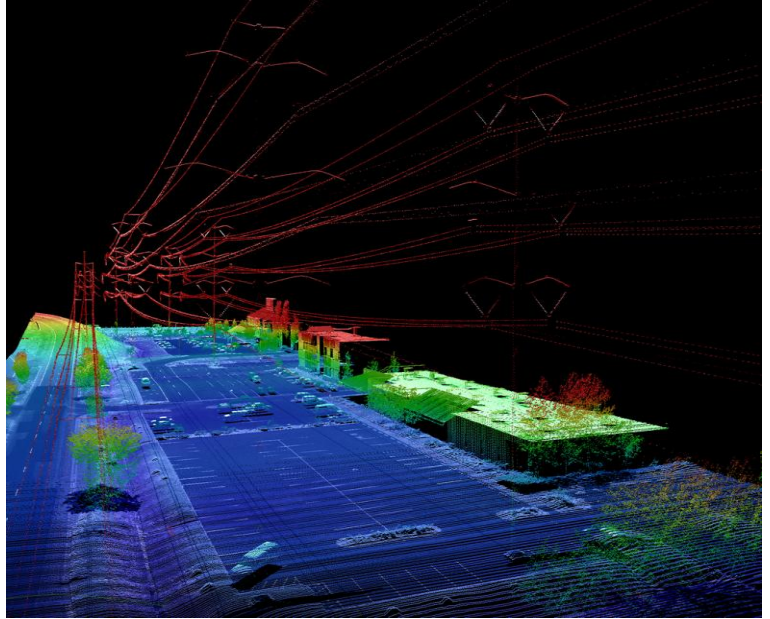


## *The Role of Geospatial Data in Building America's Infrastructure*

Infrastructure is critical to our nation's prosperity. President Trump and Congress are planning a major infrastructure program of an estimated \$1 trillion for roads, bridges, airports, and other types of infrastructure. All of these projects require quality and accurate surveying and mapping data, products and services.

From the the beginning of the First Congress that authorized the first Federal lighthouses, to the Transcontinental Railroad, to the Panama Canal, to the Interstate Highway System, to the Nation's airports, we've ensured the American people and our economy are connected through infrastructure. A strong infrastructure means a strong America – an America that competes globally, supports local and regional economic development, and creates jobs. Infrastructure—the physical framework of transportation, energy, communications, water supply, and other systems—and construction management—the overall planning, coordination, and control of a project from beginning to end—are critical to the Nation's prosperity.

Geospatial data and applications provide valuable productivity, safety, and cost-saving benefits to infrastructure improvement projects and associated construction management.



Geospatial data applications in infrastructure investments and construction management include: boundary, land acquisition, route, grade, line-of-sight, and utility surveys and corridor mapping; terrain and other obstruction identification for aviation; dam, levee, and coastal-structure failure modeling and mitigation; hydraulic and hydrologic modeling; evaluations of geologic, coastal, and other natural hazards, and geotechnical evaluations; permit application and construction plan development and evaluation; drainage issues and cut-and-fill estimate requirements; vegetation, topographic, and geomorphologic feature analysis; as-built model development; preliminary engineering, estimate development, and quantity estimation activities; and base-map and elevation model creation.

For business uses related to infrastructure improvements, the value of geospatial data is estimated to be in the billions of dollars. For example, aerial photography is .011% of a project cost, but leverages a downstream economic effect multiplier of 9074. This also results in thousands of American jobs. For more information such data, particularly 3D elevation (LiDAR) data, visit the e-book at [www.3dep4america.com](http://www.3dep4america.com).

In recognizing the importance of accurate geospatial data, Congress should include legislative language calling for surveying, mapping and geospatial data for the planning, design, construction, operation, and maintenance for all related infrastructure projects. Data needs include: Elevation; Boundary; Topo; Planimetrics; As-Built; Asset Management; and others. MAPPs and NSPS respectfully urge sponsorship of provisions enabling the utilization of surveying and mapping technologies and applications in infrastructure legislation in the 115th Congress.

### **ACTION REQUESTED:**

**MAPPs and NSPS respectfully urge Congress to include a provision enabling for improved utilization of surveying and mapping technologies and applications in infrastructure legislation. For more information, contact John Byrd, MAPPs and NSPS Government Affairs Manager, at [jbyrd@jmpa.us](mailto:jbyrd@jmpa.us) or (703) 787-6665.**