## Fitness Wearable for Resistance and Strength Training

Status: Filled

Group Members: MSE Team: Ameer Ismail, Andriy Bortnik, Malcolm Grahame, Osama Al-

Humaidi, Yash Pachchigar

Business Team: Ben Hwang, Nathan Lobo

Sponsor(s):

Supervisor(s): Edward Park, PhD, PEng, Professor/Associate Dean, Mechatronic

Systems Engineering

## Project Description

Physical health and fitness are trends which are skyrocketing in popularity. As this market continues to grow, the number of individuals who are interested in strength and resistance training has grown proportionately. After several rounds of brainstorming sessions and detailed market research, the VaMo team has identified its initial customers as being weight training enthusiasts who enjoy adopting new technology. Our potential customers may have different goals; whether it be elevating motivation, optimizing their performance, or taking their training to the next level. With this proposed technology, our customers will be able to achieve their goals

3- Workout tracking for 3 major powerlifting movements: Squats, Deadlifts and Bench Presses Reps, Sets, Range of Motion, Heart Rate Intensity

Additions (pending time availability)

- 1- Workout Pre-Planning
- 2- Add tracking options for other workouts and exercises

## **Timeline Milestones**

End of Feb prototype to collect accelerometer and gyro data, 3-d movements with

heart rate tracking

End of April early prototype with tracking of 3 basic exercises

End of June App done

End of August prototype finished combined with app tracking