toys. They had a 30 foot drop swing and a giant tower to climb. It was so cool to get to the top of the tower and see the scenery around but also just feel accomplished. My favorite part of that experience was being able to belay each other and how we started to work together, and not in the cheesy way but in the actually efficient way.

This morning, we had intro to OpenGL with Vijay. I have played with similar concepts before in Python, we had to make a game and used moving sprites and stuff, but it is a lot more challenging to do that upper level programming with a language you don't know terribly well. Our assignment was to create our initials with shapes, which sounds like a fairly easy task.... until your initials are SCB so curves for days. I have an S and a C but the B is still a work in progress.

We had Elizabeth from the Society of Women Engineers talk to us before we went to lunch. She was a hoot. I enjoyed all of her casual comments about being a woman in STEM. Her research sounded really intense. I thought she was hilarious.

Friday, Friday

Posted on [June 12, 2015](#) by [sbeadle](#)

Yesterday was quite the day! We had an afternoon Craft of Research course, where Anna went through what makes a good literature review and gave us the challenge of finding 10 journals we could submit our summer research to. This is a great way to get us to learn more about what journals are out there in HCI and what guidelines the various journals have.

In the evening, we went to Stomping Grounds to meet with graduate students organized by Anna. I must have picked a good spot, because I happened to end up next to the one studying neurotoxins and Parkinson's at Vet Med. We bonded over talking about conferences and how we might be at the same meeting in Chicago in the fall. The grad students were encouraging and provided useful advice on how to find a lab and how to get into contact with professors. They were very energetic about grad school and the local eating options, too.

This morning we had a 2 hour session on resumes and CVs from a counselor in Engineering Career Services. He was very knowledgeable and provided TONS of ideas and notes on what we should do as people in STEM for application materials. I think it was most valuable to have someone who specializes like this- I wish I had that amenity all the time.

In Journal Club, we worked on reading and summarizing the different sections of an article in teams. It is kind of nice to work with a different group than the usual, not that I don't enjoy working with Nancy and Alex. I was very incorrectly placed on Hufflepuff by Desmond, f.y.i. I'm definitely a Slytherin and still not quite over it. BUT, thus far, we are in the lead with 2 points. Gabe and David, I believe in us. We summarized the results section of the article- an interesting task for people with very different backgrounds. I think we all provided a different perspective on the results which allowed for the different members of the big group to take away something they could understand and wonder about.

Tonight we're going to BWW and Jurassic World, and tomorrow we have the ropes course in Marshalltown. Major props to David and the family for letting us hang out at their place afterwards. I think it's going to be a fun weekend!

Speaking my language

Posted on [June 11, 2015](#) by [sbeadle](#)

Alas, we have a psychology oriented program! It was so nice to have Dr. Dark come in today and talk about cognition and HCI. I enjoyed knowing exactly what she was talking about and being able to connect with her as far as the social science background goes. The fish pictures periodically kept it interesting. Her perspective as someone who is purely cognitive, not cognitive with a neuroscience focus was something I hadn't really heard of before. Either way, let's just say she had my attention... get it... attention (I think I'm funny).

Yesterday afternoon, my group went to the eye tracking lab, so I got hang out with my old friend, the SMI Red 500 and once again speak the psychology language as opposed to computer talk. It was fun to see what differences ISU and Simpson's systems have- we have glasses but you guys can plan video and do dynamic AOIs! (An AOI is an area of interest on an eye tracking image- teachable moment for those of you unfamiliar with the jargon). I appreciated talking to Jason- their eye tracking guru- about the system and his research. It's helpful to hear he plans on graduating next spring... and is the only one trained in eye tracking... and I am also trained in the software.... and going to graduate school that fall.... If you're picking up what I'm putting down. But in all seriousness, there is a lot to learn about the SMI Red system and eye tracking for psychologists that would be a lot easier if we worked together on it. It was nice to bounce ideas off of him and talk about how he creates experiments. He was also super helpful in terms of understanding what it is like to be a graduate student eye tracking guru as opposed to my current status of undergraduate eye tracking guru. (Sorry for boring you again, Alex and Nancy) I feel like I get a new idea for a graduate path everyday, which is becoming increasingly stressful, but I'm also finding ways to combine them and hopefully figure my life out in the next year.

Overall, a successful couple days of being a social scientist most of the time and a computer scientist a little bit of the time. I like that balance a lot more than being fully one or the other.

Last night, I went on a solo adventure to Hy-Vee and that was the most Iowa I've felt this whole time. I worked at Hy-Vee for 4 years so I in the weirdest way start to miss it periodically. By the end of the summer, you guys will all choose Hy-Vee over Walmart, you just wait. Hy-chi will become an addiction.

A trip to the planetarium and a day of 3-D design

Posted on [June 10, 2015](#) by [sbeadle](#)

Last night, the collective had a late night outing to the Physics Hall for a planetarium show and stargazing! It was fun to go with a group this size and of the same age, I feel like every other time I've gone to something like that, the presenter has to adjust their show for kids in the audience. The grad students did a great job of talking to us in a way that was funny and at a level that we could understand. The show was fun and it was cool to hear about the bigger questions we had as a group and how excited we got about space. I think in a past life we were probably all astrophysicists. At least I'd like to give myself that credit.

This morning, we had a pretty long modeling and 3-D design class. It was kind of hard to stay focused on a lecture geared towards understanding a lot of specifics about 3-D printers and the technology behind them. I think I would have benefited more from going over to the lab space or holding examples of things made from the printers. I appreciated the tie in at the end about how 3-D modeling and printing could be used in each of our professions. I think the application to prosthetics was a really interesting example I hadn't really thought of. I know so many people could have benefited from the less costly and more personalized options that can come from a 3-D printer. A really helpful application of the medical imaging software would be allowing it to create a 3-D model around a body part, e.g. a back brace for someone with scoliosis that could be adapted and created for each individual off of a scan.

Eliot if you're reading this, I hope you've already thought about that, if not, you know where to find me (kidding but also not).

A busy day

Posted on [June 9, 2015](#) by [sbeadle](#)

Is it just me or has today flown by? I haven't even had time to blog until now!

Today was exciting overall. I was struggling with making the wheel yesterday, and today's tutorials listed on the board by Alex made that make a lot more sense. I did the first few on assembly and learning the other features which helped a lot.

Luncheon lecture kind of flew by before I even had a chance to process what all Dr. Jordan said. She has done SO MUCH RESEARCH. I thought I was kind of all over the place with my interests, but she might have one-upped me on this one. I loved what she did with EEG. I'm not sure what the purpose was, but seeing EEG patterns like that is kind of beautiful. My apologies (not really) for all the times this summer I will be super excited about brains. It kind of comes with the neuroscience territory.

This afternoon, my group had a power meeting about our project. We finally got a computer science mentor- yay! Adam gave us exactly the guidance we needed to start making a tangible product and make a timeline. But, this means we now have a lot to get done in the next few weeks.

Today I also really realized the value of being someone with interdisciplinary interests when talking to my group and our faculty. Dawn commented on how useful it is to have someone who can speak both a little bit of computer and behavior for a project like this. I think that kind of encompassed my interests. I have spent a lot of time at home working with other students on projects and knowing how to speak computer is absolutely helpful. I'm glad I got the chance to become a little more fluent in that this summer. Of course that will be a highlight in my ever looming grad school statements of purpose, but it is nice to now be able to give a concrete example of being a go-between this summer.

At the end of our meeting, Dawn, Dom, and I kind of geeked out about behavior and snap decisions.... then false confessions... then general crime... and I don't think Nancy and Alex appreciated that one much, but it was nice to get to take a break from computer language and switch to psychology for a bit. Sorry about it guys, by the end of this maybe you'll be watching documentaries about false confessions with me? No? We'll see.

Now back to problem area paragraphs and tutorials on Qt! My task is to make a pretty interface. I can't say I'm mad about that one.

Warming up to 3D design

Posted on [June 8, 2015](#) by [sbeadle](#)

Well weekend, it was fun, but now we're back to work. This morning we started with modeling class, which was pretty interesting because I've never played with that before. It is kind of amazing how quickly you can make something using Solid Works.

One of the hardest parts for me was reading the drawing and trying to create an object in 3D with pen and paper. It's pretty challenging to try and orient yourself and think the way a designer or architect does.

Something I've really enjoyed about the last week or so is how easy it can be to learn a new technology or program. I had no idea what Visual Studio or Solid Works were before this program, and now I can not only use them but go through a tutorial to create something. When I took Intro to Programming at my school, all we did was use Python files and text, we never had a program like Visual Studio, which made it harder to see the application of the material. Having this experience has already made an impact in my confidence, I am more willing to try something on my own now and feel like I am able to create something and problem solve. Before, I would be quick to just ask a friend or professor for help, but now I am more apt to use the internet to see what I can find and try to do something new in my own way.

Aside from programming and modeling, I can't believe that the temperature is going to be in the 90's this week. It's

only June. I'm not ready.

Greetings from Colorado!

Posted on [June 5, 2015](#) by [sbeadle](#)

Hi all, I safely made it to Colorado for the weekend! My flight tried to go into Denver but there were a bunch of storm cells above the airport so we got delay and then had to stop in Pueblo to refuel but finally got landing clearance. I got to the place I am staying at 1:30 am (3 hours late). So have fun with those storms this weekend!

Uploading the pictures on mobile is kind of a challenge but the mountains are glorious, even on a cloudy day.

On another note- the pictures from light painting look awesome! I love the one that looks like a dragon breathing fire!

Enjoy your weekend and skyzone! I will see you all on Sunday!

Making Progress

Posted on [June 4, 2015](#) by [sbeadle](#)

So yesterday afternoon we had a few hours of project work time. I think the biggest challenge facing my group is not really being sure where to begin. We are waiting on a grad student with a computer science background to join our team so we can work more closely with them, but until then we're just sort of starting from scratch.

I got kind of frustrated spending hours just searching for articles on body detection software so I eventually just got onto YouTube and searched something along the lines of "video player in visual studio tutorial" and voila there was exactly what we needed! So I watched that and played with the tutorial and now we have a sort of functional window that plays a media player file and allowed me to add other buttons. Hopefully this makes sense to my teammates and we can make it into what we need. I also found the tutorial for Studio 2010 as opposed to 2013 so we'll see if it transitions easily or has additional features. One of the challenges with this is that I have buttons, but I haven't quite figured out how to make them respond with something else and have no idea what the data file looks like, so our first baby step is in, but we have a long way to go!

In other news, although I wish I didn't have to miss anything, I'm very excited to see the Rocky Mountains tomorrow when I get a weekend adventure to Colorado for a wedding. Look for some pictures tomorrow afternoon!

Apparently it's Wednesday?

Posted on [June 3, 2015](#) by [sbeadle](#)

This morning, we programmed again for a couple hours. It was fun to do the challenges and then to get to work on our group projects. My group is making War in the command line- like the card game. My responsibilities are keeping track of the rules and working on more of the presentation stuff, but most importantly, I'm making the trash talk. We have most of that stuff done, and I have limited knowledge about the logic Alex and Nancy want to do, so I took a little time this morning conquering our issue of finding open source code that can detect people from a still image or video. I found some literature and some code so hopefully we can make some progress on that today.

If anyone knows of some code we could use to do body recognition, comment away! I am also accepting any and all punchlines for our computer opponent to say in War so share those too!

In other news, apparently it's Wednesday and not Tuesday, which is what I previously named my blog. Oops. My sense of time in the summer is always a mess. Also, my contacts were making me miserable this morning, so now I

only have one in, so if you see me looking angry or glaring, it's actually just allergies and poor vision.

Touching a Nerve

Posted on [June 2, 2015](#) by [sbeadle](#)

Well we just got done with our first Luncheon Lecture with Dr. Stone and I think that one is going to be hard to beat. I managed to ask him a simple question, "Why did you choose to become a professor instead of going into industry?", and the response triggered a 5 minute rant on Drew Carey vs Bob Barker on The Price is Right (the namesake of this blog post). That was not what I expected as a response in the slightest, but now it all makes more sense.

Luncheon Lecture was one of my favorite parts of being at the VRAC so far. It was interesting to hear a combo of experience and life advice of someone who is teaching in HCI. Dr. Stone provided a ton of insight on what to do at conferences, how to get into grad school, and how to not be a dead weight, which I really enjoyed. It was helpful to hear the ways he interacts with current students and prospective ones to get a feel for what we can do in the next few years.

For this afternoon, we are working on our projects and presenting our ideas for my group. I'm excited to get back together and hopefully make some progress and set some goals today.

On a lighter note, lunch was delicious.

Meeting Dr. Sweet's Dog (and other important stuff we did today)

Posted on [June 1, 2015](#) by [sbeadle](#)

Well so far we have survived our first Monday! The morning started out with a quick programming crash course and we got our first C++ challenge!

Later, we got to go see the UX lab, haptics equipment, and Mirage. Mirage did not look like what I expected, I thought it would be a mostly empty room, but man was I wrong! Mirage was full of walls and had more TVs and cameras than a Best Buy! It was interesting to hear the various projects happening in that 40 x 40 space. I didn't expect to see a virtual combine next to an augmented reality factory, next to fake walls for Army trainees to come kick down. Mirage is a really cool project, and I can't wait to hear more about what projects are happening there as well as the other labs.

Today over lunch, my group met with our adviser (and her dog). We talked a little bit about our projects and life which was kind of nice to have a meeting that wasn't all about our project. We are working on our storyboards now and planning to go people watch this afternoon. Dr. Sweet wants us to see what normal behavior and walking looks like so we can get better at detecting when someone is deviating. We are going to go explore the MU, the middle of campus, and maybe hop on the bus for a while to see other scenarios.

We spent our weekend both having fun and stewing on how we can accomplish the task that is Threat Detecting. I'm excited to present tomorrow, hopefully our project is feasible and we can get a lot accomplished in the next few weeks. I can't wait to see what Alex and Nancy come up with!

Now for some casual people watching- all in the name of research!

A little relaxation

Posted on [May 31, 2015](#) by [sbeadle](#)

Thus far our first weekend has been a success. Yesterday was an early morning (7:30 leave time on a weekend, gross) but we got to just kind of hang out for the first time as a group. We got coffee at a cute shop on Main Street in Ames before the Farmer's Market started. A few of us got a game of Battle of the Sexes started and we all just sort of hung out for a while in the shop. Most importantly, the women were victors.

After the coffee shop, we hung out at the Farmer's Market for a couple hours and explored the little shops and food stands. Apparently this group is very attached to cats and animals in general, so much that I think Anna and Desmond will be taking us to an animal shelter one weekend so we can get our fill.

Early mornings apparently come at a price for us, everyone came back and passed out for a few hours. My room went out to eat at Buffalo Wild Wings for dinner and got a couple decks of cards and then had some quality bonding time until Ogue passed out on the couch at 10 pm and then we all went to bed.

The first Saturday was a success, hopefully by the end of this we won't be so nap dependent!

Week 1- That's a wrap!

Posted on [May 29, 2015](#) by [sbeadle](#)

As we wrap up our first week at the VRAC, there is a lot of information for us to take in. It feels like we moved in just yesterday but this is day 4 in Ames!

This morning, we got to go into the C6 and do a couple different simulations. I enjoyed seeing the John Deere one because I just went to the Ankeny factory last week for a class and my dad works at the branch in my hometown. There is something sort of exhilarating about seeing a virtual corn picker and planes up close via a glass cube and projectors.

My favorite part of the informative aspect of the morning was hearing all the educational programs the VRAC does. I love that they make Halloween demos and donate old systems to schools in the area.

On another note, last night we also had a sort of competition (you will all quickly learn that I'm very competitive) to make a computer from parts and see who could get the most out of \$250. Not to brag or anything, but my team won! I got a lot out of that experience by realizing how much I know about computers, but also how little I know about them. Either way, Betty (that's our computer's name) will be tweaked and brought to life in future weeks! Look for another post then to see how Betty turns out!

Lastly, it's the weekend, YAY! I am really looking forward to some down time and more opportunity to explore Ames!

The First Step

Posted on [May 28, 2015](#) by [sbeadle](#)

So we are now two days in- woo hoo! My favorite part of the experience so far has been getting to hear more about the projects during our Research Parade and meeting with our advisers and mentors today. I am on the Detecting Threat team (the best team if I may say so myself ;)) and our meeting this morning was a lot to take in. I was really excited, in the most nerdy way, to hear the Iowa State has an SMI Red 500 eye tracking system- the same one as I use at my home institution. I can't wait to geek out with the people who use it here and see what they're doing with the system. On a more broad note- I think one of my favorite things about the field of human computer interactions thus far is that all of the problems have a clear direction and impact on society. Sometimes with research you feel like your subject is too big or too small or can never be answered- with our projects we have to kind of slow down and take it step by step of course but it is clear we are working on issues bigger than just our time here for 10 weeks. Overall, the first couple of days have been great and Ames just has this aura of creating and building that is infectious (in a good way of course). I can't wait to see where these next weeks take us- so much excitement! (Yes

we already have inside jokes)