

LIDAR Principals and Applications

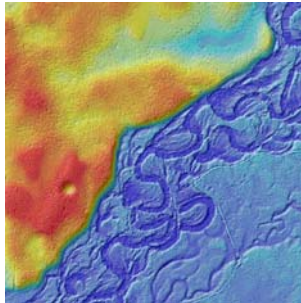
URISA Certified Workshop

Workshop Abstract:

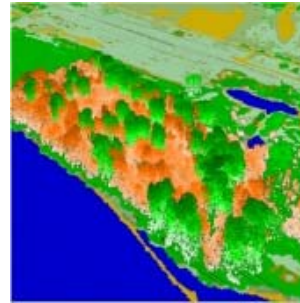
LIDAR (**L**ight **D**etection **A**nd **R**anging) has become widely accepted tool to generate accurate terrain models used in a variety of GIS applications. This workshop will provide an overview of this exciting technology. A history of this advanced mapping tool will be discussed as well as a review its current and future trends. The workshop will describe potential applications and will provide case studies of how this data has been used by agencies throughout the United States.



LiDAR/Bathymetry Case Study on the Yellowstone River, Montana



Multi-user and LiDAR Data Maintenance Case Study in Tallahassee Florida



Eagle Habitat Mitigation - Hyperspectral/LiDAR Data Fusion Case Study

Workshop Material Level:

Introductory

Workshop Agenda:

8:00 to 8:15	Attendee and Instructor Introductions
8:15 to 10:00	History, Concepts, Definitions
10:00 to 10:30	Morning Break
10:30 to 11:00	Live Data Demonstration
11:00 to 11:45	Acquisition, Filtering, Classification
11:45 to 12:00	Case Study One
12:00 to 1:00	Lunch
1:00 to 1:30	Photogrammetry and Breaklines
1:30 to 1:45	Extraction, Products and Formats
1:45 to 2:00	Case Study Two

2:00 to 2:30	Quality Control
2:30 to 3:00	Afternoon Break
3:00 to 3:30	Case Studies Three and Four
3:30 to 4:00	Accuracy Standards
4:00 to 4:15	Present and Future Applications
4:15 to 4:30	Industry Trends
4:30 to 4:50	Keys to Successful Projects, Specifications and Cost
4:50 to 5:00	Wrap-up, Questions, Evaluations

Instructors:

Brian Raber, CMS, GLS, GISP



Brian is a Certified Mapping Scientist – GIS with ASPRS and the Vice President of the GeoSpatial Solutions Business Unit for Merrick & Company. He has been with Merrick for over 19 years and has over 29 years of experience in the GIS, cartography and the mapping sciences.

Brian has a M.S. degree in Geography from the University of Idaho (1984), and a B.A. degree with a Geography and Cartography emphasis from West Virginia University (1980). Brian has been a member of URISA since 1987 and received his GISP certification in 2006.

Doug Jacoby, CMS, GISP



Doug is a member of URISA and received his GISP certification in 2007. He is also a representative of the GISCI certification peer review committee.

Doug is also a Certified Mapping Scientist – GIS with ASPRS and the Manager of Projects for the GeoSpatial Solutions Business Unit for Merrick & Company in Aurora, Colorado. He has been with Merrick for over 25 years and has extensive of experience in managing photogrammetry and LIDAR projects.