

Authoritative Address Data

The 9-1-1 Connection

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Why “Authoritative” Data?

- “Authoritative” implies...
 - *Backed by an established/accepted authority*
 - *Supported by clear evidence*
 - *Derived from deep knowledge*
 - *Reliable and convincing*
 - *Worthy of users’ trust*
- = Worthy of government investment**

Requirements for Address Data

- Many users of address data, with a broad spectrum of requirements
 - *Geocoding success rates*
 - *Spatial quality of address locations*
 - *Tolerance for errors*
 - Building to highest level requirements will support all lower requirements
- = Do it right, do it once**

Why 9-1-1?

- Urgent, life-or-death requirements for address data to be:
 - ✓ *Complete*
 - ✓ *Accurate*
 - ✓ *Up-to-date*
 - ✓ *Verified against official records*
 - Minimal degrees of separation from authoritative sources
- = Ideal partner to build *Authoritative* data**

Characteristics of the 9-1-1 Community

- Historically...
 - “*Cylinders of excellence*” (stovepipe systems)
 - Turn-key solutions w/ preloaded GIS data
 - CAD software often doesn’t integrate well with other GIS systems or data
 - Reliance on contractors (rather than in-house resources) to maintain systems and data
- = Low incidences of data partnerships**

Characteristics of the 9-1-1 Community

- Strong motivation to “get it right”
 - Strong national and state associations to:
 - *Promote standards*
 - *Share best practices*
 - *Educate/train 9-1-1 professionals*
 - Access to dedicated funding sources
 - Strong local knowledge
- = Excellent candidate for partnering!**

The Next Big Thing in 9-1-1

- Next Generation 911...
 - IP (Internet) –based
 - Fewer calls originating from land-line phones
 - Higher location accuracy of wireless calls
 - Phase out of traditional lookup tables
 - GIS-based lookup to match call location with correct emergency service

= Need more/better GIS data

9-1-1 GIS Standards

- FGDC Address Data Standard
 - *NENA adopting with minor changes*
- GIS Data Model in development
- Weak GIS Data Collection & Maintenance Standards
 - *Lack guidance on where/how many points*
- NENA very willing to engage partners



9-1-1 GIS Data Issues

(observed in NY)

- Huge interest in statewide address data
- Telco data limitations:
 - *Often expensive to license from the telco*
 - *Extent limited to PSAP jurisdiction*
 - *Difficult to pass data to neighboring PSAP*
- Strong understanding that Next-Gen 911 will require different methods, systems, and data

= Primed to partner with us!

What New York State is Doing

- Collaborating with 9-1-1 Coordinators to:
 - *Develop address point mapping standards*
 - *Conduct pilot projects to test standards and create data maintenance plan*
 - *Seek NENA standards approval*
- Using NTIA grant as seed money
- Propose standard to State 9-1-1 Board for adoption and eligibility for funding
- PSAPs use 9-1-1 funds to produce the data

Progress & Future Benefits

- Still early in the process, but excellent cooperation so far with 9-1-1 community
- Address point data will...
 - *Feed 9-1-1 dispatch*
 - *Be publicly available for widespread uses*
 - *Support high-quality geocoding*
- Which will lead to...
 - *Building an enterprise geocoding web service*
 - *Others migrating their address databases to the FGDC standard*

Summary – Could this scale up for a national address point effort?

- Establish clear standards for address points (acceptance criteria for **outcomes**, not processes)
- National funding stream (contracts) for state coordination, like NTIA has done for broadband mapping
- Grantees establish working relationships with local authorities (most likely 9-1-1) to determine best **process** to build locally
- Leverage add'l funds to cover direct costs of creating the data
 - Census
 - NG911
 - Homeland security
 - Anything else
- Feds coordinate national roll-up