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MCEN 4151-001

First Cloud Assignment

10/24/18

### Clouds of the Continental Divide

The purpose of this assignment was to capture interesting cloud formations around the state and try and classify them based on atmospheric data collected by weather balloons. I wanted to create a time lapse video because they have always fascinated me and I think they are a great way to show what is happening over a long period of time.

This time lapse was taken on September 2, 2018 near the town of Divide, Colorado. I spent labor day weekend at a friends cabin in the wilderness near Divide and was able to capture this video over a period of 3 hours while the sun was starting to go down and we were setting up the camp. I used a GoPro Hero 6 to capture the image. Using the built in time lapse feature I set it to take an image once every 60 seconds. The resolution was set to 1080p and white balance set to automatic. I then placed it on the railing of the tree house behind their cabin and let it capture images from 3pm to 6pm MST. The camera was point westward at approximately a 30 degree angle with the horizon.

The atmosphere was unstable on September 2<sup>nd</sup>, 2018 according to the weather balloon launched from Denver at 6pm. It reported a CAPE of 365 which is consistent with the types of clouds I saw and the storm system that was moving in throughout the weekend. I had rained lightly earlier in the day and the next morning and the temperature dropped significantly at night. I have determined that these are Stratocumulus clouds due to their altitude and general appearance. I did very minimal post processing because I really liked the way it turned out straight out of the camera.