

Report Format for Geographic Information Integration Projects

Category 4: 2005; Category 5 - 2006, 2007

NSDI Cooperative Agreements Program Geographic Information Integration Interim and Final Project Report Format

The goal of this category is to assist organizations and consortia to work with the USGS to make base geospatial information widely available to meet government, business and citizen needs. Please use this format to develop a brief and succinct interim or final project report, as appropriate.

Cooperative Agreement Program Number: 07HQAG0094

Project title: Western Michigan's Upper Peninsula Geospatial Outreach Program and National Map Project

Indicate whether **Final Report**

Report Date: August, 2007

Project start and end dates: April 16, 2007 – September 15, 2008

Lead project organization: Western Upper Peninsula Planning and Development Regional Commission, P.O. Box 365, Houghton MI 49931, www.wuppd.org

Project Lead: Ken Marshall, 906-482-7205 ext:318, kmarshall@wuppd.org

USGS Mapping State Liaison: Steve Aichele, 517-887-8918, saichele@usgs.gov

Collaborating organizations: (list)

City of Wakefield
John Siira
311 Sunday Lake St.
Wakefield, MI 49968

Proposed
Baraga County
911 Committee
16 N. Third Street
L'Anse, MI 49946

Houghton County
401 East Houghton Ave
Houghton, MI 49931

Data themes: parcels, recreational trails.

Project Summary

a. Describe the project; its tasks, highlights, challenges, and accomplishments. What are your approaches to overcoming impediments to participation in The National Map? Based on your experience what would you recommend for implementation and development for project success (technical, institutional and organizational)?

The overall goal of the proposed project is to better serve the geospatial information needs for local, state, and federal units of government and other service providers (non-profit, universities, private sector, and tourism) within the six county region of the Western Upper Peninsula of Michigan. These goals were supported through the following objectives and their subsequent activities.

Task 1: *Support of web mapping services activities related to the development of The National Map.*

We have completed the installation of ArcIMS and are hosting spatial data for The National Map. We currently have the City of Wakefield's Parcel Mapping in public domain and displayed on the web. Baraga and Houghton Counties have shown interest in putting their parcel data in public domain for the National Map.

Baraga County parcel mapping was completed in August of 2008 and is presently awaiting a decision from the 911 committee to place the data in public domain. Houghton County parcel data is presently going through quality control and assurance and is expected to be finished by the end of 2008. Houghton County has shown interest in placing the data into public domain.

Task 2: *Provide 30 outreach sessions to county boards, township association, city, and village commission meetings.*

We completed the outreach sessions and added Resource Conservation and Development, Regional Realtor Committee, GIS user group, and Michigan Technology University enterprise student outreaches.

The outreach session was the biggest challenge with this program. Most of all the people had to be educated in the fundamentals of GIS, the units of governments are just beginning to scratch the surface in GIS data. Despite the lack of awareness the outreach sessions went over well

within the region and I believe it was the backbone of the grant. The amount of education from the sessions to the region cannot even be measured. The biggest response and feedback was at the township level. I believe they were overwhelmed at the technology and cannot wait until it is in place. I cannot stress enough that if it wasn't for the outreach sessions, the National Map wouldn't be a success in our region.

Task 3: *Establish a regional geospatial framework organization that will meet 3 times.*

We established a regional geospatial framework organization that has met 2 times and plans to meet every six months to discuss projects and possible public domain data within the region.

WUPPDR has received a lot of positive feedback for creating the GIS user group for the region. The group consists of three federal agencies; U.S. Forest Service, National Park Service, and Natural Resources Conservation Service; one State agency, Department of Natural Resources; one County, Houghton; and one non-profit organization, Keweenaw Trust.

This group will continue to be a great benefit for the success of the National Map within the region. We have identified other GIS users within our region that will be contacted to participate in other GIS user groups. Our next meeting is set for the month of October of 2008.

Recommendations

With these three tasks: the web-mapping, outreach, and user groups, we have received good feedback with the National Map. If we continue with these three tasks the National Map in the Western Upper Peninsula, will be a success. However, it will take some patience as this area of the nation is just now creating the grassroots of GIS data. I believe more data will become available in public domain as we move forward in continuing web-mapping, outreach and user groups.

I do possibly foresee a stumbling block in the future for public domain data. Once the unit of governments' notice that GIS spatial data is in high demand for various situations they could pull the data out of public domain. The data could be sold as revenue to recoup their maintenance costs and turn a small profit. This seems to be a standard practice in the Lower Peninsula. A possible remedy would be to offer a repeating grant to cover the maintenance and administrative

costs of the data. The cost for maintaining and administrate the parcel and road centerline data for all six Counties in the region would roughly be \$40,000 per year.

b. Describe the data themes provided through The National Map. Are there any use restrictions? Are your map services and data documentation (metadata) registered in The National Map and Geospatial One-Stop? What is the status of maintaining, updating and serving themes of data that are included in The National Map? Based on your perspective and project experience describe user requirements for a national level spatial data infrastructure.

To date WUPPDR has made agreements to provide the City of Wakefield's, and the City of Hancock's parcel data and Houghton County's X-cross ski trail and hiking trails data themes to The National Map. These current data themes have no restrictions and are in public domain

WUPPDR has signed contracts with all government units involved to maintain and administrate the data. As the data gets updated it will be uploaded to The National Map and Geospatial One-Stop.

In my experience with this project I believe there should be requirements for creating data. That is, there should be some set of guidelines to follow on what base data should be used in creating layers. For an example, a lot of GIS data developers in the State of Michigan create data using different data sets. I have seen the State of Michigan frame work data forty Acre grid, section lines, or political data being used as base data. I have also seen data, which the base data source used to create the data is unidentifiable.

c. Describe the operational capability to maintain and update data through periodic updates of data made available through The National Map.

WUPPDR has a goal of maintaining and updating the data through updating fees. Currently, we have two cities and a county that have signed contracts with WUPPDR to maintain and update their GIS parcel data on a yearly basis. We are still awaiting a decision from Baraga County to be able to host the data to the National Map.

We are also currently under negotiations with Houghton County to maintain their parcel data and host on the National Map. A decision should be made by the second week in October of 2008.

d. Discuss the issues, difficulties, and challenges (both technical, institutional and organizational) that were encountered. How the CAP program can be improved.

Having to start the CAP grant soon after the grant was awarded was a difficult task. There was only a 14% chance of receiving the grant, so office work had to go on as normal until we heard further. When we found out we were awarded the grant, re-directing staff hours was a challenge since work on this grant was to be started right away.

Another problem is the Interim Report at 120 days. This technical project takes time to develop into a working process and it is difficult to give a good interim report when you are in the beginning stage of the project. I believe a midterm report would be more beneficiary to the CAP program, especially from a technical stand point.

e. Describe your relationship and issues with the USGS. Has a formal ongoing agreement been established to provide data and web services through The National Map? Describe your plans for follow-on activities. What are the terms and mutual commitment of resources? Please attach copy of written agreement if available.

Our relationship with the USGS has been great with no difficulties. The Michigan State Liaison has been wonderful and filled with information for us on the project. We have received prompt feedback on questions about the National Map and technical support.

There has been a formal agreement established to provide data and web services through The National Map. The terms and mutual commitment of resources are that WUPPDR will pursue activities related to the development and operation of web GIS and mapping services to support The National Map. Specifically, WUPPDR will use ARCIMS and ESRI Spatial Data Engine (SDE) Software to host local accurate regional level GIS data for USGS Map service Needs.

The USGS will loan ESRI software ARCIMS and SDE software products for which USGS owns the license. The software is to be used only in activities related to web GIS and mapping services that support The National Map.(See attached agreement)