Capstone Project- Defining and Justifying a Problem

Driving Question: What information is needed to justify and define a problem that is worthy of a developing a solution? Will the problem be supported by academic research or market analysis?

Directions

- 1. Read the presentation titled "Choosing a Topic" with your group members.
- 2. With your group analyze the potential problem that you may want to solve. * Even if you are not sure what problem that you want to continue with go through the remaining steps in order to see if this problem is worthy of a solution

Potential Problem:

Firefighters and firefighter pilots are put in harm's way when fighting fires. In 2018, 64 firefighters died while fighting fires. This is way too many and a major problem. We want to look into creating a drone equipped with fire retardant dispensers, infrared cameras, and CO2 detectors. This firefighting drone would be capable of stopping fires and be able to replace humans to prevent the loss of more lives.

- 3. Read the presentation titled "Writing a Problem Statement"
- 4. Write a justification statement for your potential problem.

Problem Statement:

Wildfires have become a more common occurrence in the past years. During each event, there are many people who put their lives in danger, firefighters and firefighter pilots most of all. This doesn't have to be the way, especially now with the amount of technology around us. Instead we can use piloted drones equipped with the tools to view and fight fires, eliminating the risk of human lives. Using these firefighting drones would be the new way of preventing and fighting fires. Currently there is a terrible fire that has been sweeping over Australia which has killed 24 firefighters and over one million animals killed. These lives could have been put out of harm's way if drones were used instead.