# **BYU** CIVIL & ENVIRONMENTAL ENGINEERING

#### **IRA A. FULTON COLLEGE**



Project Status Report: CEEn-2018CPST-007 Report Date: 4 March 2019

Team Members: Ryan Smart, Nicole Hastings, Hanna Opdahl, Daniel Fiso

**Project Title:** Woodland Hills Snow-Runoff Drainage Options

#### 1) Summary of technical/non-technical challenges encountered

This week we began our channel and culvert designs. We had some troubles deciding which Manning's n values to use. In addition to the afore mentioned, we also began thinking about the upcoming presentation and project report. We also needed to find a way to convert our measurements taken from our trip to woodland hills into useable data.

#### 2) Team approaches & resolutions to overcome challenges

In determining a Manning's n value, we reviewed the UDOT recommended values as well as the values provided in *Open-Channel Hydraulics* by Ven T. Chow. To convert the measurements, we created a local datum for each location.

## 3) Status of challenge resolutions & potential project impact

We have completed the culvert and channel designs. Determining a Manning's n value was crucial to this as is has a direct impact on the size of culverts required.

### 4) Project status & summary

At this point, we are beginning to write up our project and create our project poster. We have divided up the project into various sections and will begin writing it up this week. We will also clean up our GIS map.

Please enter # of hours spent on project this last week for each team member in the order listed above

3/19/2019 Member #1: 1.5 Member #2: 4.5 Member #1: 5.0 Member #2: 5.0