



By Joel Leininger, LS

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Good Data, No Fences

In his recent commentary “Good Data Make Good Fences,” that appeared in *Forbes* online, Peter Huber argues that technology has progressed to the point of being able to trivialize finding property boundaries and other constraints on the use of property. Boundary locations have been hampered by paper records, he argues, but paper records can now be supplanted by digital information systems, eliminating most of the drudgery associated with record searches. With that drudgery removed, the costs associated with getting official clearance for a whole host of land-related permits will plummet.

He’s correct—to a point. Paper systems have constricted our ability to quickly identify and act upon evidence essential to the task. Further, our results have been paper-based more often than not, restricting the speed of our successors in a similar manner.

But his argument displays a basic misunderstanding of how one goes about figuring out where boundaries lie. The culprits resulting in boundary uncertainty are well known to retracement surveyors, and, to a lesser extent, others in the real estate community. Unfortunately, beyond those two groups, that knowledge is all but non-existent, as Mr. Huber demonstrated.

Waypoints

A couple of issues ago we discussed a “waypoint description,” likely written by an amateur based on data obtained with his hand-held GPS unit. The fundamental fault with the act lay not in the tool, although easy access to the technology abetted the crime, but in the failure to understand the existing, intangible parcel

fabric. This fabric, created and patched and used for a hundred years or more, is not susceptible to precise locational identification without the research and analysis that retracement surveyors routinely conduct. It is not merely a matter of getting one’s hands on the right piece of paper; it is the correct interpretation of what that paper means in the context of all the papers before it, and in the context of how former surveyors and courts interpreted those papers.

Mr. Huber’s assumptions about that parcel fabric must be identical to the

Or could it be that judgment and evidence evaluation requires more than complex mathematical algorithms after all? Boundary retracement, since it is governed by rules from those same appellate cases, requires identical analysis.

The Wow Factor

To me, the odd part of this debate is that technology-savvy surveyors now find themselves arguing that the “old” methods have more merit than the new idea. Our discarded technology, for instance, fetches handsome prices at

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waypoint description author; in essence, they confuse boundary retracement for a mechanical process. (Mechanical processes being prime candidates for digital automation.)

A similar argument would be that since most of the appellate court cases in the country have been converted to digital form by West Publishing Company and others, trials can now be automated. After all, algorithms assimilating the entire body of applicable case law could not be more difficult to develop than, say, mapping the human genome, which has been successfully completed. Can it be only turf-protection by trial lawyers and judges preventing this innovation?

antiquarian auctions. Vernier compasses, anyone? So, this is not about resistance to new things in general.

I look forward to the day, for instance, when the *entire body of work* (160 years’ worth) generated and archived by my firm is available to me as I stand on-site trying to decide whether I am looking at the same evidence as my predecessors. That day is not far off, given the advances in hardware and software. Our mountains of paper-based archives are quickly being replaced by hard drive arrays. In most cases, call me about a particular area and I not only can tell you what we have there, but I can look at the

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entire file as well, without leaving my seat. But the game changer will be my taking it with me on-site. Digital records are a good thing.

Enter the Torrens

Whether he realizes it or not, what Huber really advocates is a digital Torrens, or land registration system. Torrens systems have been in existence since their invention in 1858 as an alternative to complex and cumbersome land titling systems and were modeled after ships' registration systems. The idea is that after an initial investigation, the government guarantees title to the land, including its boundaries. What's not to like?

Torrens systems have come and gone over the years, and perhaps the most prominent of the survivors in this country is the Massachusetts Land Court. Some statistics about that court are interesting. Since its creation in 1898, only about 20 to 30 percent of all parcels in the state have been registered. Given the many apparent advantages in having one's parcel registered, we must conclude that there are also significant obstacles to one's doing so. I'll bet the biggest one is cost. Indeed, the manual of instructions for the preparation of Land Court surveys runs 46 pages.

And, tellingly, it provides instructions in the event that the record for previously surveyed (and registered) land disagrees with current surveys. This last will not surprise surveyors at all, but must have been a bubble-burster for those non-surveyors assuming that registration would eliminate boundary uncertainty.

It is important to note that even after the acceptable preparation of survey and title documents, the Court holds a hearing where interested parties are afforded an opportunity to plead their cases. No wonder the process is expensive. But the end result looks like something akin to what Huber says we need digitally.

Of course, I don't pretend to be an expert on the Massachusetts Land Court or its procedures. I merely use it as an example of what land registration entails. Interests in land are a complex business, stretching back hundreds of years on the East Coast, and surveys, no matter if by licensed surveyors or by computer geeks with hand-held GPS units, must take that complexity into account.

Either that, or we can throw out private property holdings and start afresh. Clean slate, Mr. Huber. Is it worth it? *A*