## Fall 2016 GISC1391 Special Topics in GIS (UAV and GIS)

## Resources to get started

### Find your own resources - Search online for ‘ArcGIS UAV’

### 2014 article explaining the broad application of UAV in GIS.

http://www.esri.com/esri-news/arcuser/spring-2014/uav-and-gis-an-emerging-dynamic-duo

### Some common initial questions:

https://geonet.esri.com/thread/162697#comment-580358

1. What are the requirements for the UAV camera and GPS/INS system?
2. What metadata is required to process still UAV images? Does it have to be FMV military standard?
3. Is the new application going to be integrated with Mosaic Dataset/ Image Service/ ArcGIS Desktop and ArcGIS Runtime?
4. Can I do the following with the new UAV mapping application?
   1. Create orthorectiefied image?
   2. Measure a height?
   3. Other functionalities?
5. According to the video, the point cloud can be produced from images. What is the output of the process? Is it LAS dataset? Is there any automatic algorithms for change detection and feature detection/others?
6. What are the time frames for the app release?

### What’s new regarding developing rules and regulations over the use of UAV?

http://geospatial-solutions.com/category/technology/uasuav/

### How in-demand are UAVs in GIS?

http://mappingstats.maps.arcgis.com/apps/MapJournal/index.html?appid=a58b39a0b284418cb56e23f67f0fad6f#map

### UAV flight planning tool

http://www.arcgis.com/apps/Viewer/index.html?appid=021e985e6e2d42a694db71ce4ba54312#!

### DroneMapper solution

https://dronemapper.com/guidelines

### DroneMapper examples

https://dronemapper.com/blog

### More Examples, Uses and Case Studies

https://www.gislounge.com/using-unmanned-aerial-systems-uas-for-remote-sensing-of-archaeological-sites/