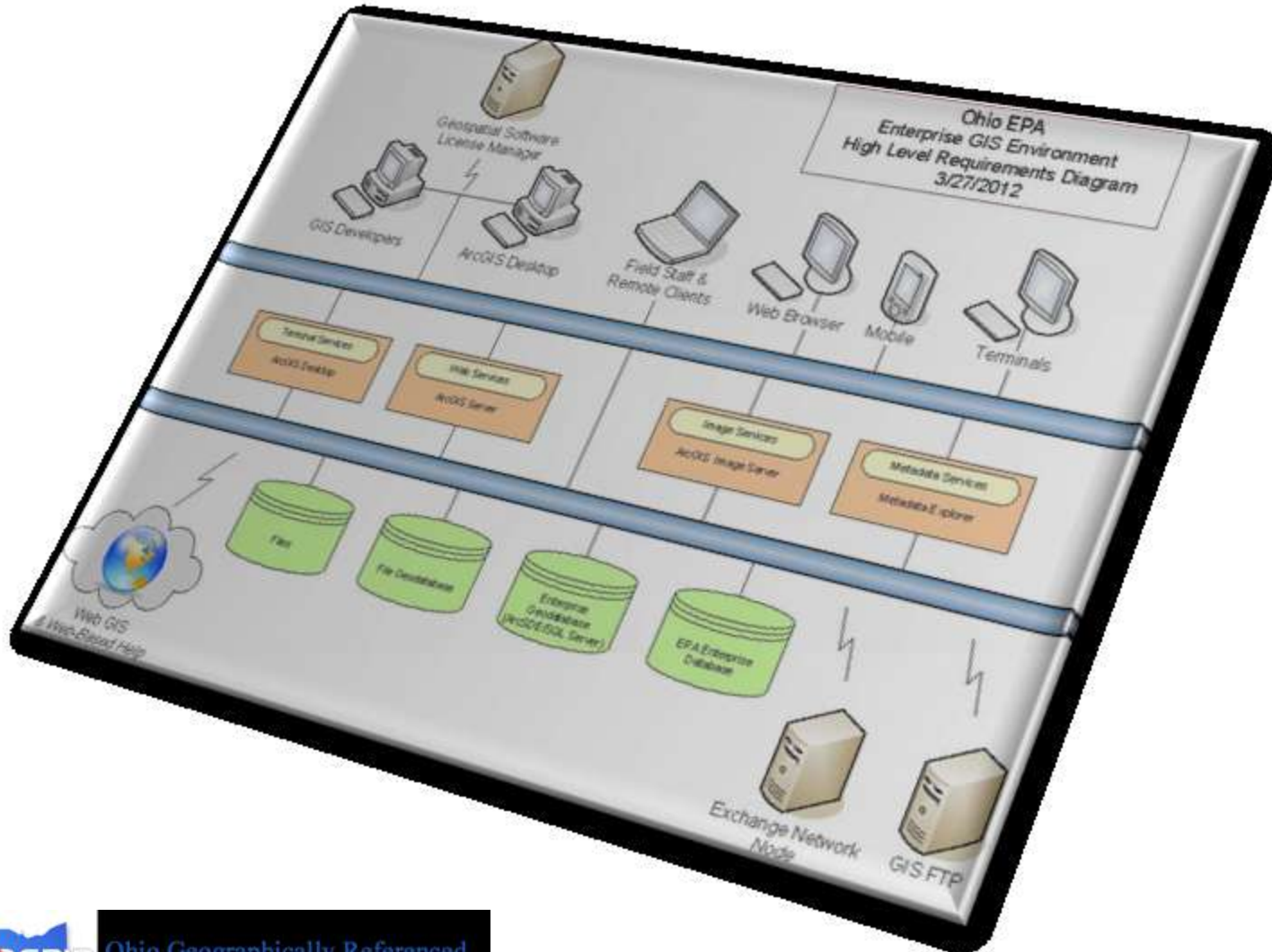




Geographic Information Systems

EN2014 – Philadelphia, PA

Centralizing GIS Services in Ohio



Ohio Geographically Referenced Information Program



Centralizing GIS Services in Ohio

- 📍 Where We Started
- 📍 Catalysts for Change
- 📍 Components of a Centralized GIS
- 📍 Project Accomplishments
- 📍 What We Learned
- 📍 Benefits Realized
- 📍 Plans for the Future



Where We Started

- 📍 **GIS Professionals** were decentralized and lacking professional development opportunities
- 📍 **Enterprise GIS** hardware was insufficient and the system had limited IT support; geospatial data were decentralized
- 📍 **GIS Users** experienced significant technical challenges and had a difficult time accessing GIS tools and data
- 📍 **Public access** to geospatial environmental information was limited and decentralized



Catalysts for Change



National Environmental Information
Exchange Network Grant

Ohio EPA leadership
In Statewide IT Initiatives

IT Optimization
INCREASE EFFICIENCY . IMPROVE SERVICE
REDUCE COMPLEXITY . REALIZE SAVINGS



Components of a Centralized GIS

Ohio EPA establishes a Memorandum of Understanding with the Ohio Geographically Referenced Information Program (OGRIP)

- 📍 **Share** resources, data, and technologies to engage in statewide GIS initiatives
- 📍 **Leverage** shared technical support and expertise
- 📍 **Realize** significant cost savings and meet grant requirements
- 📍 **Create** a roadmap for GIS consolidation



Components of a Centralized GIS

Ohio EPA GIS professionals and GIS services are centralized in the IT Services Division

- 📍 **Provide** opportunity for the GIS team to engage in professional development and technical training
- 📍 **Implement** structured processes for project management, tracking, and prioritization
- 📍 **Develop** a GIS Program, defining the strategic importance of GIS and streamlining delivery of GIS services



Components of a Centralized GIS

Ohio EPA Infrastructure optimization and modernization lead to significant enterprise changes

- 📍 **Virtualize** agency servers
- 📍 **Consolidate** agency servers to the State of Ohio Computer Center (SOCC)
- 📍 **Upgrade** networking capabilities and bandwidth (firewalls, routers, switches, new cable, etc.)



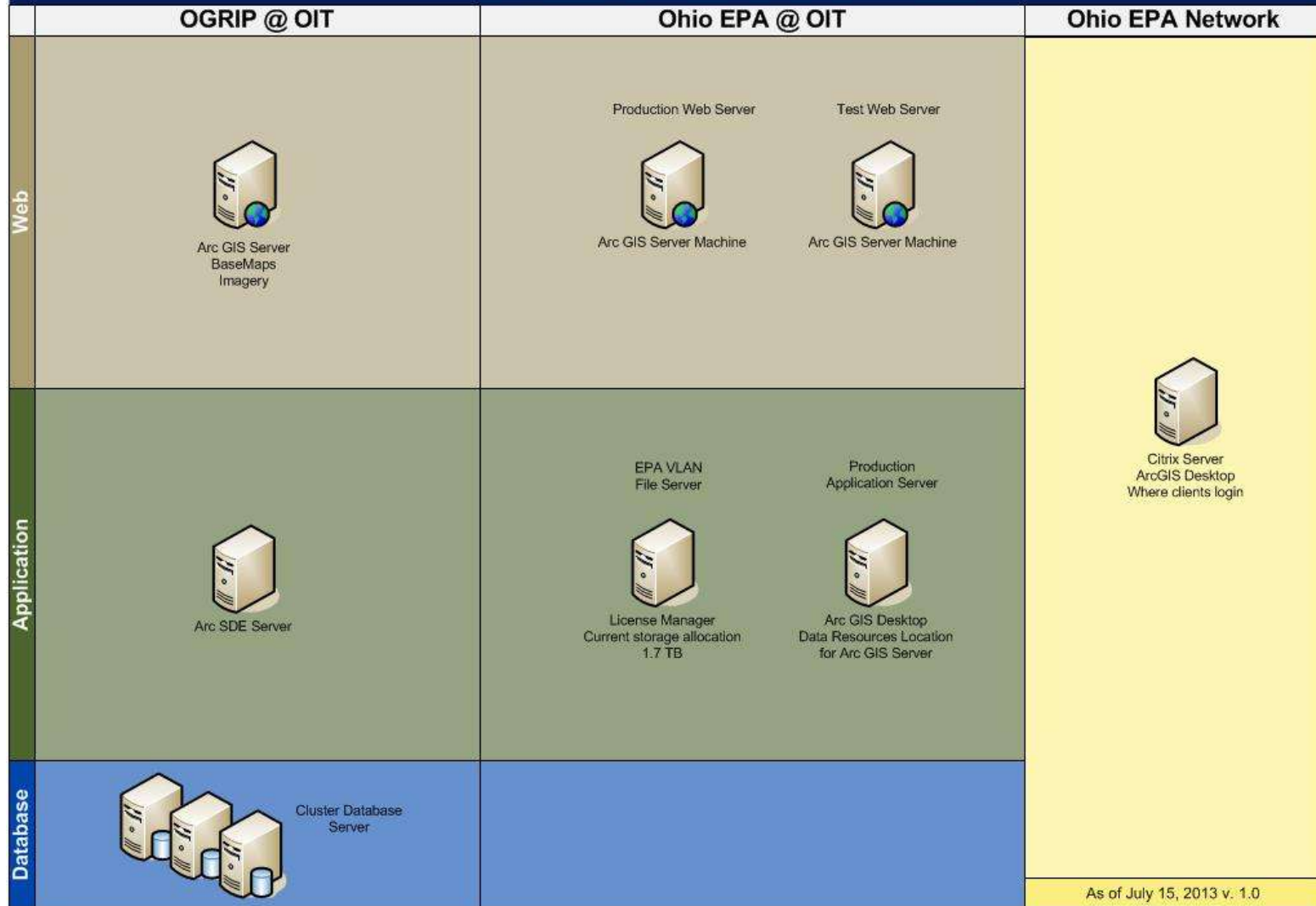
Components of a Centralized GIS

In partnership with OGRIP, Ohio EPA designs and develops new consolidated GIS Enterprise Systems

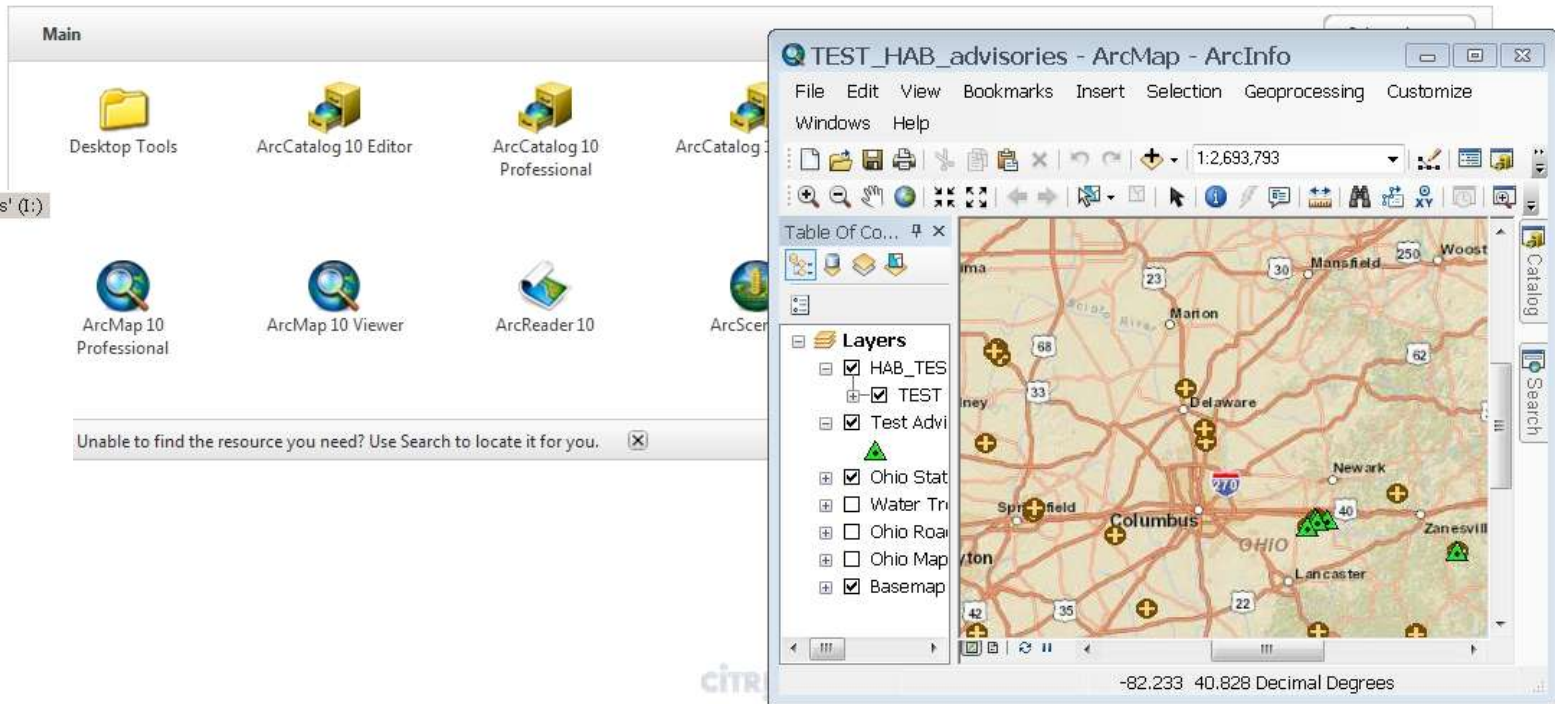
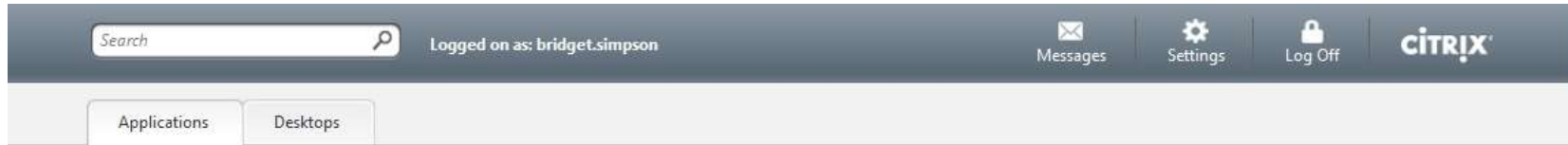
- 📍 **Web and Database servers**
 - ⊕ *ESRI ArcGIS Server 10.0 and ArcSDE 9.2 with SQL Server 2008 (Now transitioning to ArcSDE 10.2)*
- 📍 **License Manager and consolidated GIS file server**
- 📍 **Citrix server and desktop clients**
 - ⊕ *ESRI ArcMap 10.x*
- 📍 **Intranet and SharePoint communication tools**



Components of a Centralized GIS



Components of a Centralized GIS



Project Accomplishments

April
2013

May
2013

July
2013

August
2013



Implemented
GIS web portal
and services



Consolidated GIS
data and
launched GIS file
server to users



Launched Citrix
GIS remote
desktop system
to users



Shutdown of
all legacy GIS
systems
completed



What We Learned

- 📍 **Enhanced GIS capabilities** have been realized as a result of the consolidation of GIS services and resources
- 📍 **Infrastructure optimization** was necessary to support a current, complex enterprise GIS
- 📍 **GIS users are personally engaged** with GIS technology, especially during a time of significant change



What We Learned

- 📍 **Support** from our Director and CIO was essential to completing the project
- 📍 **We were successful because of hard work** by exceptional technical staff and a dedicated project team
- 📍 **The MOU is a vital tool** for current and future collaboration opportunities



Benefits Realized

- 📍 **Implemented** significant upgrades to GIS enterprise technology and systems support
- 📍 **Increased** public access to critical geospatial environmental information
- 📍 **Created** mutually beneficial partnerships with sister agencies
- 📍 **Created** a technical foundation upon which a formal GIS Program can be developed and implemented



Plans for the Future



📍 Enterprise maintenance and upgrades

📍 Metadata server



📍 Custom Applications and Services

📍 National Hydrography Dataset (NHD) Stewardship



📍 Collaboration with state and regional partners

📍 More GIS web services



For More Information

- 📍 Ohio EPA: <http://epa.ohio.gov/>
- 📍 Ohio EPA GIS: <http://epa.ohio.gov/gis.aspx>



- 📍 Interactive Web Map Portal:
<http://wwwapp.epa.ohio.gov/gis/mapportal/index.html>

- 📍 Ohio EPA GIS Web Services:
<http://epagis1.oit.ohio.gov/arcgis/rest/services>



- 📍 Ohio Geographically Referenced Information Program:
<http://ogrip.oit.ohio.gov/>



For More Information

GIS Team – Ohio EPA

Bridget Simpson 614.644.0043

bridget.simpson@epa.ohio.gov

David White 614.644.3677

david.white@epa.ohio.gov

Rich McClay 614.644.3035

rich.mcclay@epa.ohio.gov

Lap Nguyen 614.644.2803

lap.nguyen@epa.ohio.gov

Bob Ward 614.721.8690

robert.ward@epa.ohio.gov

GIS Team - OGRIP

Jeff Smith 614.466.8862

jeff.smith@das.ohio.gov

Jenn McFarland 614.644.0635

jennifer.mcfarland@das.ohio.gov

Larry Hellmer 614.387.2708

larry.hellmer@das.ohio.gov





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