

ITAC Meeting

March 5-6, 2013

Roll Call: Scott Gain, Mike Lewis, Terri Moore, Susan Trapanese, David McCulloch, Gary Krammes, Gary Cottrell, Gary Fisher, Bob Kimbrough, Bob Avery, Kris Lund, Pete Cinotto, Kate Flynn

Invited participants: Lorna Schmid, Burl Goree, Joe Nielsen, Stewart Rounds, Chuck Schalk, Gary Latzke, Dan Schwitalla, Tim Brown

Additional participants: Ana Sanchez, Francis Peters, Kevin Grimsley, Martyn Smith, Reggie Howe, WAWSC staff

DAY 1

Mobile Application Framework – Lorna Schmid

Lorna updated ITAC on the status of the Mobile Application Framework. The Community for Data Integration (CDI) funded the development of a USGS Mobile Applications Development Support Framework in 2012. In July 2012, the Mobile Framework Working Group met to design a draft workflow. The group started to build resources to help project managers and developers make better decisions on project design and implementation. Referencing the group's SharePoint (SP) site for the project – collaboration.usgs.gov/community/mobile -- Lorna noted that there are four phases of the framework workflow. The workflow provides a mechanism for lifecycle management of mobile applications.

- Ideation – development and exploration of the science concept, identification of the technologies the concept may employ
 - o artifact documents and process development
- Development – steps needed to build an application or deploy a science support capability
 - o Development checklist, use of best practices, USGS Visual ID, basic government/Department/Agency policy, ensure the mobile community is engaged
- Review/Approval – involves user testing at levels required for the application, security and policy review and approval, and document management. This step is critical in meeting the “validate official government applications” criteria of the Digital Government Strategy (DGS)
 - o Lorna commented that mobile applications should be designated as official USGS products. They would then fall under the purview of fundamental science practices and could then go into the USGS Information Product Data System (IPDS) process.
- Publishing/Monitoring – provides USGS with a view on how the science capabilities are being used
 - o Look at user feedback and technology changes to determine if the product should be there and application versioning to provide structure and rules for new releases.

David McCulloch asked if the applications are on the USGS App Store with Lorna responding “no.” Lorna noted that Ken Dreyer is setting up a github.

USGS is working with Larry Gillick (DOI Deputy Director of Digital Strategy) to discuss how to move the process of developing and managing apps forward.

We would like to see USGS adopt the Mobile Framework strategy. This will involve:

- Maintaining an inventory that captures consistent metadata about apps that can be used for communication, metrics, reporting, and tracking. The inventory can be found at:
collaboration.usgs.gov/community/mobile/usgs/Lists/MobileInventory/DefaultView.aspx
- Designation of mobile apps as official USGS products. This will formalize development, review, and approval processes under the Fundamental Science Practices (FSP) and incorporate workflows and artifacts into the IPDS.
- Establishing governance and license management. All apps will follow governance processes. Native apps have license requirements. Lorna noted that she, Scott Horvath, Tim Kern, Ken Dreyer, and Burl Goree will be part of this process.

- o Licenses will be managed under mobile@usgs.gov

Establishment of a formal mobile community to help with technical reviews, security guidance and validation, best practices development, and usability testing support is important. This community will be the go-to place for new development teams to get advice. The group will share their experiences with other developers.

Lorna will continue to develop the SP site. Tim Kern is working with Lorna. Comments and questions can be sent to Lorna.

Mobile Computing Update – Burl Goree

Burl's update to ITAC focused on a review of changes over the past couple of months. He began his presentation by showing ITAC a [graph showing adoption rate of Site Visit](#) by WSCs. Currently, over 50% of site visits are collected by electronic means. The orange bars on the displayed graph represent what is left in the effort to go digital. The graph allows us to see the progress a WSC has made over time.

Gary Fisher commented that there is no ART since October 2012, why is that? Burl responded yes, that is correct. We are winding down the ART effort. Most Centers have converted to the use of SWAMI.

Michael Lewis – Regarding the remaining orange bars, what can you tell us? Is it location? Burl responded that it is not site-based, but represents different offices in WSCs that have not yet adopted the electronic tools; for example, a field office that has yet to switch. Michael asked if there has been any feedback from field offices. Burl replied that other offices are slowly adopting these tools. It's a slow, methodical process as Centers change their way of doing business.

Burl reported on software updates to ITAC. Detailed information can be found on the [field computing SP site](#), you can also set up alerts for updates.

- SWAMI-PC – test version of 5.0 release; major update – section by section processing of WINRiver files and SONTEK files was added, bug fixes were also made
- Station Levels – major update – serial communications problem and blue tooth equipment problems were addressed
- MONKES – major update – modernized the connection from INGRES to Oracle, GUI built in to the app, SV Generator was updated (allows processing and loading of files into NWIS site visit)
- Stylesheets modifications – addressed the issue that Office of Surface Water (OSW) had where they were unable to tell if the entry checked discharge rating; bug fixes

Questions:

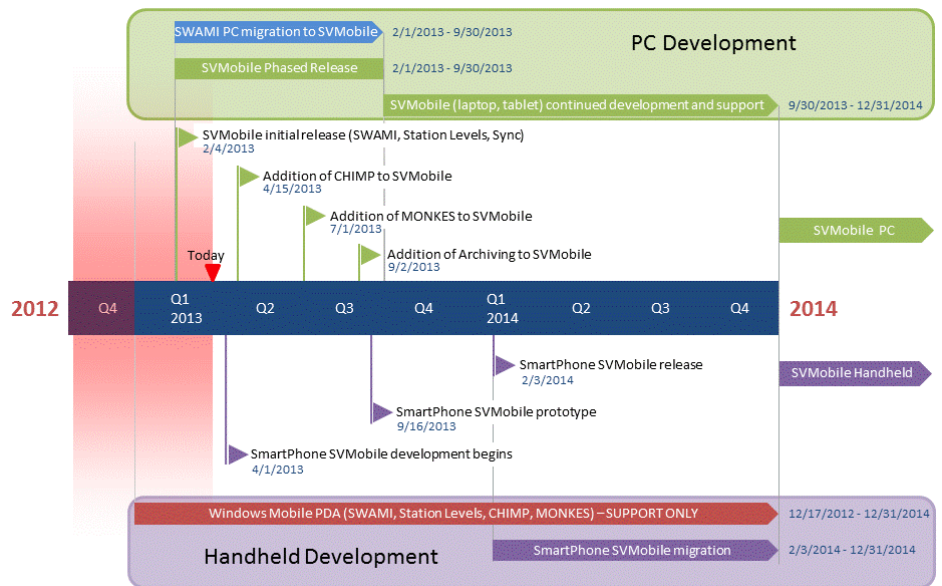
Michael Lewis – I am curious about the report on field computing and its recommendations; did this affect you? Burl responded “yes,” the recommendations will have an effect moving forward.

Michael commented that this is a good example of “bookend” uses and non-uses of software. This provides a qualitative comparison of field computing, and a nice setup for some comparison. Burl responded that they look at the latency for time between data collection and entry into NWIS. The graph shows that nationally, the time is cut in half through the use of electronic means.

Michael, noting that he does not mean to put Scott on the spot, commented that he is curious as to why Tennessee is not using these tools. Scott responded that he will be looking into this for Mississippi and Tennessee. Scott noted that they are understaffed; that's the only reason he can give without further attention. Burl commented that Tennessee still does a good job getting their data in manually even though they aren't completing the process electronically. Electronic processes allow a significantly larger amount of data to be loaded.

SWUG and OWI have asked about future plans for development for PC and handhelds. Burl showed a diagram to show what is planned. Through 2014, there are some tasks that are better suited to one platform or the other. The goal is to use the best platform. Burl noted that items on the bottom half of the slide are in limbo due to current budget constraints. We currently have support for SV Mobile.

Burl to Bob Kimbrough – did you have time to review this to see if it is addressing the field computing report recommendations? Bob responded yes, noting that the take home message for WSCs is for them to consider phasing out PDAs and move toward the use of laptops and tablets. Burl commented that some WSCs are doing this, but there are some WSCs that still need use of PDAs. Gary Fisher commented that it is important to note that we're not saying to throw PDAs away. We are supporting them for now, and they are still useful. Once SV Mobile is on the street, we can focus our efforts on other areas.



Other field computing business—

- At a recent OSW meeting, SWAMI was voted to be a “big rock.” We want to ensure that development is in sync with policy needs. Technical group is working with Water Science Field Team Surface Water Specialists to try to find obstacles to implementation in the few WSCs that have yet to try SWAMI. We want to ensure we have adequate resources for and recognize apps as mission essential.
- OGW (working with Linda Debrewer) revitalized the Monkes Interest Group (MIG) – discussion revolves around bugs and enhancements.
- NWIS Site Visit will be incorporated into AQUARIUS.

Michael Lewis – how much of your time is funded for these efforts? Burl responded - ½ time for him (manager and developer), Joel Dudley (3/4 time), and Megan Rogers’ time – for a total of about 1 ½ FTE. Burl commented that this may not be enough. It is a challenge to find the time for support, develop, and training. If he were to be asked for more time, he would have to make changes. Gary commented that support from KSWSC has been lost and they are moving toward Joel being the primary developer. Burl – we have a good code management system in place, and we might look at moving code to the github to leverage the resources we have. This is being considered as an option to “squeeze” more work out of the system.

Kevin Grimsley – Did you want to mention the small paper put out by SWUG? Burl responded that at the last user group meeting, there was discussion about simultaneous development of PC and handheld efforts. Kevin commented that we need to increase development and support in technical offices.

Burl commented that he is available for questions and follow-up.

Scott commented that he will be trying to find out more about the TNWSC’s adoption of the apps. Scott noted that he feels that TN’s reluctance to adopt may have to do with time and the adoption of new technologies. He expressed concern about OSW requiring a procedure versus an outcome, and asked if Burl had a sense of this. Burl responded that they are looking at use of apps to ensure we are meeting policy requirements – monitor data as it is entered into the system. We are trying to address the policy issues at the beginning by integrating policy into the application.

Scott commented that the quality assurance and tracking side for OSW makes sense. He can see reasons to do it that were not initially obvious. Burl responded that it takes a while for new procedures to take effect and allows for adjustment of software as needed. Gary Fisher commented that looking forward, as we migrate to standard procedures, data is entered and quality assured right away. It is then sent directly to the internet where it is readily available.

Special Projects – Gary Fisher

Gary began his presentation with a reminder about long-term issues that need to be addressed. He took an action for the next meeting to begin a discussion on how best to initiate, manage, and migrate special projects to a program. Gary continued with updates to ITAC on special projects.

WaterAlert –

- About 42K active subscriptions (27K subscribers) as of the week of February 26, 2013
- 73% daily and 26% are hourly notifications
- 88% gage height or streamflow
- Advances – David Boldt rewrote the subscription code so that it is now more robust; email addresses are added to the database for system message purposes.
- WaterAlert supports data descriptors
- Map will transition from GOOGLE API to ESRI Map API (must be completed by September 2013 – David Yancey is working on the prototype)
- **ACTION** – WaterAlert needs an approved project plan. Gary noted that he, Brian McCallum, and Bob Hainly will be working on this in the 3rd Quarter. We need to migrate WaterAlert to an established program.

Terri Moore – When you mention that the team is evaluating enhancements, is this the team that Brian McCallum is on? Gary responded “yes.” Terri asked how is this effort funded? Gary replied that it is OSW money and some from OWI.

WaterNow – The new WaterNow service vetted well with data chiefs.

- The WaterNow service is inspired by WaterAlert and Streammail
- The user sends email or a text message to WaterNow@usgs.gov + station number or email + station number + parameter
- Requires NO maintenance and runs a script in the background.
- Useful to the public and valuable for USGS field staff.
- The service is available now (a press release went out last week). David Boldt collects statistics on Web hits. We look to display usage statistics at a later date.

SIMS –

- Focus has been on the safety component
- SIMS element service is being tested with an April release expected
- Moving from 3 distributed servers to one national server (in Austin) plus a remote backup (in Sacramento). We have 2 servers on order at DOI (awaiting the procurement process).
- Bob Avery added that the backup server will be virtualized in California. Gary commented that it should be on hardware too. Gary noted that the intent is for there to be one more round of hardware. The hope is that we'll be ready to go to the cloud at the end of the life cycle of the servers. This will also give us more time to learn.
- Element service – within SIMS, there are about 100 data elements which are broken into 3 categories. The element service will allow the display of individual elements.
- The SMAC will have a call on March 7. Shaun Wicklein continues to move this process forward.

Gage Funding Application – (Brian Reece's project)

- 5 pilot apps are ongoing with OSW funding. A steering committee has been set up (Bob Hainly, Chair). The goal is to create a new nationwide app to evaluate and recommend the best pathway and timeline to track data collection funding and related agreement details. Committee members are Steve Berris, Gary Fisher, Georganne Gillespie, Pixie Hamilton, Bob Hainly, Eric Hensel, Kiera Hensel, Donna Schiffer, and Andy Ziegler.

Questions:

Michael Lewis – Have you quantified how much it would cost to stand this effort in a WSC? Gary commented that he will take the **action** to look this information up and follow-up with ITAC.

Bob Kimbrough – Do you find that some WSCs are trying to pick and choose certain elements and disregard the administrative side? Gary responded that he does not have much information on that. This involves collaboration between data chiefs and the administrative officer to make it work. Where it has been implemented, it has been well received.

Videoconferencing Update – Bob Avery

Due to budget constraints and travel restrictions, Terri asked Bob on our last call to investigate videoconferencing technology. Bob began by noting that WebEx, a service we are already using, has videoconferencing capability. In a conversation with Charlene Fischer, Charlene indicated that she has had as many as 40 people at one time videoconferencing by WebEx. Bob noted that this seems easy to do. Many of the videoconferencing solutions are compatible with each other so WSCs do not necessarily have to have the same solution.

Reggie Howe – Is there any indication of how much increased bandwidth is added? Bob responded that it is only the video representation that is displayed. Bandwidth (and this is nominal) is only used when the video is taken and pushed to the cloud. Scott commented that TN was at 500K (maybe 700K) with hi- definition.

Scott - Is there only one feed from WebEx? Bob - "yes," a screen display is created and passed down to those who want to watch. This is no different than a PowerPoint presentation being passed down and viewed. Scott commented that for an organization-wide implementation, we would want various levels of capability that could be purchased.

Bob also mentioned Google Hangout, however, it's not approved through Google Apps for Government (GAfG). We can do one on one sessions, but we are unable to use the multi-user capabilities. We are trying to get it hosted successfully through GAfG – this is being explored. Whatever solution we decide on will need to meet certain security requirements.

Bob commented that the CAWSC uses Polycom. There are many videoconferencing solutions – LifeSize, OmniJoin, IVCL, etc... all are cloud-based, no hardware is required, and they work similar to WebEx.

Bob offered his help with facilitation of a solution for ITAC.

Scott commented that we should look at a larger system as we move forward as a bureau. Our goal is to have two large groups communicate with each other. Scott noted that Terri has brought this up with Bill Werkheiser and Jerad Bales is interested. Scott asked if Bob can help determine where the best throughput is on the network to place a system. Bob responded that he can do that and likes the idea of a shippable system. Scott noted that this is a good time to approach this with the travel restrictions. It will be a challenge to push this through with funding cuts. Bob responded that in the interim, we can use what we have (ie. explore use of WebEx).

CARP Briefing – Joe Nielsen

We are in the process of developing a detailed project plan -- planning on a 21-month development cycle. We're working with the vendor to fill in gaps. There will be a 6-month rollout. This is not a firm timeline. If we meet this timeframe, it will put us into 2014 with rollout in November, 2014.

Sequestration may potentially affect this effort. CARP has been affected like the rest of USGS – there is limited ability to obtain funding. Gene Summerhill was able to get a waiver pushed through to get some money for this project. We have pushed about a \$.5M worth of work to next year. We are still planning around the 21 month timeframe, but this puts much risk in next year. We (USGS) and the vendor both want to get the work done. We're developing contingency plans due to sequestration and having to push work off.

CARP is asking for new travel where others are cutting travel. Meeting virtually is difficult because the CARP team is very dispersed (from Maine to Alaska) and the vendor is in Vancouver. Joe commented that things are going well and the team works well with the vendor.

System architecture and integration to NWIS – AQUARIUS will centralize databases. We are working with CIDA and are testing with Sioux Falls. We need to get our own in-house system to work on development. We are laying the groundwork for this. Once the groundwork is in place, we will test mirroring replication, security, redundancy, and fail-over capabilities.

Customization with AQUARIUS within the software – Gary Wilson (lead) is working to identify customization potentials. Reports are important to users. AQUARIUS will provide an environment where we can provide our own reports.

Data migration – Joe Nielsen (lead) is moving data from 45 databases to one site. Joe is dealing with problem data and is testing migration. The team plans to test migration at all WSCs before ever doing a real migration; ensure it all fits.

Integrate with the rest of USGS – Chuck Schalk (lead) will work to integrate the system with SIMS, WaterWatch, Water quality watch, Scripts, etc...

Integration with NWISWeb – Joe Kalfsbek (lead) will make sure it works with NWISWeb.

Training - Chuck has developed comprehensive training plans. Users are not expected to be an Oracle user, they are data managers.

Joe hopes that travel restrictions loosen up. He expects to be out on the landscape to roll this out. It is not feasible to train users virtually or via train-the-trainer. We need to be able to help at the local level to be successful.

Software development – Pat Rasmussen (lead) has identified gaps and core things that are needed for the software to work in the USGS environment. The vendor provides a demo or new build every two weeks, and USGS is tracking this process to ensure that we stay on schedule.

Joe commented that the team is hoping that the data conference will be rescheduled so that they can be a big presence there. He is planning on update webinars. He plans on being proactive in communicating with the field.

Questions –

Michael Lewis – With new software, are we taking advantage of identifying any changes in workflow and workflow models? Joe responded that the team plans on training the records workflow for all disciplines – we will be saying this is the workflow. We hope to use this as an opportunity to roll everyone back to a common structure. To do this, we need to reach out to field teams and technical offices about what common workflows should look like.

Michael – Who is the lead? Joe replied that this is part of Chuck's training plan. Gary Fisher suggested that Chuck and the CARP team may benefit from looking at the ADR survey that was recently completed. Joe responded that he will share this information with Chuck.

Kris – As far as migration, do you have any idea of the scope of work in WSCs prior to migration? Joe commented that they need to bring on a couple of good data managers (DBAs) to become experts with the migration. Joe noted that he has a short running list of issues that have come up already, noting we are early in the process. The goal is to give WSCs 6 months to clean up their data, but a "cleanup SWAT team" would arrive 3 months prior to that timeframe.

Scott asked if the 21-month timeframe is well-understood. Joe replied, yes and no, we have a good handle on the gaps in the system. We're in the process, now, of providing more detail on those gaps. The process is meant to change as it progresses.

Scott – Are you confident with the 21-month estimate? Joe responded, no, not with sequestration, this is why we are developing contingency plans.

Scott commented that this process is being well thought out, and Joe has a good team working with him.

Joe can provide future updates to ITAC as this effort progresses.

Programming Forum – (Pete Cinotto, Stewart Rounds, Gary Latzke)

Stewart Rounds and Gary Latzke demonstrated some of the many home-grown, unfunded tools that have been developed by USGS staff.

Alkalinity calculator –an on-line tool (or.water.usgs.gov/alk) to analyze alkalinity titration data (also available as a standalone tool)

- First released in January 2000 and is used world-wide
- Stewart Rounds gave a demonstration of how the web form works.
- This tool is useful for aquatic chemistry
- Documentation is consistent with the National Field Manual

Pete Cinotto – for these programs, we know what we are looking for. Is this served up from anywhere else? Stewart responded that the alkalinity calculator is only available on or.water.usgs.gov but there are a lot of links to it from other sites.

Pete – For an outside user, are these tools available in a common location? Is there a 1-stop shop for these kinds of tools? Stewart responded that the National Field Manual (water.usgs.gov/owq/FieldManual/) is the definitive source for our methods.

Data Grapher - a data graphing utility (or.water.usgs.gov/cgi-bin/grapher/graph_setup.pl) that allows the user to build graphs of data from selected USGS stations

- First released in January 2002
- A tool for data exploration – graphing and tabling time-series data
- Adds value to our data as there are a lot of different calculations that NWISWeb cannot do

What does it do?

- Graphs and tables time-series data in useful ways
- Uses instantaneous values exported from ADAPS
- Computes daily statistics and running averages
- Makes time-series graphs, XY plots, wind roses, color maps
- Compares time-series data at 1,2, or 3 sites
- Generates plots automatically or manually
- Used in 6 WSCs (OR, TN, NJ, CO, CA, NE)

Stewart demonstrated the data grapher tool. He noted that the Help tab is a good place to start if you have not used the tool before, and there are video tutorials available. Stewart also noted that he has an installation package available.

Terri commented that she finds this interesting. She just left Boise, where they had to remove the Data Grapher from the web. Michael Lewis commented that the Data Grapher was on the national vulnerability scan. The IDWSC did remove the tool, however, they would like to use it. Stewart responded that he received the same letter and went through and applied changes to filters. Stewart commented that there should be no security issues and added that David Boldt concurs. Terri suggested that the IDWSC re-install. Stewart commented that he welcomes the security folks testing the Data Grapher – there needs to be an assessment to determine if the security issues they claim are valid. Stewart will talk with the security folks.

Michael Lewis asked if this is run in the IDWSC for all continuous datasets, what is the effort? Stewart responded that there is a lengthy READ ME file, and noted that there is a bit of front-end work. It could take a few days to a week, but once in place, there is little maintenance. Updates are automatic.

Michael also commented that he envisions a time when this could be put in place nationwide through web services. Stewart responded that he has not had time to convert to using web services, but this is the direction that he would like to move. The idea is to add value to our data.

Gary Latzke – Is it possible to load and access remotely? Stewart responded that the data grapher pulls data from ADAPS and establishes local temporary copies. There are scripts that can pull data from other WSC NWIS systems. The data grapher is not optimized for a single national application.

Gary asked if the data grapher would make a good test case for Cloud? Stewart replied that he is not sure, but welcomes further discussion.

Data Quality Rating Program – this is a new program that rates time-series water-quality data qualitatively; Stewart hopes that AQUARIUS will incorporate this tool.

The program uses a UNIX script that does computations to determine estimated ratings. Stewart showed ITAC an example rating. This tool has not been announced yet.

Wisconsin Internet Mapping Team (WiM) – Gary Latzke

The mission of the WiM is to develop and implement web/mobile mapping apps and online data services for a variety of cooperators in multiple agencies. We take advantage of existing DOI contracts and make apps quickly.

- 9 employees – 6 developers, a hazards coordinator, a database manager/AO, and the program lead
- FY13 – just over \$2M in funding (only 15% from WIWSC)
- All projects support WMA activities
- Cooperators include EPA, FWS, NOAA NWS, USACE, and FEMA

Four app categories –

- Emergency response – examples include the Deepwater Horizon oil spill, Embridge oil spill (EPA), Hurricanes Isaac and Sandy; heavy involvement in the hurricane world
- Data dissemination – DOI Colorado River sources, NJ dams and reservoirs, SPARROW (Mississippi River basin), Wisconsin water conditions, National Wetlands Inventory (FWS) – hosted on Amazon as part of the Geocloud initiative
- Decision support – WI mining apps, Great Lakes mapper (SIGL) – Canada will be involved, climate change apps, Lake Michigan climate change, methyl mercury model (NPS)
- Hazards – information during and about hazards (long-term) – flood response (Ohio River and others), short term network architecture (have crews determine where to put monitoring equipment, readily available data); using REST services;
 - o Gary shared screen shots of a demo. ITAC can contact Marie Peppler for an in depth demo.
 - o Hoping to have the app out next month; testing in GAWSC first. The app will be mobile compliant.

Federal Flood Inundation Mapper – USGS, FEMA, USACE, NWS

- FEMA likes the mapper because it contains HAZUS information and this allows them to make estimates.

New development – WiM is writing an interagency agreement with DOI GIO for support of a geospatial platform and landscape decision tool.

- 3rd year of Windows administration for the Geocloud initiative
- Involved with Streamstats – taking over John Guthrie's duties (working with ESRI)
- Will have a WiM version of ESRI portal software for fast turnaround maps

Questions and discussion –

Pete commented that WiM is making underlying sciences available. With respect to the Programmer's Forum, how do we continue to promote this? Michael Lewis commented that a good start would be to host webinars / FYI sessions on these applications. Scott asked if it is a good idea to interact with others doing similar work. Is there a need for a different kind of communication? Should these apps be shared with other WSCs?

Kate commented that we are in the business of making things for the public – this is our business model. The public can take our products and package them as their own. Pete agreed but commented that the process by which we get there is different. Scott added that we are human beings. In pursuit of this, we fall to our fears of competitiveness. If there is anything we can do, perhaps we can address things that hinder the free and open exchange of products. Encouraging people to experiment within limits is a good idea. How do we get people to work openly with their colleagues? Pete commented that one goal of the forum is to get people comfortable with collaboration. Scott added that it is important to not have too much oversight. This would weaken collaboration and cause tension. ITAC should not monitor this effort. We

need to support some degree of anonymity. Pete commented that we don't want to punish people for having good ideas. Scott commented that it is important to find a way to support this activity with enough resources for people to be able to participate. It should be a forum/community that answers to itself and facilitate information exchange between others with similar ideas. Scott recommended that Pete think about developing a charter, and ultimately, create products that are freely available.

Have we ever had a workshop for folks? Kate commented that we have tried to manage software, but it has not been successful (for example, HASS and SMIG/SMIC). This worked for a while but lost commitment and support. Pete asked why with Kate responding that if standards are imposed, people get the attitude that "I did it, so it must be right." Stewart responded "that happens, and it's okay." Think about existing mechanisms or what new mechanisms might work. Maybe it is sufficient for the programmer's forum to be loosely organized. Gary Latzke responded that we have to start somewhere. Gary Fisher commented that he endorses an informal process and encourages that. He also noted that expectations are always high, and there are great ideas, but we can't do everything.

Future of the Annual Data Report (ADR) – Bob Kimbrough

Work from 2 committees to evaluate requirement for publications.

Bob reviewed the history of the ADR:

- 1903-1976 – USGS published streamflow record in Water Supply Papers
- 1962-2005 – States produced Water Data Reports (WDR), printed
- 2006 – present – National WDR report, on-line

Benefits of the water data report

- Only way to serve ancillary site information
- Included as a deliverable in agreements
- Citable as persistent and official USGS documents
- Used to evaluate the success of WSC operations
- Provides a basis for effective workflow in WSCs for approving stream records
- Provides annual integration of record periods and quality assurance review
- Documents revisions
- Effective way to publish multiple data types in a single document

The plan from Senior Staff was to evaluate the ADR through a 2-year process in FY 2013-2014. Two committees were formed in August 2012.

- WSC and HQ managers were tasked with evaluating requirements for presentation-quality data reports and unique data delivery component. The committee addressed the issues – what is needed?, is the current format effective for delivery?, and are there more effective alternatives for delivery of data? A formal email survey was developed with help from Steve Gillespie and was sent to 286 cooperators and 101 responses were received (73% from state/local government agencies, 96% provide funding for data collection, 1/3 require published data.

Other results:

Satisfaction with the ADR:

- 90% are satisfied with content, format, and usefulness of the current ADR
- 83% use the product, 33% monthly or more frequently
- 43% use it to obtain critical data not available elsewhere
- Only 6% prefer the ADR over NWISWeb

Satisfaction with NWISWeb:

- 94% use NWISWeb – 54% on a weekly basis

- 69% use NWISWeb primarily for retrieving data
- Most retrievals are for daily and peak data
- 90% are satisfied – this is on par with annual NWIS users survey

Comments that came out of the survey:

- Like the availability to print site data sheets
- ADR is value added
- Appreciate that the data are reviewed, summarized, and well-vetted
- Descriptions of the gaging sites, remarks, and estimates of extremes outside of gaging history are valuable

The second team was comprised of WSC Data Chiefs and Specialists. Their goal was to evaluate the role of the ADR in workflow management and quality assurance of data. They addressed the following questions – what are ADR-related processes? What processes are lost if we don't produce the ADR? Are there alternatives? In a survey sent to WSCs, 68% responded, 53% say the ADR is still needed, and 57% say that CRP would be an acceptable replacement (with modifications).

Current review process:

- Continuous records – 83% use CRP, 63% use annual review even if using CRP
- Discrete records – 97% use year-end review
- Station manuscript – 93% maintain some elements, 100% say that NWISWeb is the best way to disseminate data
- 27% said it is important to compile all data for a given year for a site, 53% say it is marginally important, 20% say it is not important

Committee interpretations:

- Customers need a formal data publication, but it does not have to be the traditional ADR
- Most report elements are required, but make them available through NWISWeb with modifications
- Ancillary information is still needed (mostly in existing SIMS elements)
- At least an annual retrospective review of data required to validate quality and historical consistency
- CRP can provide checks and balances that are needed
- WSCs want guidance on how to get data approved

Recommendations:

- Add a print-ready daily summary to NWISWeb that mimics the site data sheet comments
- Discontinue ADR requirement after one year of NWISWeb print-ready summary availability
- Discontinue development of new ADRP scripts after the ADR for WY 2012 is completed
- Discontinue support of ADR scripts after the last ADR
- If we change the process, prepare consistent policy from OGW, OSW, and OWQ that includes all expectations for data review prior to final approval.
- Announce retrospective overview of all approved data by April 1, if not more frequently

Needs:

- A comprehensive communication plan for USGS employees, cooperators, and the general public that explains the rationale for discontinuing the ADR and explains that the same data will be available through NWISWeb.
- To manage a library of ~150,000 site data sheets

Our findings and recommendations were presented to Senior Staff about a month ago and were well-received. Senior Staff has developed a list of questions for the committees to consider. The committee will be preparing a short report for Senior Staff in the next few weeks.

Terri commented that she gave the questions to Gary Fisher. We need answers by May. Dan Cavanaugh now says that he wants answers prior to the next Senior Staff meeting and would like weekly briefings. Bob asked what question needs to be answered with Terri responding they want a cost estimate for NWISWeb enhancements (in general numbers). Bob asked if this is related to the implementation of AQUARIUS. Terri responded no. Bob asked if they are receptive to using NWISWeb. Terri replied, yes, they just want to have a good communication plan, what resources are required, and where will we get those resources. Gary Fisher commented that he is behind the recommendations of the committee.

ADJOURN DAY 1

DAY 2

Cloud Computing – David McCulloch

David opened his presentation by referring to the marketing buzzword “cloud” versus the IT concept. David commented that the basic idea is that server resources are underused most of the time. When system designers had to purchase a server, they would purchase for maximum capacity. With cloud computing, physical servers are allocated as virtual servers. If only a certain percentage of server resources are being used, the remaining resources can be used as a virtual server. Once you have the host operating system operating as a “traffic cop,” other physical servers can be added (a physical server “farm”). David shared a diagram with ITAC and noted this is much like what Amazon does.

Why is OWI using cloud services?

- Infrastructure in Reston is poor
- Recently, USGS has been under denial of service attacks. NWIS gets around this because of their mature server structure.
- Bandwidth is an issue – folks see it as a “free good” in Reston – it doesn’t cost anything. Network bandwidth is better through the cloud.
- Most equipment in the building is slow compared to the cloud
- The cloud is more flexible. Services can be stopped and started when needed in a few minutes time.
- It’s easy to add memory in the cloud environment
- Opportunity costs – the procurement process for physical equipment takes time.
- Allows control of own backups
- Allows strict control and monitoring of services (can turn servers on and off as needed)

How did we do this?

GSA has the info.apps.gov site – a site where agencies can gather information about how Cloud Computing can help create more cost-effective IT services for the Federal Government. There is a process to go through, and services can be purchased through the GSA site. David detailed the costs associated with the OWI Applications Unit’s use of Cloud services and noted that we are looking at ways to optimize our use.

Questions –

Scott Gain – What other uses are there? Who else might be using Cloud services? David responded that there is no guidance on use of Cloud services. Some folks may fly under the radar. Gary Latzke’s group is using the commercial cloud. David has tried to get SIMS to test use of the cloud, but they are reluctant to do so. David noted that we have had a lot of positive experiences with the Cloud. Gary Fisher commented that the concerns raised by David are not technical in nature, but political as we are not sure of what we will be allowed to do in the future.

Do we know more about a Cloud Computing solution? Terri responded that a contract was awarded, but it is in protest. There is no date yet for a solution. Bob Avery commented that the CAWSC has developed its own internal cloud – he

stood up his own VM ware environment and runs 22 servers on 2 boxes (<10% memory used). He has had no downtime. David suggested that Bob give a presentation to ITAC with Scott concurring. Bob is agreeable to doing that.

Michael Lewis commented that he is interested in David's argument for cloud computing. Is Bob Avery's solution realistic? David responded, yes, it's cheaper to virtualize. Bob Avery added that virtualization also provides a safety net and added there are many pluses to using virtualization.

GIS Training Plans – David McCulloch

ITAC has had ongoing discussions about GIS. Many programs do not have staff adequately prepared to do what is needed. David commented that he hears misconceptions about where we're at and would like for this to be a discussion as much as a presentation.

USGS is one of the few DOI / Federal agencies that have no GIO or GIS coordinator. At HQ, we had a GIO but that did not work out, and there were no lessons learned. We now have the AD Core Science Systems acting as GIO. This is a similar set up to what failed before. David commented that the WMA used to have a strong GIS support system, however, those folks were pulled to GIO and are now part of AEI. There are no resources being put toward this effort.

Workforce needs:

- GIS experts - USGS has a large number of legacy GIS staff, however, most do not have an interest in learning new techniques.
- Enterprise computing / data management culture (we have not developed this expertise)
- Knowledge of how to use spatial data

Scott commented that David's observations are thought provoking. He commented that he is trying to think of reasons why we don't embrace a more strategic view of our geospatial/geographic data. Scott noted that some do not see this as our mission. We have had repeated conversations about these issues in Tennessee. David has excellent points. How do we get beyond this basic inertia?

Michael commented that the cultural aspect is interesting. Is GIS something that is centrally supported, or is it an ad hoc function? That seems to be the culture. It seems that bringing GIS to a common structure/environment is challenging. Scientists want to do this on their own.

David noted that we have done webinars on ArcSDE Personal. We need to go bottom-up to get data out. Geospatial data is no different than any other data.

David asked for suggestions on how ITAC can help guide WSCs. Scott responded that there are a number of things that we might discuss and recommended that ITAC add some action items on this issue.

Water Quality Portal – Nate Booth

The water quality portal (www.waterqualitydata.us/) is a joint USGS/EPA Office of Water project. It is a service that integrates publicly available water quality data from the USGS National Water Information System (NWIS) and EPA's STORage and RETrieval (STORET) data warehouse. The National Water Quality Monitoring Network (NWQMC) is the body that organizes this effort. The portal promotes the following NWQMC goals – collaborative monitoring and outreach, reliable and comparable data, data management and sharing, and moves us towards a national monitoring network. USGS services are refreshed every 24 hours, and STORET services occur once a week.

Nate walked ITAC through a data retrieval.

The portal is set up to be run on a tablet, is GPS enabled, and supports other tools across the water management community.

Apps and tools

- NWIS Snapshot – an add-in that gives ArcGIS users the ability to query NWIS web services and download a “snapshot” of NWIS data from the web services to a geodatabase.
- Supplies water quality data to the ACWI/SOGW National Groundwater Monitoring Network
- Provides near shore modeling support (for beach water quality forecast monitoring) – an initiative in the Great Lakes
- Environmental data discovery and transformation (EnDDaT) – Nate Booth, Laura DeCicco, David Siblec, Steve Corsi
- Models in R – led by Bob Hirsch and Lara DeCicco. The dataRetrieval package was created to simplify getting hydrologic data in the R environment. It works seamlessly with the EGRET package.

We are also working with the Open Geospatial Consortium (OGC) – an interdisciplinary, inter-agency, and international virtual observatory for water resources information for water resources information from observations and forecasts in the United States and Canada.

- Environmental Canada and EPA are partners
- Provides for cross-border hydrologic data exchange and alerts, and calculations of nutrient loads to the Great Lakes

Future Work

- Data integration – Integrate with the NHD, develop standardized analytical method metadata by working closely with NEMI. This would allow for more comparable data.
- Work with others to bring their data into the portal and identify data quality issues with existing data
- Highlight new community tools and provide a platform for WSC projects
- Develop a mapping interface and NHD-based search

Nate referred ITAC to webinars he has given about the portal.

- March 13, 2013 – USEPA webinar for tribes and volunteer monitoring groups interested in sharing data to display on the water quality portal
- October 23, 2012 – Webcast seminar – Using the new water quality portal

Questions –

Scott – What is your funding source and how many people are involved? Nate responded that the work is organized within the NWQMC. Funding is supplied by EPA, USGS (through the Ocean Action Plan) Office of Water Quality. There are approximately 1.5 FTE dedicated to this project.

Mike – Does the status of the portal put to rest the EPA issue of data now stored in STORET? Nate responded yes. He commented that he has found that EPA regions are not in sync with EPA HQ.

Web Planning – Gary Krammes

ITAC discussed possible topics for upcoming webinars.

- Gary K. noted that the MACs webinars were successful and suggested that this may be a good topic.
- Terri recommended removing Tim Lee from the list. He is hosting a bureau-wide webinar that water staff can attend.
- There was a suggestion to host GIS-related webinars. Terri asked David for ideas. David suggested a series of webinars on Python programming. **ACTION** – David will coordinate with Curtis Price and Gary Krammes on planning a GIS-related webinar.
- Gary Krammes suggested a webinar on Cloud Computing once we have a solution in place.
- Gary Krammes asked about a DBA webinar. Kris commented that they are having noon-time informal chats. In terms of formal sessions, there were to be some at the data conference, however, the conference has been postponed. Kevin Housel was working on that. **ACTION** – Kris will follow-up with Kevin and committee organizers

to see if there are any presentations from the data conference that can be hosted through the ITAC webinar series.

- Gary Fisher commented that with the sequestration, it might be worthwhile to push more webinars. This may serve as an opportunity to help morale and provide “training” opportunities.
- Terri asked if Susan had any suggestions for an NWIS webinar. Susan responded that she can see if Mike _____ can do an update; maybe do some DBA modules (Brian Reece)
- Kris Lund – basic UNIX for new DBAs may be a potential topic.
- Gary Fisher – Multiple parameters on graph (a new feature) - Lenny Orzol is the technical resource, but Gary will check with Mark Hamill.

Discussion of Web Resources –

Is there anything further that ITAC wants to do with this item? What is the status?

Scott commented that pulling together an inventory is a challenge, as is maintaining an inventory. Does ITAC want to take this on?

Gary Krammes noted that he has a small list of names, but what do we do next. Gary suggested that maybe we keep a list internal within ITAC. Terri – we will need to see if those folks are still available. We need to decide how to respond if we get this type of inquiry, and we would also need to get WSC Director approval before putting names out. Scott replied that is if ITAC is willing to keep a listing, then we need to be willing to maintain it.

ACTION – Terri asked Kim to see which Town Hall meeting generated this issue. **COMPLETE** – Found in the Nebraska Town Hall Minutes –

Comment -- I've talked to a few WSCs or offices recently that don't currently have in-house web support. It might be useful if there was a list somewhere of USGS folks with demonstrated experience using the WSC web framework who might be available for piecemeal or ongoing web work from other water offices.

Response – ITAC agreed this was a good idea and the team will be discussing how to gather the resources and the best place to post the information.

Data Relay Futures – Dan Schwitalla and Dane Ohe

Dan gave ITAC background information on telemetry. USGS' primary way of relaying data is through GOES. Dan noted that GOES continues to serve USGS well. Limitations of the system could put USGS at risk of losing its leadership role in collecting and delivering high-quality relevant data to its customers. Currently, transmissions are only one-way, therefore, it is important for USGS to act strategically to facilitate and lead a transition to new technology. Dan commented that efficiencies and cost savings might be achieved if some activities could be accomplished via telemetry rather than with site visits.

The Telemetry Technology Team (TTT) is responsible for evaluating the current state of telemetry usage in the WMA and providing a plan to move forward with new technology. The group met in Louisiana in June 2012, and they will continue with WebEx sessions through fall. They looked at what folks want and what exists. The result was a 5-year recommendation.

Dan showed a diagram of how data is transmitted from point of collection to finalization in NWIS. He noted that if a satellite system were to replace GOES, its processing would be done by the USGS Emergency Data Distribution Network (EDDN) ground station located at EROS. Non-satellite based systems would be fed directly into NWIS via LRGS.

Dan discussed strengths and weaknesses of GOES noting that it is reliable, has a low operational cost, an established infrastructure, is government owned, is good enough for most existing sites, and message traffic processing is already in place. The system has limitations, and we are looking into ways to change things. Examples include, GOES is limited in size and frequency of data transmissions, it is unstable for media transmission, 2-way communications have met obstacles, limited upgradability, and lack of supported supplemental telemetry.

- We may miss an opportunity to negotiate a large-scale national contract since WSCs are negotiating contracts individually for services from vendors. A national plan may be more cost-effective and provide more standardization of technology across Water.

Dan shared the group's five year plan noting that the group will be looking for technologies and economical solutions. Discussions are planned with our procurement specialist regarding options for a "best approach" on nationwide plan purchasing – is it best to have a WSC-level approach or national approach. Options such as setting up a Blanket Purchase Agreement for nationwide plans will be discussed. We are looking for a best all-around approach to ensure the WMA has the necessary technology to meet our goals.

Part of the 5-year plan is to develop a mechanism which will provide regular, up-to-date information on available telemetry options to the field. Currently, the most common sharing occurs by word of mouth. The TTT recommends creation of a website where new and updated information can be posted and where input from the field would be welcomed.

Questions –

Terri – What is your read on the direction to go? Dan replied that there has been no decision.

Kris – Did you collect information on what percentage of WSCs are using cellular? Dan responded yes, they got a lot of good numbers from the survey, and they want to publish the results.

Scott – Is there some point where ITAC may want to be concerned? Dan – yes, with the two-way communication. The problem is the interface. It is sensitive and a big IT security challenge. Our interface is flexible.

IT Liaison Update – Tim Brown

Tim Brown addressed the questions that ITAC members received from their constituents regarding current IT issues.

Unified Messaging Update –

Has there been any progress on archiving Lotus Mail? – Tim responded, yes, instructions have been posted on the BWTST web site - bwtst.usgs.gov/apps/collaboration/BisonConnect/archives/index.html and Paul Exter will be sending out instructions to IT ALL in the next few days.

Sharing a calendar to a mailing group – This is now possible.

Encrypting emails – There is no way in GafG to do this as there was in Lotus. Tentative guidance is that within the BisonConnect system we can send and store moderately sensitive information. We are waiting to move out of dual delivery and behind the Google spam filtering before announcing this. Dual delivery of email stops on March 11, 2013. Google Drive can be used as a work around while dual delivery is still in place.

- Tim asked what Water's need for sending encrypted mail is, reiterating that PII can be sent from Google as long as you're in GafG. Terri commented that she does not see the need to encrypt mail and asked Susan for her thoughts. Susan responded that she is not aware that we do that.

Sharing screen captures in Chat – This is not available with the version of GafG that was purchased. Google Drive can be used as a work around.

What has been the impact to the network since shifting to cloud based mail? – As far as bandwidth - it is hard to tell a measurable uptick in bandwidth because there were other changes going on in ESN at the same including upgrade of the gateway in Menlo Park and the flattening of the network. However, that being said, the external gateways do not appear to be impacted any further than they already were due to our daily use of the internet. As far as up time, we have had some outages due to other network issues as well as changes that Google has made. DOI is working to ensure Onix meets the level of uptime in the contract and ESN is working to ensure their network is now stable.

There are a number of issues. We have been told that spam will be going to Google and not the USGS network once we are using the full Google apps implementation. The Department has been given 200 issues with Google apps for government that we have identified. They are addressing the most critical issues now as these are more critical to deal with than functionality issues.

Bob Avery – Can you explain to ITAC what is going on with Google Hangout? Multiuser use of Google Hangout has been disallowed by the Department – it is a licensing issue. It can be used one-on-one. We will get an official response for ITAC.

Regarding Spam mail, we expect it to improve with two things:

- 3/11/13 – move from dual delivery of mail to Gmail and filters start working
- 3/18/13 – MX delivery is turned off
- 3/19/13 – MX delivery is transferred from Lotus to Google. This will allow Google to filter SPAM. Some SPAM might still get through. It is up to users to tune their own SPAM filters beyond what Google filters. This is no longer a bureau function.

IT Transformation Update -

What is the status of the cloud contract? – There is a protest at the GAO level. This should be resolved by the end of March. An award may come in May, but there could still be a vendor protest. David McCulloch asked if Tim can tell us who the vendor is. Tim responded that DOI has not told us. Terri commented that people are getting frustrated waiting for a solution to be put in place and will start to do their own thing even though they have been told otherwise.

Workstation ratio reduction – This initiative has resurfaced, and guidance will be coming out. There will be fields in Active Directory to code equipment as administrative, scientific, etc... The Department wants a 1:1 ratio. Scientific systems will be excluded. DOI has officially sent a memo to USGS. No guidance is being given until we have talked with the ELT.

- Nicole Bogeajis wrote exceptions to be very USGS centric, and WSCs will be asked to do things a certain way. This won't exclude a WSC having 15 laptops for training. Terri commented that many WSCs have a loaner pool of laptops. How will this be handled?
- Mike asked if there will be an audit at centers with Tim responding that he does not think so. The current effort will be on inventory and classification and will only apply to laptops and desktops.
- Bob Avery asked if we can see Nicole's document. Paul responded that he will send the link to Terri.

Telecom issues –

Network availability – We are working with DOI to address problems with service. USGS update will occur in March.

Quality of Service – Tim Lee is working through a list of sites that have requested QoS. Requests have been submitted to DOI and about 50% have been completed with about 40 sites remaining.

There will be a meeting to discuss telecom issues later this month. Tim Lee will send out information.

Other initiatives –

QR codes in AZ – AZWSC has placed QR codes on their stream gages. This allows the public to scan the code and be taken to the data page for the gaging site. Recommend barcode scanner app for Android, QR Reader for iPhone. Marc Werley is the point of contact.

Is there a requirement to put software in FBMS? – No, Paul Exter commented that he is not sure where this came from. This was only a rumor. Paul will put out a draft document. Terri commented that she will talk to Gene Summerhill.

DOI hardware and Microsoft contracts – The new HW contract and Microsoft contract are active and in place for USGS. The HW contract utilizes existing large government BPAs such as SEWP and has more options. Information can be found on the BWTST page. This no longer covers Microsoft Project or Visio.

- Terri – Do we still have home use with Microsoft? Paul responded “yes” and referred Terri to the [Microsoft Enterprise Agreement](#) page. Paul noted that the licensing model has changed.

Paul noted another transformation topic – workforce survey –

- There will be a data call about every IT position requiring a paragraph written about the work that is performed.
- A build and recruit program will be used
- Within the month, the Department wants a baseline spreadsheet/tool of every IT Specialist – the manager will have to answer about 20 questions about each person.
- USGS will be asking for an extension before sending the data call to WSCs. For most WSCs, this will not be a lot of people.
- The CAB will be briefed next week. Terri can share the ITT data call.
- Paul commented that the survey will be used to show that DOI has too many people in the IT category.

ITAC Business –

Meeting Schedule – ITAC

Scott opened discussion noting that there is no easy decision with regard to our meeting schedule. We will continue to plan on a face-to-face meeting this fiscal year. Scott commented that Linda Weiss, NMWSC, would welcome us in the summer if travel restrictions ease. This will require further discussion to determine if we have the budget to do so. ITAC concurs that they would meet in New Mexico if the budget situation improves.

- Suggested dates: week of July 15 or July 22; date will be firmed up once we get closer
- If we do not travel to New Mexico, we may plan to do a videoconference
- Regular monthly calls will continue every 3rd Wednesday.

Member replacements –

Pete Cinotto and Bob Kimbrough will rotate off ITAC in December, 2013. Pete and Bob will suggest nominations for their positions after the summer meeting. We will plan for the November/December meeting to be their last meeting and have their successors attend.

Scott asked when Michael will take over as chair. Scott suggested that he Chair ITAC through December / spring 2014 timeframe, and then Mike will take over as Chair for 2014-2015. Michael concurred. ITAC will need to consider a replacement for Scott to continue through 2015.

Reggie Howe (an IT manager) asked if he can self-nominate. Terri commented that ITAC can let Reggie know when rotations begin.

Action Item Review/Update

Lead for webinars – Gary Krammes

- David will work with Curtis Price on a Python scripting and geoprocessor webinar for GIS
- Gary Fisher will contact Mark Hamill to request Lenny Orzol do a webinar
- Kris Lund will check with DBAs

Stream View – There was no formal ITAC discussion at the meeting on Stream View. Terri has a meeting with Bob Swanson and Dan Cavanaugh on Thursday to see where this effort is heading. Terri will update ITAC on our next call.

Archiving electronic data – Kate Flynn took an action to contact Jim Kolva for an update and forward to Kim. Kris commented that WSCs are waiting on policy. Kate commented that OSW identified this as important. Mike asked if this issue is bigger than OSW with Kate responding yes, all discipline offices are involved. Mike suggested that a presentation from Jim might be beneficial as this has been an issue for some time. Kate commented that they would like to recruit and archiving task force (to include other discipline offices) that can develop a charter and work on this issue. Kate concurred that it is a good idea for Jim to update ITAC and noted that Larry Bowman is second on this. Mike recommended that a representative for OGW and OWQ attend as well. **ACTION:** Kate will ask Jim Kolva to update ITAC on our April 17, 2013 call.

Inventory of geotagged photos – Gary Fisher reported that this has not risen to the top for SMAC or SIMS. He suggested passing this on to SMAC to see how they prioritize this activity. Gary recommended keeping this on our action items list, but it will not be a near-term priority. Gary took the action to talk to Shaun Wicklein and will report back to ITAC.

Programmers Forum – Is there anything more that ITAC wants to do, or steps we need to take? We left the discussion at trying to promote communication and idea sharing amongst programmers through informal participation in the forum. We will talk to Pete on our next call.

Cloud hosting – Scott commented that we don't want to present on this until final decisions have been made. This issue will become increasingly important as we know more. We want information to be packaged so folks can use it. David will have a better answer.

ITAC Business – Next steps

Scott commented that his observations are that GIS training and management seem to be important in terms of ITAC. What role can ITAC take? David McCulloch responded that ITAC's advocacy would be great. Michael Lewis asked about the white paper David wrote. David replied that it was written two years ago. Scott commented that he will look at the white paper and talk to his staff. David commented that he will email the document.

Terri – For our next call, Kate will invite Jim Kolva to give an update on archiving electronic data. Kate will also invite representatives from OGW and OWQ to participate.

Terri asked for Bob Avery to provide an update on his videoconferencing research on the next call. Scott added that he can provide an update based on the Tennessee's use of that technology.

The next ITAC monthly call will take place on April 17.

ITAC Questions for March Meeting

Update on Mail

- Has any progress been made on archiving Lotus mail?

Yes, instructions have been posted on the BWTST web site - bwtst.usgs.gov/apps/collaboration/BisonConnect/archives/index.html - Instructions include various methods including converting to a series of .pdf files, converting to a .pst file for loading in to Outlook, uploading into Bisonconnect using imap as well as uploading into BisonConnect using YellowKea software. Paul Exter will be sending out instructions to IT ALL in the next few days.

- Sharing a calendar to a mailing group (e.g., gs-w-ia)

This is now possible.

- Encrypting emails

There is no way in GafG to do this as there was in Lotus. Tentative guidance is that within the BisonConnect system we can send and store moderately sensitive information. We are waiting to move out of dual delivery and behind the Google spam filtering before announcing this. Dual delivery of email stops on March 11, 2013. Google Drive can be used as a work around while dual delivery is still in place. There is no need for encryption after March 11, unless you are sending external to GafG. There is no DOI solution for a DOS email. It is up to each office or user. USGS does not have the mail resources to complete a solution, as we are being told to decrease our mail staff by DOI and the UM system is theirs to operate.

- Sharing a screen print within a chat

This is not available with the version of GafG that was purchased. Google Drive can be used as a work around.

- What has impact to our network been since shifting to cloud based mail system?

As far as bandwidth - it is hard to tell a measurable uptick in bandwidth because there were other changes going on in ESN at the same including upgrade of the gateway in Menlo Park and the flattening of the network. However, that being said, the external gateways do not appear to be impacted any further than they already were due to our daily use of the internet. As far as up time, we have had some outages due to other network issues as well as changes that Google has made. DOI is working to ensure Onix meets the level of uptime in the contract and ESN is working to ensure their network is now stable.

There are a number of issues. We have been told that spam will be going to Google and not the USGS network once we are using the full Google apps implementation. The Department has been given 200 issues with Google apps for government that we have identified. They are addressing the most critical issues now as these are more critical to deal with than functionality issues.

What is the status of the cloud contract?

DOI released an Indefinite Delivery Indefinite Quantity (IDIQ) solicitation. Proposals were received and evaluated, however, there is a protest at the GAO level. This should be resolved by the end of March. An award may come in May, but there could still be an after award protest.

I am hearing rumors the Department is back to pushing for one piece of equipment per employee,. Is this true or false?
Will there be waivers for field equipment?

We are also hearing rumors about the user to computer ratio, and need to know if field laptops and smartphones will contribute to the count.

This initiative has resurfaced, and guidance will be coming out. Offices will have to categorize and code their equipment in Active Directory. The Department wants a 1:1 ratio. Scientific systems will be excluded. DOI has officially sent a memo to USGS. USGS resources are on Hosting and UM and have not talked to ELT yet. No guidance is being given until we have talked with the ELT.

Is it true that software will soon be required to be entered into FBMS? Can you explain, when, why and what types of software will need to be entered.

No, this was only a rumor.

Update on telecommunications problems through Verizon lately. Can we expect more reliability?

Network availability – We are working with DOI to address problems with service. USGS update will occur in March.

Quality of Service – Tim Lee is working through a list of sites that have requested QoS. Requests have been submitted to DOI and about 50% have been completed with about 40 sites remaining.

There is a meeting to discuss telecom issues tentatively scheduled for later in March. Tim Lee will send out communication on this issue.

Updates to hardware / Microsoft contracts

The new HW contract and Microsoft contract are active and in place for USGS. The HW contract utilizes existing large government BPAs such as SEWP and has more options. Information can be found on the BWTST page. The MS ELA has been signed and completed for USGS. There have been modifications so that non-enterprise products such as Microsoft Project and Visio are not covered and must be purchased separately. The BWTST page has additional information.

QR Codes

The AZWSC has placed QR codes on their stream gages. This allows the public to scan the code and be taken to the data page for the gaging site. Recommend barcode scanner app for Android, QR Reader for iPhone. Marc Werley is the point of contact.