Power Tools

New technology helps survey firm expand its capabilities

Though a relatively new addition to GdB Geospatial's corporate structure, the Rochester, N.Y. office has made an impact providing digital modeling and support for countless road, building and airport projects. It has done so through the efforts of a steadily growing, committed staff and an embrace of GNSS-based technology to generate valuable data. That benefit, by nature of its speed, accuracy and ability to improve onsite safety, has struck a chord with its clients.

Not long after setting up shop, GdB Rochester quickly began attracting the attention of slipform paving customers, largely through their use of a Topcon RD-M mobile laser scanner.

Company
GdB Geospatial, a SAM Company
Rochester, New York

Topcon Solutions
RD-M Road Scanner, component of SmoothRide system, GNSS receivers (Topcon, Sokkia), Total stations (Topcon, Sokkia), FC field computer tablets, Software

Topcon Dealer
Admar Positioning Solutions
Rochester, New York

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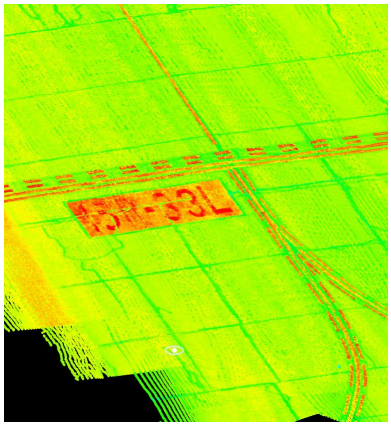

"That helped us gain a reputation within that market as a valued tech partner," said Justin Roloson, GdB's machine control manager. "We were soon finding that the data we generated could be a valuable asset for our growth and our clients' success. In fact, in the last couple years, the slipform paving market has been one of the largest growing modeling markets we serve."

The RD-M allows for fast, safe, highly accurate surface scanning in advance of applications such as milling and paving. A component of the Topcon SmoothRide solution, the instrument helped quickly established GdB as the go-to source in a range of projects in which closures are an issue, in particular, highways and airports.

"A closure — whether it be a lane of road, an entire highway, or an airport runway — can severely impact the cost of any job," said Dave Zuber, a project surveyor at GdB. "The RD-M1 virtually eliminates that headache by taking a 3D laser scan of the desired surface using a vehicle moving at traffic speeds. Manual survey is eliminated — along with the need for closures."

By way of example, Zuber cited a specific recent highway project. Working as a subcontractor, they were brought in to scan six miles of northbound and southbound Interstate 295 in New Jersey to prove the severity of the road condition at the time.

"The project involved three lanes plus in each direction — all told, about 36 lane miles of scanning," he said. "We did it without the need to shut the highway down for traditional survey to take place. The DOT did have a rolling closure in place to avoid the risk of a distracted driver hitting our truck from behind, but we were able to maintain a 55 mph speed throughout each scanning session. We completed the entire project in six hours and had some outstanding data to present to the customer. That's the power of the RD-M in a nutshell."

At the core of what GdB brings to the table, however, is more than just providing data. It's about solving problems and providing workable solutions. And that, said Zuber, is where the RD-M gives them a leg up on other survey firms. "We were hired to do a traditional job for a nearby town on which the contractor had specific parameters — and a design concern," he said. "Looking at a flat crown from the original paving that needed to be addressed, they asked us if a correction was possible. The RD-M allowed us to quickly gather the data, look at the possibilities, and offer a solution — before the contractor had to commit to any actual milling."

Roloson said that same project immediately comes to mind because even he was apprehensive as it unfolded. "Being a bit of an old school guy, I remember asking Dave if we could really do what they needed, and him saying: "Relax, we've got

this.' It was very cool to see that changing a cross-slope is as simple as typing it in, hitting 'auto-update' and seeing the SmoothRide solution do the rest."

Zuber added that scanning also helped keep material costs down. "That project was upwards of three miles long and I don't believe the contractor needed more than 100 tons of material for it — profile milling made a huge difference."

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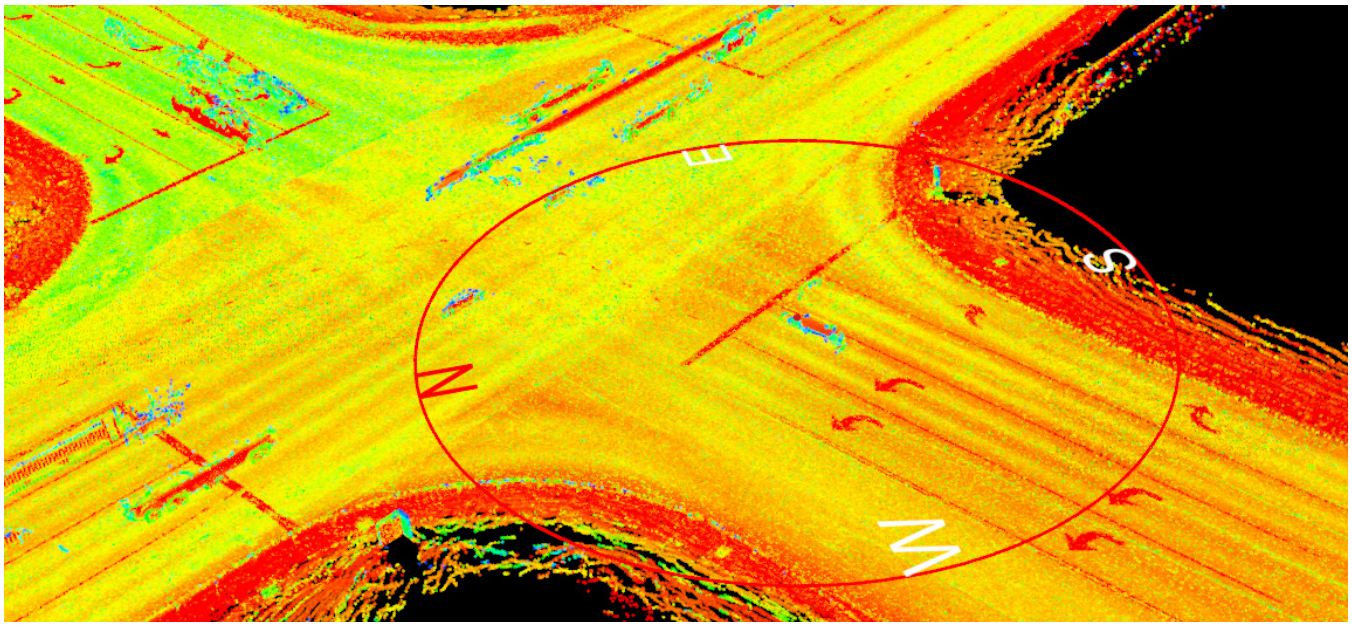

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