

NY State Geospatial Advisory Council
Draft Minutes for June 4, 2019 Meeting

The New York Field Office of The Nature Conservancy, 195 New Karner Road, Albany, NY
(upstairs from the Albany Pine Bush Discovery Center)

Mission: Advise the State on effective use of geospatial technology resulting in tangible benefits to NYS.

In person: Ross Baldwin, Christina Croll, Emily Fogarty, Eric Herman, Todd Nelson, Julie O'Brien, Christopher O'Connor, Chris Rado, Richard Reichert, David Richardson, Heather Weller, Frank Winters

Via phone: Ana Hiraldo-Gomez, Matthew Owen, Lindi Quackenbush

Absent: Ross Baldwin, Kate Buss¹, Mickey Dietrich, David Jorgensen, Randy Rath, Michael Ross

Minutes: Christopher O'Connor

10:30 Welcome / Agenda Review / Approval of Minutes (Richardson)

- Introductions
 - Council members shared current areas of interest including hydrologic modeling, hydrography, emergency response, drones, ArcGIS Pro, cloud computing, containerization, Amazon web services, analytics, and project management.
 - Richardson provided a brief history on the Albany Pinebush Commission and a nice overview of the local geography.
- Approve previous meeting minutes
 - Suggested edits were discussed and agreed to.
 - Herman motioned to accept the minutes, Nelson seconded, everyone unanimously approved.
- Members agreed to the date change for the next quarterly council meeting, now to be held on September 10, 2019 at the New York Field Office of The Nature Conservancy.

10:45 Reports

- State Agency Advisory Group report (Herman)
 - The last meeting was May 7, with approximately 20 attendees – refer to Mr. Herman's excellent, detailed minutes² available on the NYS GIS Clearinghouse.
 - Next meeting is September 17.
- NYSGISA report (Reichert)
 - 2019 NYGeoCon will be held September 23-25, 2019 at the Marriott Syracuse, Downtown, Syracuse, NY. Conference planning (agenda/schedule) are coming together.
 - Major focus is on extending outreach and education opportunities.
 - NYSGISA is considering a possible membership structure change for students.
 - NYSGISA is trying to extend opportunities with regional groups.

¹ Kate Buss will be stepping down; the position will remain unfilled until the next round of nominations.

² https://gis.ny.gov/coordinationprogram/workgroups/wg_7/meetings/2019-05-meeting-minutes.pdf

- Federal report (O'Brien)
 - There's been no change on LiDAR data collection activities since F. Winter's last report out.
 - FEMA Flood Insurance Studies
 - *Discovery Phase*
 - North Country Watersheds (meetings) not clear on counties involved at this point
 - *Data Development Phase*
 - Lake Champlain Watershed (Clinton County)
 - Coastal Surge Study (Bronx, Kings) – previously challenged so they're re-doing the studies
 - New York City All CW
 - Seneca Watershed (County: Ontario, Tomkins)
 - Lakes Ontario Watersheds (County: Orleans)
 - Lake Champlain Watershed (County: Washington)
 - Westchester County Coastal
 - *LAMP Discovery*
 - Allegany County
 - Cattaraugus County
 - Rensselaer County Hoosick Falls
 - *LAMP Development*
 - Otsego County Mill Race
 - *LFD (Letter of Final Determination)*
 - Erie County Revised Preliminary
 - *PPP Pre-Appeal*: Erie County Coastal PMR Post Preliminary Processing Pre-Appeal
 - *PPP Post-Appeal*: Niagara County Coastal
 - US Census Report
 - Data.census.gov: Census is moving over to a new data dissemination portal called data.census.gov - this portal will replace the previous American Factfinder (AFF) portal, and will be used going forward to release all Census data. The next big data release will be "population estimates" in July. American Factfinder will run concurrently with data.census.gov for a while, but it is assumed that AFF will eventually be sunset. The Data Dissemination Specialist (David Kaaiker) will continue to give free workshops and instruction around New York State on how to use these portals.
 - New Construction Program: The New Construction Program provides tribal, state, and local governments an opportunity to update the U.S. Census Bureau's residential address list with living quarters (including group quarters and transitory locations) for which construction is in progress during or after March 1, 2018 and completion (closed to the elements) expected by Census Day, April 1, 2020. The deadline for municipal governments to sign up for the New Construction Program is June 14th.

- GAC Open Discussion on Census
 - There needs to be greater awareness that GIS is a core component of the census work.
 - NYC has a long history of using GIS in support of the census, and the Governor’s Census Team is very collaborative and high functioning.
 - There is a shift to classifying people who live together as groups as opposed to just the traditional nuclear family.
 - Census undercounting has a negative impact on communities (ex. when assessing and assisting vulnerable population during a disaster - FEMA relies on Census data heavily). Census data is also often tied to Federal programs and grants.

11:15 GIO/GPO/GCO Report (Winters)

- Local Update of Census Addresses (LUCA) Operation Update
 - Winters was invited to participate in discussions held in Sullivan County (2nd lowest NYS county in census returns). He provided testimony for what the state did for LUCA.
 - Winters is looking for ideas on how the state’s economy can be boosted with tax parcel data; potentially make a business case for supporting GIS data development and maintenance.
- GIS Program Office (GPO) Civil Boundaries Publishing
 - Civil boundaries were updated and will be published in early July, followed by an updated NYS Place Points file and updated map services for both datasets.
 - NY-PA Border – GPO incorporated the updates from the PA team. Next generation 911 and call routing may drive further state line “clean-up” efforts.
 - GPO is developing a proposal for the remaining necessary layers for 911 – fire and police boundaries, call centers. The proposal will include local government effort, coordination, and general costs. This will make the rounds as part of the recommendations of the State 911 Committee.
 - Additional updates include the removal of two villages that dissolved December 31, 2018 – Harrisville (Lewis Co.) and Van Etten (Chemung).
 - No official documentation from the Department of State on the Village of Kiryas Joel and the new Town of Palm Tree.
- GPO Statewide Parcel Map (SPM) Program
 - 2018 GIS Tax Parcels are being rolled out to state agencies starting in July. All but one county – Suffolk – has given permission to share parcel data with state agencies.
 - Publicly available 2018 GIS Tax Parcels (21 counties), State-Owned Parcels, and Statewide Centroid Points will be made available on gis.ny.gov in July. Updated web map services of these feature classes will be made available by August.
 - Outreach to counties for 2019 GIS tax parcel polygon will begin in July.
 - Work is on-going to obtain permission from Suffolk county to allow the GPO to share its standardized parcel data product with other State Agencies.
- Street Address Mapping (SAM)
 - 19 counties have been trained as Street Editors.
 - All 62 counties have had streets that were edited.
 - 56 counties have had address points that were edited.

- There is still more editing necessary, but resources are limited.
- Orthoimagery
 - 2018 orthoimagery available in the standard cached 3-band services as well as a 4-band dynamic service.
- Elevation
 - 2019 LiDAR complete, Quality Level 2 – partially funded through the USGS 3D Elevation (3DEP) program.
 - Released a new FEMA-USGS dataset covering most of Herkimer County and parts of eastern Mohawk Valley.
 - Winters to provide geographic footprint for these (in the form of a slide deck).
- Request for Proposals (imagery and elevation)
 - RFP released 5/23/19
 - Proposals due 7/12/19
 - Hope to confirm or edit the plans for 2020 and 2021 capture by late summer.
 - Outreach to counties may be in stages – GPO will update which counties are being flown late summer, and then upgrade cost information a month or so later. They'll start with counties they planned to fly this summer.
 - Changes for orthoimagery: resolution will now be 1 foot or better, and they're adding 0.25-ft option.
 - Changes for LiDAR: have options for Quality Level 1, tidal coordination, building classification, and vegetation classification.
 - Winters can provide link to RFP for those interested.
- Platforms
 1. ShareGIS Proof of Concept (POC) – Boundless Server Enterprise Training in GeoServer, PostGIS and QGIS. The deliverables under the POC procurements are nearly complete.
 - i. Planet (which purchased Boundless) has moved away from state and public service. Planet introduced GPO to a new company that could potentially provide services.
 - ii. Load test results
 1. 1.5m parcels were loaded in the Boundless Enterprise GeoServer PostGIS database. They were containerized, managed by Kubernetes, and run through an automated load testing script. The script turned on the service, zoomed in, and panned five times for 20K users. The test was successful from a performance and cost perspective. Amazon costs were \$1500, increased to 20k users / hour, cost only an additional \$10.
 2. ACES is a big driver for this capability, another is asset management and AVLS that bring together the Internet of Things (IoT).
 3. In the Excelsior Cloud can support containerization technology as well.
 4. GPO will be looking for feedback from the various sectors; the capabilities are only as good as they serve the stakeholder communities.

11:45 Proposed Updating to Data Sharing Cooperative Agreements (Winters)

- The Data Sharing Cooperative has been in effect for 20 years, with 1,020 agreements from different entities.
- The number of new agreements has peaked at different times. Peaks have typically been driven by a programmatic requirement for key data. One was school districts for school bus routing;

another was fire district routing. As data was made publicly available, these peaks in Coop agreements subsided.

- ITS Legal Counsel noted that there was no renewal spelled out in the agreement; and half or more agreements are with agencies that no longer exist or have reorganized into other agencies.
- ITS Legal Counsel suggested streamlining the Cooperative with an online “click-through” Terms & Conditions any time the site is visited, resulting in continuous renewal. Alternatively, the paper-based agreements can switch to an online registration process.
- GAC Open Discussion
 - The agreements are still one person per agency. That “single thread” has resulted in some issues. Winters was open to consider multiple contacts per organization – a maximum of 3 was suggested, with one designated as the “official contact”.
 - There was concern regarding the potential “click-through” option, and fear that government entities would have issue with it (there could be legal roadblocks), and that it could result in a loss of membership.
 - Winters pointed out the need for a communication plan and training.
 - There was a suggestion of implementing a timed renewal.
 - GPO is currently validating the NYS GIS Clearinghouse’s “Who’s Who” directory and Cooperative Member list.
 - Winters to share draft updated Cooperative Agreement terms.

12:15 Concerns, issues, and feedback from other sectors

12:30 Break for lunch

1:30 Assessment Community Enterprise System (ACES) presentation & discussion

(invited speakers - Richard Cletus and Edward McDonough, NYS ITS)

- RPS4 is a software tool provided to local government by the New York Department of Tax. It is used for 1) assessment roll processing and valuation, and 2) creation of tax bills.
- RPS4 is a thick client, PowerBuilder application that is currently deployed to 960 locations across New York State. The application will be replaced with a modern, web-based platform called ACES.
- A vendor, Tyler Technologies, was selected to support development of the ACES application.
- ACES will include:
 - A centralized database partitioned based on jurisdiction
 - Functionality including assessment administration, document management, valuation, standard and customized reporting, sketching (key component), data extracts
 - Ny.gov for identity authentication
- Rollout will be in waves, with project phases overlapping.
- ITS is still looking at the potential for geographic gaps in broadband availability, and impact on the project.

- Data migration will include 2015 to present.
- Mapping details include:
 - NYS-provided parcel layer and other map services available from the Clearinghouse or from counties will be used
 - There will be default map views and web services (OGC WMS services)
 - Will leverage the NYS geocoding services – looking to standardize address data
 - Counties can leverage their own web service(s) where available
 - Statewide parcels are a yearly snapshot (short window when assessment rolls and GIS polygons are actually the same)
 - Will include Pictometry (oblique imagery)
 - Will support sketching
 - Will support scheduled, automated data extracts
 - Will leverage Finalist through Pitney Bowes for mailing addresses
- The team is evaluating needs for a publicly accessible view – will be better positioned to understand needs and approach in Summer 2020
- Not certain if there will be access to data for use by academia

2:30 Planning session (Richardson)

- GAC Work Groups
 - Purpose of work groups in GAC is to play an advisory role. They're useful for moving things forward, fact finding, learning and sharing best practices. A current example is the Parcel Work Group. Past workgroups included Datums, Elevation Data Distribution, Big Data, and Crowdsourcing Data.
 - Open discussion around topics and needs
 - Drones – networking and collaboration opportunities
 - Farmingdale has two new faculty and would like to participate or assist; suggested potentially leveraging students for drone projects
 - Some FEMA regions have started UAV groups with certain states. FEMA can contract with state agencies to take what they've collected – so FEMA would be interested in the “state of the state” for drone work.
 - Looking for venue to discuss legal and liability issues
 - There is a NYS Drone Workgroup led by Terry Hastings (DHSES) and Scott McDonnell (DEC)
 - Training
 - Question: can the state provide GIS and training / professional development as part of the local government shared services? This would be limited by budget constraints.
 - Farmingdale is looking into micro credentialing services, targeting K-12 educators; but maybe local government is an opportunity.
 - GISA is trying to support education (teachers, planners) and is also looking at credentialing.

- Could potentially pursue a National Science Foundation (NSF) grant to support education
- Refresh of GIS Contracting/Mechanisms within NYS Government
- Ideas from the GIO
 - Framework data
 - GIS policy for getting GIS data out to the public (including metadata)
 - NYC's use of cloud and open source technologies – can the GAC make recommendations to help promote government plans for adoption?
 - Commercial software is becoming cost prohibitive
 - Look at QGIS instead of ArcGIS Pro for some cases
 - Free your data from vendor-specific solutions

3:15 Meeting adjourns

Upcoming 2019 Meetings:

Sept. 11 (Wed)* (proposal to shift to Tuesday 9/10 instead)

Dec. 11 (Wed)