



North Carolina Geographic Information Coordinating Council

Minutes
May 9, 2018

PRESENT

Alex Rankin (Chair), Steve Averett, Paul Badr, Bob Brinson, Marc Burris, Kathryn Clifton, Bob Coats (for Nels Roseland), John Correllus, John Cox, Seth Dearmin, John Dorman, Stan Duncan, Dianne Enright, John Farley, Kristian Forslin, John Gillis, Joanne Halls, Haley Haynes (for Elaine Marshall), Jason Hedley, Matt Helms, Freda Hilburn (for Bliss Kite), Sarah Koonts, Dan Madding, Chris Nida, Allan Sandoval, Silvia Terziotti (for Scott Lokken), Lee Worsley and Ron York.

Staff: Tim Johnson, CGIA

ABSENT

David Baker, Wesley Beddard, Greg Cox, Debbie Joyner, Michael Pjetraj, and Tony Simpson

PROCEEDINGS

A meeting of the Geographic Information Coordinating Council was held in Training Room 240 of the Albemarle Building in Raleigh, North Carolina.

Welcome and Chair Announcements

Alex Rankin, Chair, called the meeting to order and welcomed Council members and visitors.

Mr. Rankin announced that he has made some committee appointments and thanked them for being willing to serve:

- Paul Badr, Chair of the Statewide Mapping Advisory Committee
- John Farley, Chair of the State Government GIS Users Committee
- Debbie Brannan, member of the Local Government Committee

Mr. Rankin welcomed a new Council member appointed by Governor Cooper, Seth Dearmin, representing the Attorney General. Mr. Dearmin serves as Chief of Staff of the NC Department of Justice. He has worked in the public and private sectors and is an alumnus of UNC Chapel Hill.

The Council's Advisory Members have all agreed to continue to serve. Mr. Rankin thanked Sarah Koonts (NC Department of Natural and Cultural Resources), Kristian Forslin (NC Railroad Company), Marc Burris (State Board of Elections), and Bob Brinson (Department of Public Safety).

Mr. Rankin also introduced Anna Szamosi, Assistant Attorney General, assigned to the Department of Information Technology. She will be named as the DIT legal representative assigned to the GICC, and she has a request of Council members. She explained that guidance from the Office of State Human Resources (OSHR) and the Office of State Budget and Management indicates that all members of state boards and commissions are to be counted as employees of the State (whether compensated or not). Council members who are not state employees will be required to complete Form I-9 to verify employment eligibility. At the next GICC meeting, Council members will need to fill out Form I-9 and show a form of identification. Someone from OSHR/Temporary Solutions will be available to assist. Ms. Szamosi will make more information available to the Council before the next meeting and offered to answer any questions.

Approval of Minutes

The minutes of the February 14, 2018 meeting were approved for adoption with no changes.

Working Group for PLS and GIS

Bob Brinson, chair of the working group, reported that selected members of the group met this morning with the surveying committee of the NC Board of Examiners for Engineers and Surveyors (NCBEES). Work is complete on review of use cases. This provides a framework of documented examples of data creation and manipulation that fall into GIS practice or professional land surveying. The group is moving on to cross-cutting themes from the discussions of use cases. One issue is manipulation and integration of geographic data and where that fits in the framework. Metadata has been a topic, including how it is captured and published in GIS practice. Mr. Brinson has seen progress on defining roles for disclaimers in relation to work products from GIS and surveying. A subgroup is working on language for standard disclaimers. One more meeting is planned to review the documentation and chart a course for how this moves through NCBEES and the GICC to become rules or guidelines or common practice. Mr. Rankin thanked Mr. Brinson for his leadership on this effort.

Strategic Direction for the Council

Mr. Rankin began a discussion of strategic direction for the Council in 2018 and beyond as the next step following discussions of challenges and opportunities during Council meetings in November and February. He explained that staff reviewed the content of the discussions, summarized challenges and opportunities (distributed to the Council in April), and prepared an initial set of bullet points (distributed to the Council on May 7) to inform discussion of strategic direction. Mr. Rankin invited Council members, as representatives of statewide GIS stakeholders, to discuss the ideas, comment on which elements the Council should pursue, and move toward an action plan.

The first category of strategic elements relates to improving and/or expanding statewide geospatial data, with six items. The Council reviewed each element, starting with two related elements.

- 1.1. Promote free and open discovery of and access to geospatial data created and maintained by local governments.
- 1.2. Find solutions for consumers to discover and gain access to public geospatial datasets that local governments currently withhold from public access for concern about homeland security.

Comments: Discussion of the first two elements began with comments about public availability of geographic information about utilities and how to determine locations and service providers of utilities. Mr. Farley explained that, from a state agency perspective, knowledge of locations of utilities and service providers is valuable for project planning and project delivery, including transportation projects where complete, readily available information would save a lot of time and money, even if the data do not cover the whole state. Mr. Rankin explained that, for private companies, inaccessibility of public information about infrastructure adds time and cost to planning projects. While municipalities may withhold geographic information about underground systems for security reasons, above-ground, readily visible parts of public water and sewer facilities (e.g., hydrants, manhole covers, etc.) mean the locations of underground facilities are not secret. Geographic data for public roads, including bridge locations, could be used by someone looking to do harm, but transportation data are not restricted, to the benefit of public and private GIS users.

Regarding power utilities, Mr. York is responsible for decisions about geographic data distribution for Duke Energy. He explained that when the Department of Homeland Security (DHS) designated electric utility infrastructure as critical infrastructure, data sharing was restricted. Before September 11, 2001, Duke Energy gave out information on a regular basis. After the DHS classification, the utility is constrained to cautious, limited data sharing in small geographic areas for some private and government agency requests. Duke Energy contractors are under tight restrictions. Sharing utility network data with public agencies could lead to unintended access contrary to security measures designed to protect critical infrastructure. A state agency, for example, may not be able to protect a copy of utility data from a public information request.

In response to a question from Mr. Duncan, Mr. York explained that property ownership information is not sensitive. Mr. York is willing to share geographic data representing utility corridors where information about facilities is not included. Mr. Farley confirmed that corridors alone would be very helpful in transportation planning. He urged a consistent approach to working with utilities to determine what can be published and shared, and that the Council develop recommendations on this topic.

Mr. Hedley added that, from a surveying perspective, locating easements without locations of facilities can be problematic, for example, where easements are defined as a certain distance from a utility structure. If the structure location is determined, the information goes into a transportation plan and gets shared. Better defined easements could reduce the cases where a structure location is added to a plan. Mr. York explained that transmission lines are surveyed, distribution lines are not. Easement boundaries are not always clear and well represented by digital data. Also, accuracy of a utility's geographic representations of underground infrastructure varies. The data may not be a reliable source for other utilities doing underground work.

Mr. Rankin concluded this is a fruitful topic for work by the Council.

1.3. Continue to support initiatives that compile and maintain statewide geospatial datasets that are priority data themes of the Council, including *AddressNC*, NC Roads, NC Parcels, Statewide Orthoimagery, county and municipal boundaries, LiDAR elevation, surface waters, and geodetic control.

Comments: Mr. Badr and Mr. Dorman confirmed value in accessibility, consistency, and standards, and pointed out national recognition for North Carolina in producing statewide data, particularly these “Framework” data themes. Mr. Rankin concluded this element should be on a priority list.

1.4. Find solutions to make data sharing local-to-state more efficient to meet the needs of multiple statewide datasets and not place undue burden on local geospatial data managers.

Comments: Mr. Farley observed that data requirements for Next Generation 911 present an opportunity for coordinating data sharing. Technology may offer opportunities for connections to local servers. As locally managed data are updated, a workflow is essential to integrate local data into standardized statewide datasets. Mr. Burris reiterated that standards are essential in data sharing. Mr. Rankin concluded this element is important in the work of the Council.

1.5. Request all state agencies to make the Council’s priority geospatial datasets discoverable and accessible through the NC OneMap Geospatial Portal.

Comments: Not all the Council’s priority datasets are discoverable currently. As one example, flood hazard areas managed by the Division of Emergency Management are not discoverable and accessible through NC OneMap; a web service is published by the Division, but not linked to the portal.

In response to a question from Mr. Dorman about various business needs of consumers and where they can best access geospatial data in their business flows, Mr. Farley explained that NC OneMap is a first stop for data discovery. A work flow can take advantage of a discovered web service from any participating server and/or a download link may be followed to data hosted by a participating agency. Mr. Badr added that consumers include private businesses that benefit from free access to statewide web services and downloadable data. Ms. Clifton observed that local governments need a workflow and need to know how their source data will be aggregated, including a standard schema, as local data managers update their large datasets such as addresses.

In response to a question from Mr. Badr about providing links through NC OneMap to local government servers, Mr. Brown explained that in the early years of NC OneMap, the approach was to connect to local government servers. That approach turned out to be impractical because of the challenges of inconsistent data and server management across the state. As NC OneMap evolved, more complete, reliable discovery and access was achieved through state-hosted statewide datasets aggregated from local data to a state standard (e.g., roads and parcels) or developed as statewide products (e.g., elevation and orthoimagery). Mr. Farley observed that as technology continues to change, connections to local servers may become practical. In response to a question about imagery, Mr. Brown explained that oblique imagery products licensed by local governments are open for discovery and access through NC OneMap.

1.6. Promote geospatial metadata for standard documentation.

Comment: Mr. Rankin concluded this is an important element to include.

The second category—Council support of applications of geospatial data—has five elements:

2.1. Support creation of services that publish results through online applications that include vehicle routing and address validation, from single requests to batch processing.

Comments: For example, NCDOT has transportation data that can be developed into routable roads. Economies of scale are available for state applications, for example, an address validation service that agencies could use in common. Mr. Duncan added that this pertains to mailing addresses and related postal costs as well as situs addresses and business needs such as address points for Census 2020 and parcel situs addresses. Simple applications can be effective. In response to a question from Mr. Badr, Mr. Farley observed that most of the work on autonomous vehicles will concern vehicle sensors more than geographic information. State level efforts could develop statewide roads data into a routable network that can be shared for many public purposes. Mr. Badr added that transportation assets are valuable as accessible datasets for asset management. Mr. Burris observed that economies of scale are available in collaborative data development and management, e.g., address validation. Ms. Clifton added that simplicity of address validation will be useful for local governments.

2.2 Support creation of applications that analyze and display, for a user location of interest (point), the related jurisdictions (areas) in terms of voting, house and senate representation, local sales tax collection, business licensing requirements, municipal or county service provision, and other interests.

Comments: Mr. Farley emphasized the value of having jurisdictional boundaries available for a variety of business needs, not a specific application. Ms. Clifton added that beyond representation, voting precincts could be made discoverable through NC OneMap for ease of access. Mr. Rankin concluded data availability is more important than a specific application as an element.

2.3. Identify opportunities for applications to coordinate asset maintenance by state and local governments.

Comments: Mr. Farley explained that NCDOT has applications specific to NCDOT assets, but from a citizen perspective, it is not evident in the field who to contact to report a problem. Shared asset data is a requirement for such applications. The cost and return are not clear. Though technically simple in concept as described by Mr. Badr, Mr. Averett observed that in practice, applications that involve vehicle routing are very challenging. Even on a city scale with resources applied, reliable asset mapping and getting vehicles to problem locations is challenging. Mr. Helms commented that despite the challenges, there are opportunities for coordination of asset maintenance and potential benefits.

2.4. Identify what applications for economic developers doing site selection would enhance available information.

Comments: This relates to discussion of utilities data and NC OneMap, as well as availability of data for buildings and sites for economic development. Mr. Sandoval explained this is complicated by the absence of a comprehensive listing service for

commercial properties. Data are managed by multiple companies. Data on buildings and sites managed by a third party for the NC Economic Development Partnership is not comprehensive. Ms. Clifton suggested a start may be a web service for buildings and sites based on data entered by local economic developers, however incomplete, to consume in GIS applications.

2.5. Support applications related to data analytics in ways to derive value from a wealth of source data.

Comments: Mr. Farley observed that the trend toward “big data” suggests value in aligning GIS with the State’s data analytics. A challenge is to identify specific ways to integrate geographic information with data from large State systems.

Mr. Correllus observed that discussion of applications has highlighted the business value of more and better geospatial data. The points made related to applications are all related to business value of data assets. He emphasized the value of collecting and making sure we know more about data assets, and suggested the elements in categories 1 and 2 may be grouped in one category.

The third category—collaborate for more integration of geospatial data in information technology for expanded benefits, with two elements:

3.1. Identify opportunities to collaborate on GIS solutions in state departments and divisions not directly represented on the Council to add value to state business processes.

Comments: Mr. Farley commented that DIT optimization of IT resources will help make progress on this element. A comment from Mr. Burris about coordinating state agency efforts pointed to the State Government GIS Users Committee that explores opportunities to add value in state government.

3.2. Identify opportunities to collaborate and inform municipalities engaged in “Smart Cities” initiatives about potential for GIS in information technology solutions.

Comments: Geospatial data improvements and technology are enabling initiatives in local and state governments, leveraging “smart” concepts. Mr. Badr confirmed value in this element, and Mr. Correllus pointed out “Smart States” initiatives as well.

The fourth category—collaborate with all parts of the GIS community in North Carolina, with two elements:

4.1. Identify opportunities to collaborate on geospatial data and technical solutions on a regional basis, engaging councils of government.

4.2. Reach out to jurisdictions with the least resources to find ways to add value with geospatial data and applications.

Comments: Mr. Rankin concluded that Council members tend to come from jurisdictions that have the most resources. Some small jurisdictions are struggling in applying geospatial technology. Council members can serve as resources for local governments that need help.

Mr. Dorman observed the value in an in-depth understanding about the data needs and business needs of state and local governments to guide the Council’s collaboration efforts.

Mr. Rankin closed the discussion with an action item for staff.

Action: Council staff will digest the comments from today's discussion and modify the set of strategic elements accordingly.

Issues for the Council

1. Municipal Boundaries

Haley Haynes, Deputy Secretary of State, presented on behalf of Secretary Marshall who is hosting an international conference of commercial administrators in Charlotte on "big data." Ms. Haynes brought an issue to the Council about municipal annexations and impacts of non-compliance with North Carolina General Statute 160A-58.61. The statute requires municipalities enlarging their boundaries to record an accurate map and the certified ordinance at their county register of deeds' office and at the NC Secretary of State's office. Despite the statutory requirement, municipalities receive a mixed message: you must file the required documents with the Secretary of State no later than 30 days from the effective date of the annexation ordinance, but "failure to file within 30 days shall not affect the validity of the annexation."

One impact of this situation is the completeness of municipal boundaries used by the US Census in counting population by geographic units, including incorporated places. The US Census relies on the Secretary of State's annexation records as the authoritative source for annexations in North Carolina in the annual Boundary and Annexation Survey (BAS) process. If an annexation is not filed with the Secretary of State, it will not be certified to the Census Bureau. Consequently, residents in the annexed area will not be counted as residing in that municipality. Municipalities that fail to file annexations with the Secretary of State stand to lose funding from federal sources on the order of an estimated \$1,600 per person/per year or \$16,000 per uncounted resident over ten years before the next census.

Ms. Haynes explained that despite years of outreach to municipal clerks, compliance is still a real issue. The requirement is viewed as optional because it doesn't affect the ability of the municipality to begin taxing new residents. Smaller towns have smaller/part-time staff. Infrequent annexation activity means that staff may not be familiar with all statutory requirements. Inadequate maps are frequently an issue for filings that make it to the Secretary of State, making certification difficult.

Normally, certification by the Secretary of State occurs within a few days and is posted on the website. Also, counties receive monthly reports on annexations received by the Secretary of State.

Ms. Haynes' proposal is to amend statutes to:

- Make the annexation filing with the Secretary of State truly mandatory
- Require a municipality to present the annexation documents certified by the Secretary of State to its county tax office before municipal tax status is changed for the annexed area, as a motivation to comply

She proposed that the GICC, with its range of stakeholders, is uniquely positioned to take up this issue to create a truly workable solution. There is federal funding at stake for municipalities. She sees the need for a legislative solution, though she is open to consideration of other solutions.

Mr. Farley added that this has been discussed in the Statewide Mapping Advisory Committee and the Management and Operations Committee, and explained that submissions of municipal boundaries to NCDOT under the Powell Bill are required for reimbursement for road maintenance in their jurisdictions. This is separate from submissions of annexations to the Secretary of State. A concept from those discussions is to require municipal submission to one state agency, and state partners share the data and apply the data to multiple business processes. Michael Cline, State Demographer added that he has met with GIS people involved in statewide municipal boundaries to look at the current situation and identify opportunities for a more efficient process for keeping municipal boundaries current and complete. Mr. Gillis observed that the potential for lost federal revenue should be an incentive for municipal governments to report data fully.

John Bridgers and Rich Elkins of the Land Records Management Program in the Department of the Secretary of State explained that submissions are required to be a certified copy of the annexation and an “accurate map” which varies from a paper map to a digital map to a signed and sealed survey. The Secretary of State encourages surveyed boundaries but cannot require a survey.

Also, the Secretary of State has been working with counties willing to take responsibility to report annexations on behalf of municipalities within their county boundaries. Sixty-six counties have agreed to that approach. Mr. Coats noted the value of current municipal boundaries to the State Demographer in developing certified municipal population estimates annually.

Mr. Worsley invited the Secretary of State to participate in an upcoming meeting of the board of delegates of the Association of Regional Councils of Government to go along with Census training.

Mr. Rankin concluded that this an important and timely issue that should be part of the Council’s work. He asked Paul Badr and the Statewide Mapping Advisory Committee to investigate the issue and come back to the Council with a recommended solution this year.

Action: SMAC will research the issue of collecting and integrating statewide municipal boundaries and recommend a solution

2. Stream Mapping and Water Quality Rules

Tim Johnson explained the background of an issue relating to stream mapping and water quality rules. Hydrography (rivers, streams and other surface waters) is one of the priority Framework data themes of the Council worthy of investment. A number of years ago there was an effort to develop “local resolution” stream data to represent all surface waters in detail. A project completed for 19 counties in western North Carolina in 2007 was successful but did not have funding to be extended across the state. Improvements in technology are available now that can be applied for an improved authoritative dataset for streams. Meanwhile, the Environmental Management Commission (EMC) has issued water quality rules related to riparian buffers for re-adoption, now open for public comment. Mr. Johnson asked Cam McNutt, chair of the Stream Mapping Advisory Committee that was created by the Council many years ago, to present parts of the rule language that involve the GICC and to recommend modifications for the Council to consider.

Mr. McNutt, NC Division of Water Resources, explained that the GICC is included in riparian buffer rules as a body that would approve a stream map for implementation of the rules. That language has been in the Jordan Lake rules since 2008. The issued rules, to be subject to all river basins, call for approval of stream maps by both the GICC and the EMC. There is no process for GICC approval of

stream maps. The Stream Mapping Advisory Committee has monitored rule development for three years, and wrote comments to clarify the language and limit the GICC role to overseeing the quality of stream data. The EMC's separate role should be to apply riparian buffers to water bodies. The geographic representation of streams should be independent of regulatory policies applied to streams.

As additional context and in response to questions, Mr. McNutt acknowledged that multiple versions of streams are in use in state agencies based on different sources and methods. Part of the work of the Stream Mapping Advisory Committee is to assess available stream data and methods. Intentions of the Statewide Mapping Advisory Committee are to achieve a high-resolution, singular dataset for surface waters. Data including elevation and imagery are much improved as sources for stream data. Interestingly, no streams have been subject to buffer rules in the 19 western counties where detailed streams were developed and published. Mapping of "headwater streams" in portions of the state by the Division of Water Resources with support from NCDOT is one of the sources for a statewide dataset. Mr. McNutt added that streams specified in the riparian buffer rules—streams depicted on USGS topographic maps and streams on county soil survey paper maps—are not adequate for representing statewide surface waters for most business needs. Mr. Farley made a motion, seconded by Mr. Madding.

Voted: Tim Johnson will send a document with rule language and suggested comments from the Stream Mapping Advisory Committee to Council members by email for review and comment in preparation for the Management and Operations Committee meeting on June 18.

Action: Management and Operations Committee will review and integrate Council comments and prepare statements for submission before the July 2 deadline for public comment.

Using UAS in NC: Public and Private Perspectives

Mr. Rankin introduced Jeff Jones, City of Salisbury. Mr. Jones gave a presentation on low altitude photogrammetry using unmanned aircraft systems (UAS) in his organization, Salisbury-Rowan Utilities. He is a Professional Land Surveyor working on a geomatics degree. He described a project in support of an upgrade to a lift station and force main. He needed accuracy suitable for public works design related to topography and feature collection, applied to a 9-acre area away from the city and the airport. He displayed and described the four-rotor UAS, a camera, and a flight plan. Ground control points are essential. He produced both orthoimages at 1.15 centimeters (about 1/2 inch) and synthetic point clouds from the pixels to analyze the area. This is pixel matching, not radar penetration. Elevations are assigned to pixels. He created one-foot contours without breaklines.

Mr. Jones explained the importance of good photogrammetry conditions, and explained problems created by vegetation and shadows. Point cloud classification can be challenging at low elevations as well. He emphasized that the purpose of a project is important to consider in terms of accuracy. The effort took less than two days for control, collection and processing. Issues include licensed pilots and practice of land surveying. See the presentation [online](#).

Mr. Rankin introduced James Gray of Stewart, Inc. Mr. Gray presented private perspectives based on his experience with UAS. He described typical UAS workflows in construction management to support land development, inspections for utilities, 2-dimensional planimetric mapping, 3-dimensional surface mapping or synthetic point cloud for volume estimates and contours, stereo mapping, and aerial LiDAR that is gaining momentum for UAS.

Mr. Gray observed that UAS is changing traditional project approaches, bringing photogrammetry/remote sensing to the masses, and providing a valuable tool for quality control and quality assurance. For example, there are more than 100,000 certified FAA Part 107 remote pilots in the nation. Investment is moderate for a system, and small projects have become more practical for private data collection.

UAS adds value for clients through data collection efficiency, near real-time site documentation, derivative products, and marketing materials. Challenges include FAA regulations, unlicensed practitioners offering professional services, heavy datasets, and staff qualifications and training. He sees evolving FAA regulations, UAS airspace integration, more LiDAR capabilities, more innovative and affordable platforms and sensors, more demand for qualified and experienced staff and more staff education. See the presentation [online](#).

Silvia Terziotti added that US Geological Survey uses UAS for collecting data along stream corridors that may be difficult to access.

Committee Reports

Statewide Mapping Advisory Committee (SMAC). Paul Badr, SMAC Chair, reported on highlights of the April 18 meeting. As usual, committee members presented quarterly reports on geospatial framework data, including opportunities, issues and progress, as well as working groups reports on activities and progress. NC Parcels is more than halfway through its spring update. The Working Group for Seamless Parcels will follow up on data quality issues. Elevation derived from LiDAR is progressing toward completion of its 4th and 5th phases. Research on potential applications of LiDAR is of much interest to SMAC. Water quality rules and stream maps were discussed in preparation for today's meeting. The 2022 Reference Frame and state plane coordinates will be discussed when the working group on the topic meets this spring. Statewide orthoimagery is on track, and the Working Group for Orthoimagery and Elevation discussed details of color balance, shadows, sun angles and color infrared imagery. The Working Group for Land Cover will submit a report to SMAC in July on business needs for land cover data.

The Working Group for Roads and Transportation submitted a revised state data content standard for road centerlines. SMAC approved the revised standard and will recommend Council approval on August 8. Mr. Badr and staff will send the revised standard to Council members by early July for review and comment over a 30-day period.

Local Government Committee (LGC). Kathryn Clifton, LGC Chair, reported the committee has new members—Wayne Brewer of the City of Raleigh, Jason Clodfelter of MapForsyth, Debbie Brannan of Cabarrus County, Ben Strauss of Wake County, and George Brown of Alexander County. At its February 28 meeting, the committee discussed a need for more communication to inform more data consumers about the availability of statewide parcels to avoid duplication of effort. Local governments are putting time and energy into preparation for Census 2020. There is interest in metadata training. The committee discussed National Agriculture Imagery Program (NAIP) and the importance of free, accessible imagery. There is much interest in Next Generation 911 and how it relates to address data. The committee discussed GIS user groups and how they tend to be statewide with fewer regional groups. The committee also discussed potential for mapping water and sewer service areas as an alternative to publishing data on facilities.

State Government GIS Users Committee (SGUC). Dianne Enright, SGUC Vice Chair, reported that the committee is working on the next Enterprise License Agreement with Esri for GIS software. SGUC is revising a survey of state agencies and collecting more information in preparation for negotiations with Esri in the coming weeks. A review of terms and conditions is in progress.

Federal Interagency Committee (FIC). Silvia Terziotti, FIC Vice Chair, highlighted the 3D Nation Requirements and Benefits Study that seeks information about elevation data from states. Gary Thompson is the state champion for North Carolina. Several participants have been selected across the state and will be surveyed once the survey is approved for release. The national evaluation will have state components as well. Also, the National Geodetic Survey will seek information from states about the 2022 Reference Frame.

GIS Technical Advisory Committee (TAC). Dan Madding, TAC Chair, reported that he is consulting Gary Thompson, Scott Lokken and others to develop a document on the 2022 Reference Frame for GIS users, including state plane coordinates and potential impacts of the new system.

Management and Operations Committee (M&O). Mr. Rankin added that most of what the committee has discussed has been covered this afternoon. The committee met on March 29 and April 23 and will meet June 18. Census 2020 and the Local Update of Census Addresses are ongoing topics of discussion.

Geospatial Data Act Update

Tim Johnson reported that, based on comments from the Council and action by the Management and Operations Committee, the Council has submitted a letter to the Governor's Office from Mr. Rankin and Secretary Boyette to the US Senate in support of Senate Bill 2128, the Geospatial Data Act of 2017. This is timely, as the bill may be heard in committee in May.

NC GIS Conference 2019

Mr. Johnson reported the 2019 NC GIS Conference is on track for February 26 through March 1, 2019 in Winston-Salem at the Benton Convention Center. The program committee is about to convene, and a call for topics and presentations will be underway early in the summer. One topic identified this morning is the findings by the Working Group for PLS and GIS in its discussions with the surveyors committee of NCBEES. The conference event manager this year will be North Carolina State University's Office of Professional Development. The website and registration will be established soon, probably in June.

GICC Member Announcements

Steve Averett announced that the City of Greensboro used GIS in response to tornado damage in the city, and he offered to demonstrate the online application and explain its role in damage assessment and volunteer management at the next Council meeting.

Mr. Madding announced that the Southern Group of State Foresters has commented that LandsAT data (satellite imagery, 30-meter resolution) may be moving toward distribution under a license model instead of the free public access that has been the practice in recent years.

Mr. Johnson added that NC House and Senate appointments of Council members, three each, are expiring in the next two months. Council staff will contact each of the six members about renewal of appointments. Contacts with House and Senate leadership with recommendations will follow. The goal is to have re-appointed members or new members appointed by August.

ADJOURNMENT

There being no other business, the Chair adjourned the meeting at 3:05 PM.

The remaining dates for Council meetings in 2018 are August 8, and November 7.

Presentations and reports for this [meeting](#) are on the Council [website](#).