# Milestone 1 Progress Evaluation

#### **Team Members**

Grace Dolphy - gdolphy2015@my.fit.edu
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# **Faculty Sponsor**

Dr. Eraldo Ribeiro - eribeiro@cs.fit.edu

#### Client

Dr. Philip Chan - Computer Engineering and Sciences at FIT - pkc@cs.fit.edu

# **Meeting(s) with Faculty Sponsor**

9/18/18 (3:20 PM - 4:20 PM)

# Meeting(s) with Client

9/14/18 (4:00 PM - 6:00 PM), 9/28/18 (4:00 PM - 5:08 PM)

# **Progress of Current Milestone**

Task	Completion %	Raphael	Grace	McNels	To do
Compare and select Technical     Tools	100%	33.3%	33.3%	33.3%	None
2. Sample website & database	100%	33.3%	33.3%	33.3%	None
3. Resolve Technical Challenges	100%	33.3%	33.3%	33.3%	None
Compare and select     Collaboration Tools	100%	33.3%	33.3%	33.3%	None
5. Requirement Document	100%	33.3%	33.3%	33.3%	None
6. Design Document	100%	33.3%	33.3%	33.3%	None
7. Test Plan	100%	33.3%	33.3%	33.3%	None

## Discussion of each accomplished task (and obstacles) for the current Milestone

- ❖ Task 1: We looked at multiple tools for developing the frontend aspect of Form Buster, these tools included Angular, and AngularFire; we used node for both. We also looked at different database structures (relational and non-relational) so we could determine which would be a better fit for the needs of the project. As for the languages that we plan to use, they are pretty much standard (HTML and CSS) and comparison wasn't needed, but we compared Javascript and Typescript.
- ❖ Task 2: We were not able to get one of the sample websites to perform a user login with the database credentials, however, the other sample website interacted fine with the login request and database.
- ❖ Task 3: Our main database resource, Firebase, was investigated pretty thoroughly to learn how we would get the frontend to communicate with the backend. We also looked at practices that will help with constructing the API, but further research is required. In addition to this, our other anticipated technical challenge was creating a web interface, as well as being able to retrieve information from our database, which as mentioned in Task 2, was successful.
- ❖ Task 4: Collaboration was not a problem. We met in person, we used Slack as our principal communication tool, Github for version control, Google Drive to store our documents, Google Docs, Google Slides and Draw.io to collaborate on the documents we had to produce. Collaboration tools were not compared as we decided to go with the tools we know, and we used a combination of tools when another tool was not sufficient enough.
- ❖ Task 5: Doing the requirements wasn't challenging, but demanded a lot of time from us, since we needed to agree with each other and also have our client's approval (Dr. Chan). We ended up changing the requirements multiple times, which made us have to redo the test cases and the diagrams for the design document. However, as we changed the requirements over and over again, we gained a deeper and more clear knowledge of how the Form Buster system works.
- ❖ Task 6: The design document wasn't easy, specially because it made us think more about the Form Buster system as a whole; we had to think about its classes, in order to do the class diagram, as well as its database structure. In addition, the mockups for the graphical design of the website took longer for us to do than what we expected; it was also hard for us to decide on the designs, since we worked mainly over google docs and Slack, so all the communication was done by text and screenshots. Lastly, some changes in requirements that we made along this Milestone affected the design that we decided, so some of the mockups had to be redone.

❖ Task 7: The test plan went through many revisions for how tests should be done on our requirements and features. Originally we wanted to make test cases for each requirement separately, but based on the time when we finalized our requirements till the time we had left, it was not enough time. In addition to this, the standard test case table we used originally did not seem to be a great fit for our needs. We ended up settling with a modified test case table, and combined related requirements together. We would combine similar requirements together and test the events linearly such that: if this is done, then this is expected and it will impact these things, and if this is done instead of this, then this is expected and it will change these things.

#### Discussion of contribution of each team member to the current Milestone

- ❖ Grace: Investigated user authentication UI using Angular, Firebase and Typescript. Contributed to rationales of use cases, identification of functional requirements, introduction, constraints, and project description for the requirements document. Contributed to identifying features to be tested and not to be tested, and the test cases for features to be tested. Helped with UI placements, user flow, and reviewing of documentation.
- ❖ Raphael: Contributed with the identification of both functional and non-functional requirements. Constructed the use case diagrams using Draw.io, as well as the interaction diagram and class diagram, that contained the components of Form Buster, Form Buster API, pseudo-TRACKS, and pseudo-PAWS. Contributed to some other sections of the requirements document as well as the Design document, in which I helped proofread and organize.
- McNels: Investigated user authentication using AngularFire. Deployed demo authentication service using AngularFire locally. Investigated API construction using Swagger. Designed website mockups and prototype using Adobe XD. Contributed to identification of use cases, functional and non-functional requirements, drafting database designs and models, coming up with tasks for next milestone and proof-reading of documents.

#### Plan for the next Milestone

Task	Raphael	Grace	McNels
Implement pseudo-TRACKS system	33.3%	33.3%	33.3%
Implement pseudo-PAWS database	33.3%	33.3%	33.3%
Implement Form Buster database	33.3%	33.3%	33.3%

Implement home page for the different categories of users	33.3%	33.3%	33.3%
Implement student records page	33.3%	33.3%	33.3%
Implement forms catalog page	33.3%	33.3%	33.3%
Implement form submission pages	33.3%	33.3%	33.3%

## Discussion of each planned task for the next Milestone

- Implement pseudo-TRACKS system: In order to mimic a university's set up, we must build an authentication system similar to one that a university might use.
- Implement pseudo-PAWS database: In order to mimic a university's setup, we must build a database which would contain student, staff and faculty information that a university might hold.
- Implement Form Buster database: hold form data and username.
- Implement home page for the different categories of users: different user types have different dashboard views.
- Implement student records page: repository of forms filled by each student.
- Implement forms page: set of pages receiving information contained in the forms.
- Implement form submission pages: set of pages leading to forms submission.

### Sponsor feedback on each task for the current Milestone

- Investigate and select tools/frameworks/programming languages/databases to be used:
- Sample website and database using the tools/packages/... to determine if they are sufficient for the project:
- Resolve our technical challenges:
- Compare and select collaboration tools:
- Requirements Document:
- Design Document:
- ❖ Test Plan:

Sponsor Signature: Date:	Date:
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# **Sponsor Evaluation**

Sponsor: detach and return this page to Dr. Chan (HC 322) Score (0-10) for each member: circle a score (or circle two adjacent scores for .25 or

write down a real number between 0 and 10)

Grace	0	1	2	3	4	5	5.5	6	6.5	7	7.5	8	8.5	9	9.5	10
Raphael	0	1	2	3	4	5	5.5	6	6.5	7	7.5	8	8.5	9	9.5	10
McNels	0	1	2	3	4	5	5.5	6	6.5	7	7.5	8	8.5	9	9.5	10

Sponsor Signature:	Date:	