Final Exam

1. What is the entry level cost for a sUAS used in land surveying?
   a) $2,000
   b) $10,000
   c) $40,000
   d) $400,000

2. Regulations introduced in 2016 which govern the use of all sUAS for surveying are found on the FAA website under Title 14 CFR part
   a) 61
   b) 91
   c) 107
   d) 135

3. In addition to the standard FAA regulations for operating a sUAS it is necessary to obtain special written permission from which agency to legally fly a sUAS for surveying purposes within the airspace of class B, C, D, or E airspace as found on aeronautical charts.
   a) Local police
   b) Governor of that state
   c) FAA
   d) TSA

4. Lidar and _______ cameras are the two most commonly used sensor types which are used in land surveying.
   a) Panoramic
   b) Hyperspectral
   c) Electro Optical
   d) Multispectral

5. Combining GPS and GCPs with _____________ greatly improves the precision of data acquired by a sUAS.
   a) Satellite imagery
   b) RTK
   c) INS
   d) Ground survey data
6. Which type of sUAS is most commonly used today for land surveying due to their ease of use?
   a) Helicopter
   b) Multirotor
   c) Fixed Wing
   d) Gyrocopter

7. There is no limit to the number of lithium polymer batteries that can be carried onto a commercial airline if they are each less than ___________.
   a) 2” x 4” x 10”
   b) 2.2 lbs.
   c) 100Wh
   d) 5,000 mAh

8. Mission planning software used to create a land survey can automatically determine the flight path, position to take imagery, altitude and flight speed once the user defines the boundary of the area and the _____________
   a) Overlap
   b) Sidelap
   c) Ground Sampling Distance
   d) Heading

9. Mission planning for land surveying is more complicated for fixed wing compared to rotary wing aircraft due to ________________
   a) GCP placement
   b) Wind direction
   c) GPS drift
   d) RF interference

10. Which weather issue is least likely to cause issues with data collection from a sUAS for land surveying?
    a) Rain
    b) Clouds
    c) Fog
    d) High wind speed