Texas Engineering World Health

First General Meeting

August 29, 2016

Welcome Back!!!

Whether you're new to UT, TEWH, or are a long-time member, we're excited to have you here.

What's TEWH All About?

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- Have a ton of fun working with each other, developing new skills, and making new friends!

Who Are We?

Reece Stevens (President)

- ▶ Major: Biomedical Engineering
- ▶ Year: Senior
- ▶ Fun fact: I love travelling, have a friend in Nepal who is a Himalayan sherpa, and intend on hiking the Annapurna mountain circuit one day.

Fatema Nagib (VP Internal)

- Major: Biomedical Engineering
- Year: Junior
- Fun fact: I learned how to figure skate during the summer!

Neel Kattumadam (VP Corporate Relations)

About me: stuff.

Alina Schroeder (VP University Relations)

About me: stuff.

Akash Patel (VP Finance)

About me: stuff.

Avery Coker (Webmaster)

- Major: Aerospace Engineering
- Year: Senior
- Fun fact: I'm secretly aspiring to be a self-subsistent, space cowboy specializing in the multi-planetary, aquatic-animal and agricultural trade.

Abhishek Pratapa (VP Design)

About me: stuff.

Why Developing World Healthcare?

What Does A Developing World Hospital Look Like?

- ▶ Inconsistent power grid
- ▶ Unreliable utilities (water, gas)
- ▶ Overcrowded public hospitals
- ▶ Underfunded public health services
- ▶ Lack of reliable medical equipment

Where Does Engineering Come In?

According to Engineering World Health [1]:

- 95% of medical equipment in these hospitals is donated
- 39% of equipment is broken on arrival
- 98% of equipment is nonfunctional after 5 years

Why do you think this is?

[1]Engineering World Health End-of-Conference Update, August 2014

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- ▶ User interface simplicity

- ▶ Cost

Previous TEWH Design Projects

- Audiometry Made Easy (2014)
  - Android app to measure hearing loss
- FreePulse Patient Monitor (2015)
  - Low-cost vitals monitoring machine
- Sensor Glasses (2016)
  - Navigation assistance to the blind without using a white cane
- Oxygen Concentrator (2016)
  - Low-cost and efficient oxygen concentrator that doesn't use zeolite
- Gluco-App (2016)
  - Android app for tracking blood glucose levels and promoting diabetes education and wellness

. . . So What About This Year???

A Broad Overview

- August - October
    - Brainstorming and case studies
    - TEWH Hackathon (Sept. 23-25)

- November - December
    - Form design teams and propose project
    - Begin building!!!

- January - May
    - Prototype and test!
    - Write the final design submission with data
    - Submit to EWH, NIH, and other competitions (May 30th)

A 3 day event where you get to learn cool engineering skills and prototype a design in a low-pressure, collaborative environment.

- ▶ There will be food!
- ▶ There will be fun!
- ▶ There will be resume-worthy design experience!

This will be our first hackathon, and we're super excited!!! More details to come.

Stay In Contact!

We will be using *Slack* for all org communications! So come up after the meeting to put your name and email down, and we'll get you an account so you can stay in the loop.

Doodle Poll for Meeting Times

Insert doodle poll link here.

Thanks, and See You Next Time!