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NG911 Outline

1. 9-1-1 Game changers
2. How 9-1-1 location lookup works
3. New standards
4. Address workgroup
5. Address point examples
6. State-wide address point build
7. What you can expect from us

9-1-1 Game Changers

- More than voice (audio)
 - Text
 - Email
 - Image
 - Video
- Systems are IP based (think Internet)
- IP Security
- Phones move
- Geographic Information System (GIS)
 - at the core



Phone Number

Automatic Number Identification (ANI)



Add Street Address

Automatic Location Identifier (ALI)



Add Emergency Service Zone

Master Street Address Guide (MSAG)



Look up Police, Fire, EMS

Emergency Service Provider
Lookup Table

Current Land Line Tabular look-up



Phone Number
or email, text, video
and **X, Y**
(no Address)

Next Generation ~~Mobile Phone~~ Device



Add Street Address
NYS Address Point File

OCS



Point in Polygon Police, Fire, EMS
GIS Service Zones

FCC – Location of Mobile Calls

- Issued in 2007 – by Sep 11, 2012
 - Network-base technology (no GPS)
 - +- 300 meters 95% of calls
 - +- 100 meter 67% of calls
 - GPS base technology
 - +- 100 meters 95% of calls
 - +- 50 meter 67% of calls
- Issued in 2010
 - Accuracy percentages within PSAP (call center) areas- (think County)
 - 15% of PSAP area can be exempted

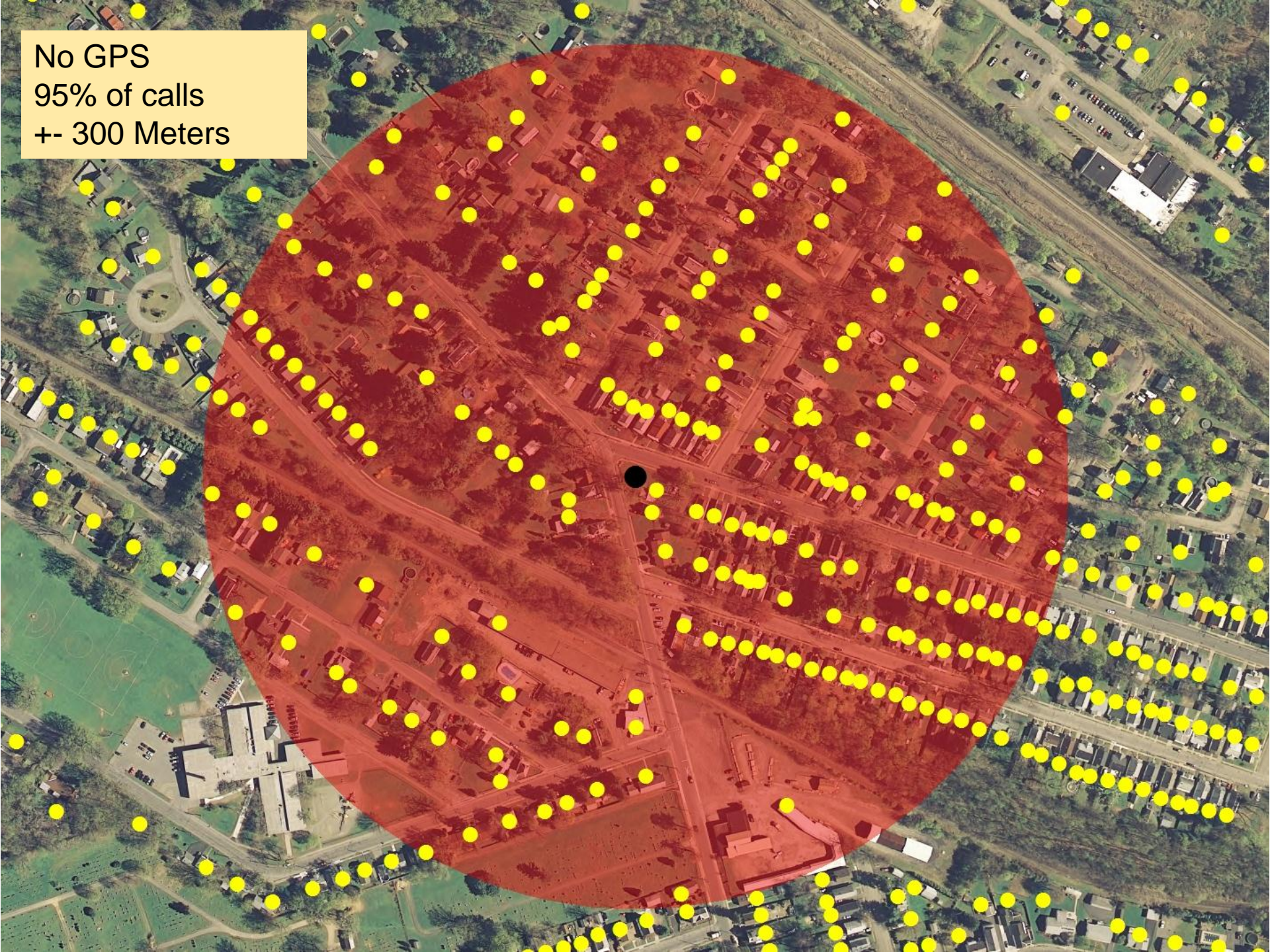




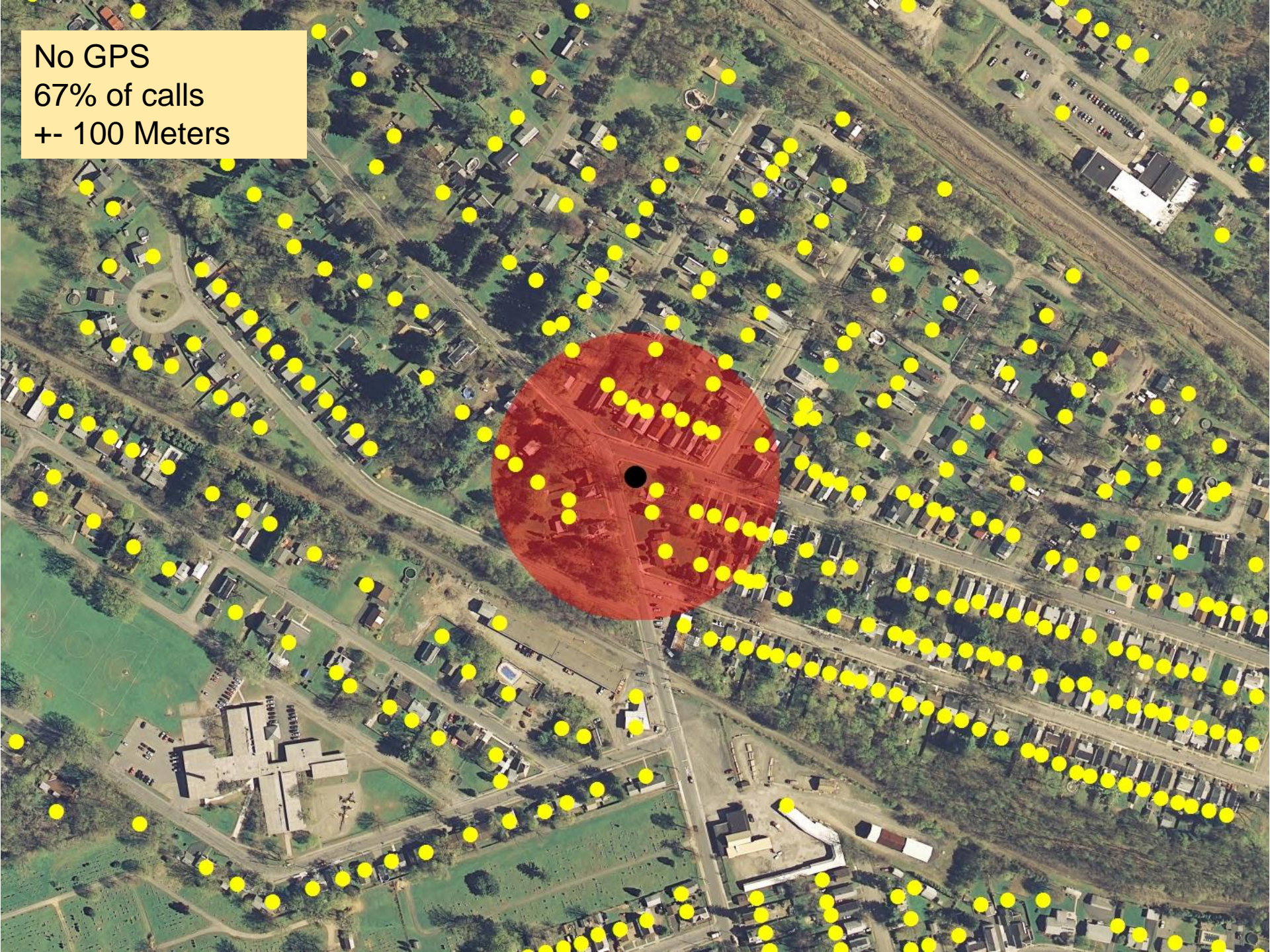


Call Location

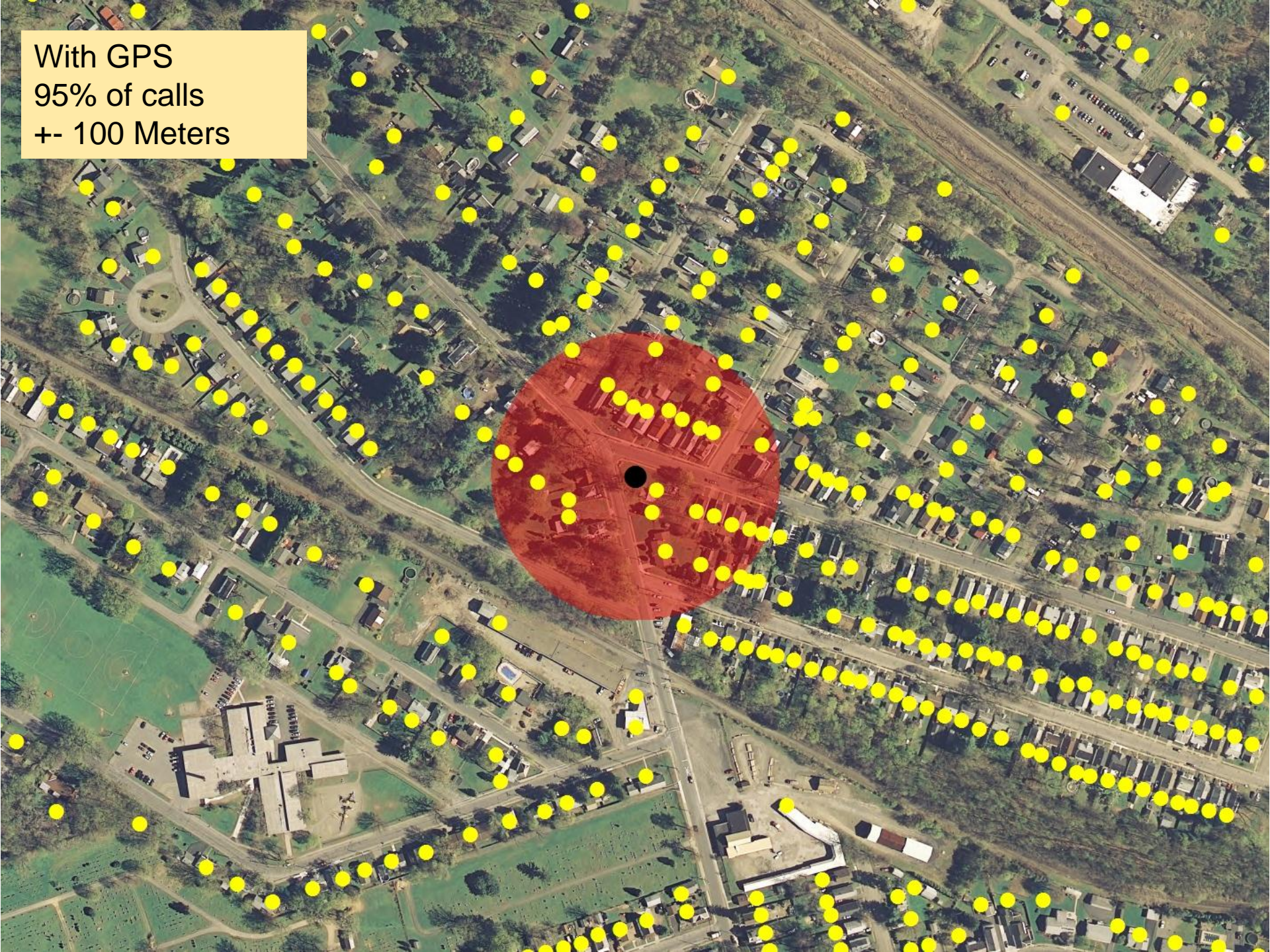
No GPS
95% of calls
+- 300 Meters



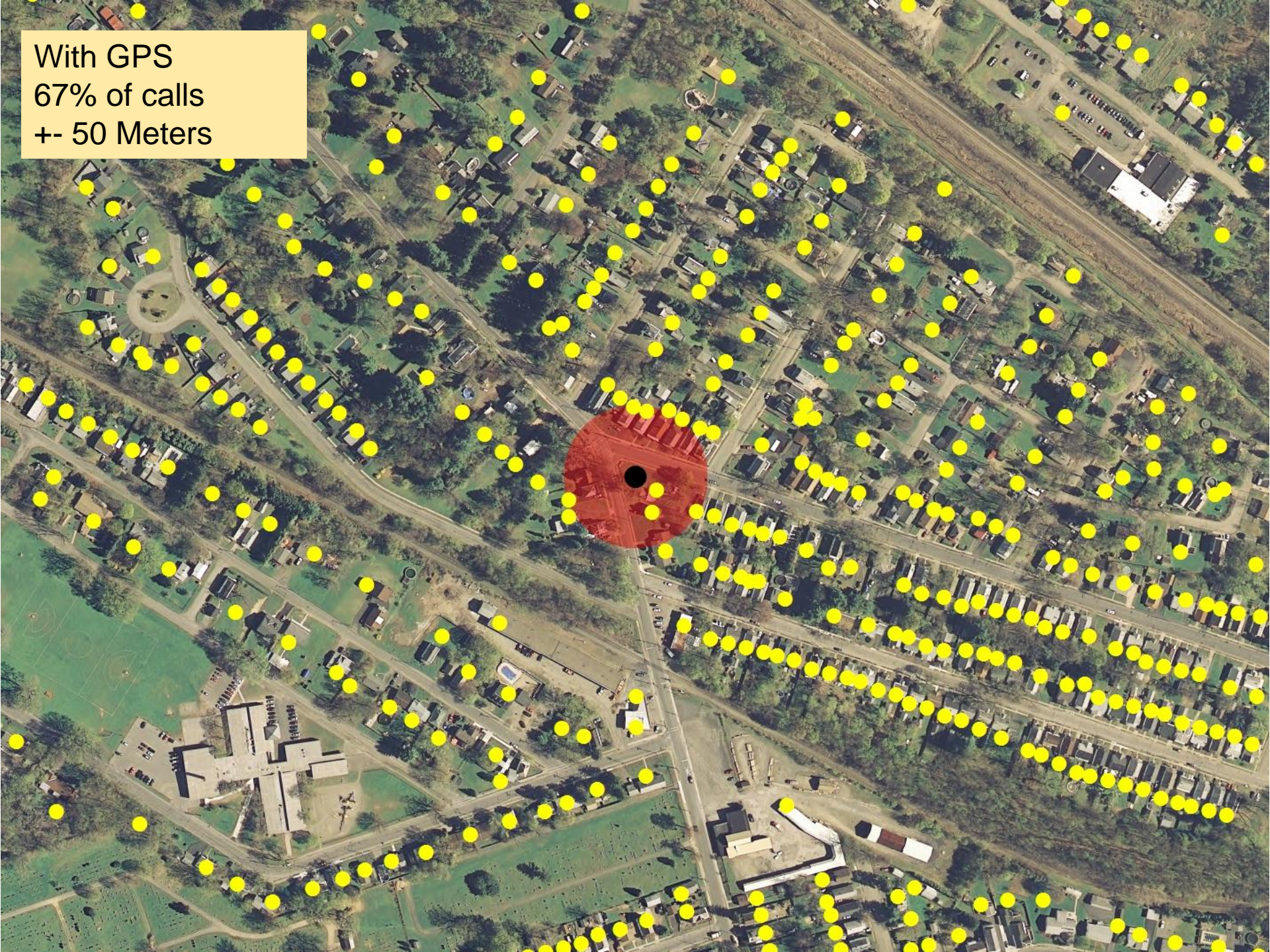
No GPS
67% of calls
+- 100 Meters



With GPS
95% of calls
+- 100 Meters



With GPS
67% of calls
+/- 50 Meters



Federal Geographic Data Committee (FGDC) Address Data Standard

- *United States Thoroughfare, Landmark and Postal Address Data Standard*
- FGDC endorsed on February 9, 2011
- Jointly developed by URISA & NENA
- Available at:

www.fgdc.gov/standards/projects

or

www.urisa.org

Parsing Examples

105 Old North Main Street

	<u>FGDC</u>	<u>NENA</u>
AddressNumberPrefix		
AddressNumber	105	105
AddressNumberSuffix		
PreModifier	Old	Old
PreDirectional	North	N
PreType		
SeparatorElement		
StreetName	Main	Main
PostType	Street	St
PostDirectional		
PostModifier		

Workgroup

Create specifications for a statewide authoritative address point database to support next-generation 9-1-1 and other purposes









600'

Sub-address Representation

- 123 Main Street, **Apartment 101**
- U.S. Dept. of Agriculture Building, **Floor 7, Room 324**
- 800 West Mountain Road, **Building 6, Suite 450**
- Suburban Office Park, **Building 12, Mezzanine, Suite 200**
- Five-Star Hotel, **East Tower, Penthouse**
- General Hospital, **Cardiac Wing, Room 224**
- Metro Airport, **Terminal A, Gate C27**
- Batavia Downs, **Barn 12**



Duplex
10A Limerick Ave
& 10B Limerick Ave



**Historic Home Split
into Apartments
56 Union Ave
& 56-Side, 56-Rear**



Apartment Building
64 Robert Dr
Apt 1, Apt 2, Apt 3,
etc.



Identify

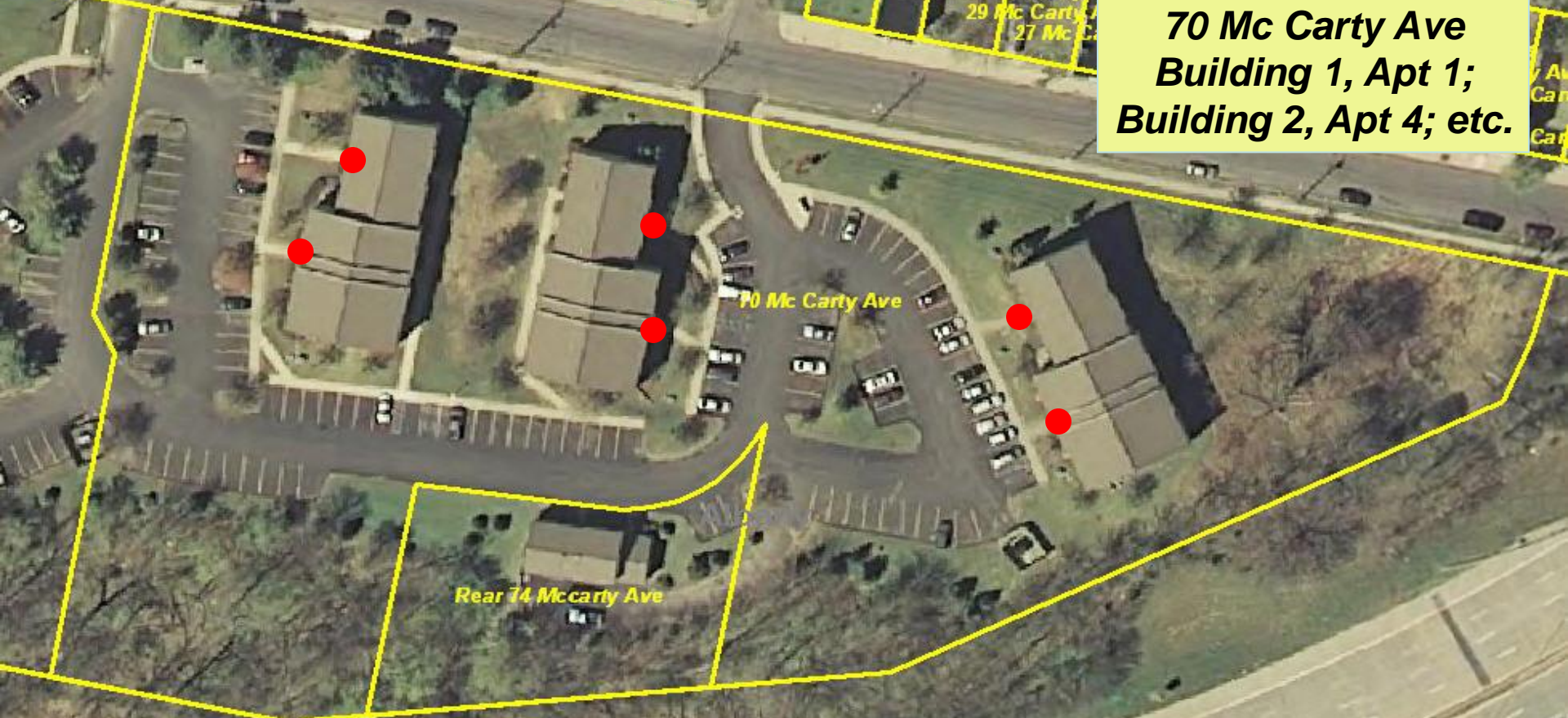
Identify from: **NYSAddressPoints**

- [-] NiagaraAddrPoints
 - [-] 64 Robert Dr
 - [-] SubUnitAddresses\$
 - Apartment 1
 - Apartment 2
 - Apartment 3
 - Apartment 4
 - Apartment 5
 - Apartment 6

61 Mc Carty Ave 57 Mc Carty Ave 51 Mc Carty Ave
49 Mc Carty Ave 47 Mc Carty Ave 45 Mc Carty Ave

39 Mc Carty Ave 37 Mc Carty Ave
35 Mc Carty Ave 33 Mc Carty Ave
29 Mc Carty Ave 27 Mc Carty Ave

**Apartment Building
Complex
70 Mc Carty Ave
Building 1, Apt 1;
Building 2, Apt 4; etc.**



70 Mc Carty Ave

Rear 74 Mccarty Ave

603 S Pearl St



Trailer Park
2941 Amsterdam Rd,
Lot 1, Lot2, Lot 3, etc.

1 ALFLO CIR

3 ALFLO CIR

5 ALFLO CIR

2941 AMSTERDAM RD

2939 AMSTERDAM RD

2901 AMSTERDAM RD

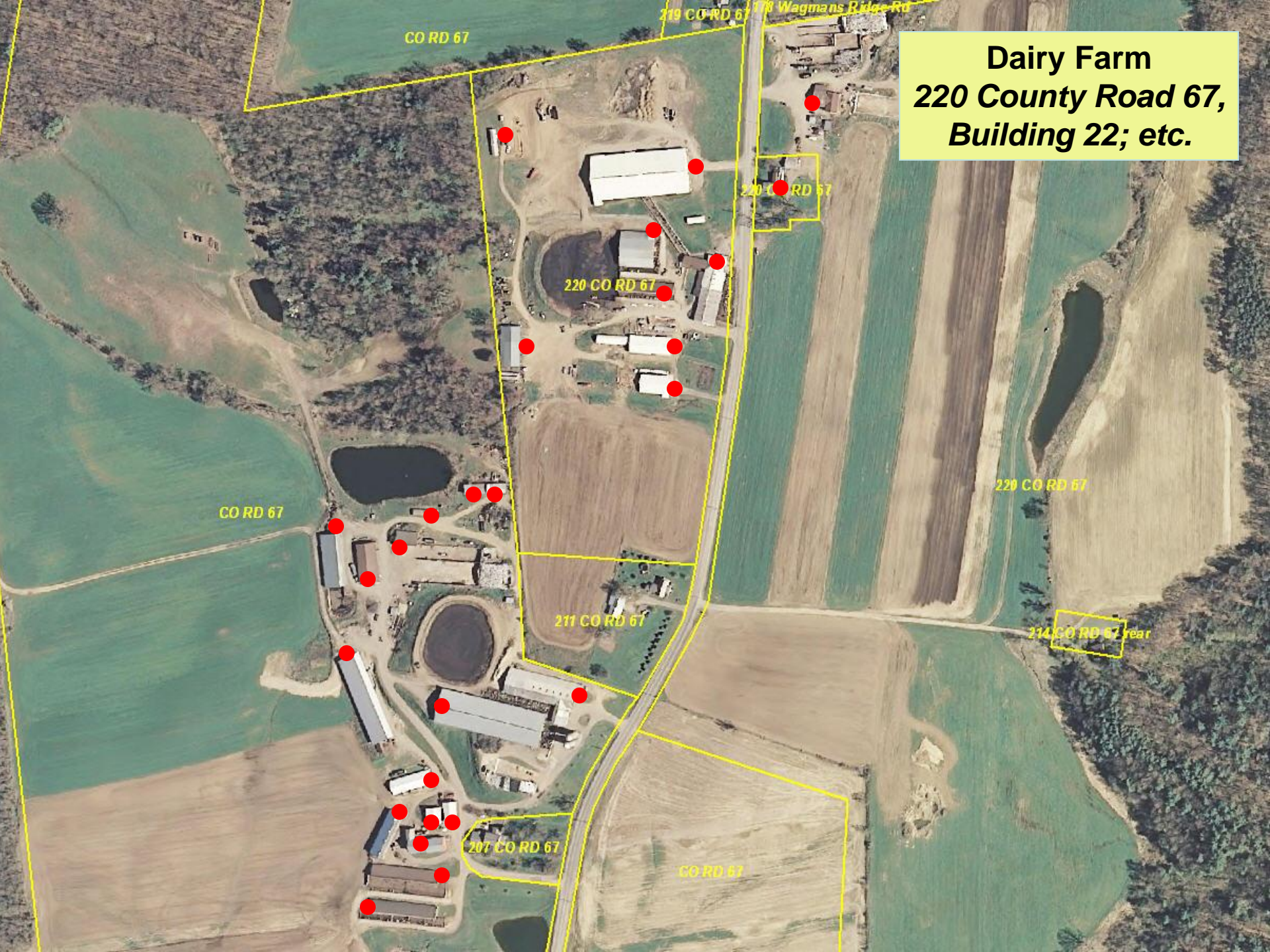
AMSTERDAM RD

BOX_225 AMSTERDAM RD

AMSTERDAM RD

AMSTERDAM RD

VAN BUREN LN



Dairy Farm
220 County Road 67,
Building 22; etc.

CO RD 67

219 CO RD 67 Wagmans Ridge Rd

220 CO RD 67

220 CO RD 67

220 CO RD 67

CO RD 67

211 CO RD 67

214 CO RD 67 year

207 CO RD 67

CO RD 67



**Office Building
90 State Street,
Floor 3, Suite 6;
Floor 1, Suite 1; etc.**

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MARKET

90 STATE STREET

State-wide Address Point Build

- OCS has addresses in every county
- OCS will continue to host, maintain and serve address points
- 9-1-1 authorities
 - Provide better address points if they exist
 - Add missing points
 - Refine locations
 - Establish sub-addresses
 - Feed changes

What you can expect from us

GIS

- Mapping expertise
 - GIS Standards
 - Geocoding
- GIS coordination
 - Data Sharing Cooperative
 - GIS Clearinghouse
 - GIS Help Desk
- Orthoimagery
- CIRIS
- Web services
- Streets & Address Point data
- Help maintaining address points

What you can expect from us

Cyber Security

- Advisories
- White papers & webcasts
- Templates for policies & procedures
- Technical assistance
- Web defacement monitoring
- Managed security services (for a fee)
- Training
 - End user training video
 - Business Manager training video
 - Computer based training modules

Funding

- GIS data development
 - Local share priority project
- 9-1-1 funding
- Census – interested in putting resources into a pilot