



**Type of Meeting:** Quarterly Board Meeting  
**Chair:** Brad Cutler - Iowa Department of Transportation

**IGIC QUARTERLY MEETING MINUTES  
OCTOBER 20, 2010  
JOHNSTON PUBLIC LIBRARY, JOHNSTON, IOWA**

**BOARD MEMBERS:**

*Those members present are identified in **BOLD**.*

**Private Enterprise:**

**Joe Eckmann, ESRI**

Alternate: Brian Hiller

**Joshua McNary, Aerial Services**

Alternate: Walter Ertz

Matt Sorenson, Midland GIS Solutions

Alternate: Kirk Larson (**Jason Williamson**)

**Scott Sandberg, Trees Forever**

Alternate:

**Municipal Government:**

**Ellen Laughlin, City of Waterloo**

**Alternate: Herb Kuehne**

Nikki Breitsprecker, City of Dubuque

Alternate: Troy Kress

**Dave Croll (Past-Chair), City of Johnston**

Alternate:

**County Government:**

**Micah Cutler (Secretary),  
Hardin & Franklin County**

**Alternate: Megan Moeller**

**Matt Boeck, Story County**

Alternate: Adam Martin-Schwarze

**Rick Havel, Johnson County**

Alternate:

Paula Lemke, Cerro Gordo County

**Alternate: Diane Little**

**Regional Agency:**

**Bethany Wilcoxon, Des Moines MPO**

Alternate:

Eric Sanders, SIMPCO COG

Alternate:

**State Agency:**

**Chris Ensminger, Iowa DNR**

**Alternate: Patrick Wilke-Brown**

**Jon Paoli (Vice-Chair), Iowa Homeland  
Security & Emergency Management Division**

Alternate: Curt Sullivan

**Jim Giglierano, Iowa DNR**

Alternate: Casey Kohrt

**Brad Cutler (Chair), Iowa DOT**

**Alternate: Eric Abrams**

## **Federal Agency:**

**Gregg Hadish, USDA-NRCS**

Alternate: Jim Phillips

**Bob Lemen, USGS**

Alternate: Kimberlee Barnes

## **University & College:**

**Dr. Anya Butt, Central College**

Alternate: Matt Estin

**Kevin Kane, Iowa State University**

Alternate: Robin McNeely

Dr. Simon Geletta, Des Moines University

Alternate:

Christopher Seeger, Iowa State University

Alternate:

## **Community College & K-12:**

Terry Brase, Kirkwood Community College

Alternate:

Kevin Butt, Ellsworth Community College

Alternate:

## **Additional Attendees:**

Ray Willis (Polk County); Lawrence Hartpence (City of West Des Moines); Jesse Soukup (University of Iowa); Casey Kohrt (Iowa DNR); Cody Barrett (City of Des Moines); Josh Obrecht (Iowa State University); Corey Miciunas (MIDAS Council of Government); and Shawn Blaasing-Thompson (Iowa DOT)

## **Welcome-Call Meeting to Order-Approve Agenda**

Brad Cutler called the meeting to order at 10:05am. Introductions were made. Joe Eckmann made a motion to approve the meeting agenda. It was 2nd by Anya Butt. All members present voted aye.

## **Review and Approve Minutes**

Brad Cutler reviewed the July 21, 2010, Quarterly Board Meeting minutes. Chris Ensminger made a motion to accept previous meeting minutes. It was 2nd by Joe Eckmann. All member present voted aye.

## **Financial Report**

Terry Brase was not able to attend the minutes, but he submitted a Quarterly Financial Report prior to the meeting. Most of the report concerned the ESRI Statewide License for colleges and universities that is processed through IGIC. IGIC has paid ESRI and is currently receiving payments from the school. Joe Eckmann made a motion to approve the financial report and it was 2nd by Anya Butt. All members present voted aye. *The IGIC Quarterly Financial Report is attached to these minutes.*

## **Iowa Geospatial Infrastructure (IGI) - Briefing and Status of Initiative**

Jim Giglierano reported that the LiDAR has been collected for the entire state of Iowa. The entire area has been flown, delivered, and processed at least once. QC is ongoing.

The Geocoding Project is in its first year. Address data has been collected in two communities - several communities in Ida County and Greenfield in Adair County. These are communities without a local GIS dataset. These projects have been very positive GIS outreach projects and are planned to be continued next spring.

The rest of Iowa has been flown with 2-foot color imagery. It's available for download from the Iowa DNR GIS data library. There was discussion about future aerial photography collaborations.

Jim Giglierano provided a report for the current IGI projects and projected plans. *Please see the attached IGI Report documents.*

## **USGS Geospatial Liaison - Briefing and Status**

Robert Lemen gave a presentation on the reorganization of the USGS, budget cuts, and the associated impacts on USGS liaisons. Robert will be retiring at the end of the calendar year. Iowa will then be joined with Nebraska, under Jim Langtry, current Nebraska Liaison. The IGIC Board presented Bob with a

gesture of appreciation for all his hard work.

### **GIS Day and Geography Awareness Week**

Jim Giglierano and Kevin Kane reported that Iowa State University will once again be promoting GIS Day and Geography Awareness Week on November 17, from 9:00am to noon at Durham Center on the Iowa State campus. It will be streamed lived simultaneously. There is a proclamation from the Governor declaring GIS Day that will be presented.

### **2011 IGIC Conference Update**

Nikki Breitsprecker, Conference Chair, was unable to attend the meeting. Information is available on the IGIC website. Vendors are currently being contacted to exhibit. The hotel will be offering a conference room rate of \$99.00. Save the Date postcards were mailed the previous week. The online registration website has been secured and will be available soon. IGIC has a Facebook page and the committee will use it to promote the event.

### **Committee/Organizations Reports**

#### **Website/Clearinghouse Committees**

Patrick Wilke-Brown had a meeting in August for clearinghouse. There will be a Clearinghouse Committee meeting in late November or early December. Joshua Morking on a redesign based on the discussion from the last Quarterly Meeting. Patrick and Casey Kohrt will be traveling to the national clearinghouse conference in Oklahoma.

#### **Outreach Committee**

Paula Lemke was not here for a report from MAGIC. Kevin Kane reported that there will be a MAGIC Symposium retreat in Tan Tara in Missouri the weekend of November 5th.

#### **NSGIC Conference**

Eric Abrams reported on the transportation issues that were covered at the annual NSGIC fall meeting. Jon Paoli reported on the main topics, such as statewide datasets, open data policies, reducing data redundancy, etc that were covered at the conference. NSGIC does a state update every year on geospatial activities within the state and they are looking to going towards a Statewide Geospatial Maturity Assessment (GMA). They want input from states and Eric Abrams will be heading this.

#### **Health Committee**

There was no report from the Health Committee.

#### **Strategic Planning & Bylaws Committee**

Anne Packard is stepping down from chair of this committee. The bylaws state that the Past-Chair heads that committee so Dave Croll will be taking over.

#### **Geodetic Committee**

Lawrence Hartpence reported that the committee met in August. The geodetic monument project has not gone very far. An intern compiled quite a bit of data but it has not progressed much farther than that. The original vision may be scaled down to a geodetic monument website detailing what each county currently has.

There was also a discussion on low distortion projections, which retain higher accuracy than typical projections and it a necessary process for local governments if they are considering digital survey submissions.

#### **Education Committee**

There was no report from the Education Committee.

#### **Remote Sensing Committee**

LiDAR data is being processed and served online. All the raw data has been processed and available through the UNI GeoTree site. Contour data is being loaded up on the DNR GIS Library as it is generated. An RSS feed is available. All the 2-foot statewide imagery is available. The DNR is looking at creating a statewide contour dataset once the county data is done. NAIP imagery is coming in to the DNR and being loaded onto the data library.

The DNR is creating a high-resolution (1-meter) land-use cover for each county, based on several years of imagery.

### **Natural Resources Committee**

A Bedrock of Iowa map has been created and the digital layer is available online, including the color symbology.

### **Iowa Smart Planning - Briefing & Status**

Eric Abrams reported that legislation was passed last year to create the Iowa Smart Planning Task Force. There are two sides - planning and data. The recommendations so far support the creation of an Office of Planning & GIS that is housed at the state level. A report is due to the Governor's Office by mid-November. This is all at a planning level and still needs to go back to the Legislature for approval and funding. There was a discussion about IGIC's role in this planning organization. Kevin Kane made a motion that IGIC submit a letter of support and formally volunteering IGIC as the technical committee to support this endeavor. It was 2nd by Robert Lemen. All members present voted aye. This letter will initially be drafted by Kevin and submitted to the Executive Committee. It was stressed that this was all in the draft phase and highly subject to change.

### **Other Business**

#### **Orthoserver Data - ArcGIS Online**

Gregg Hadish gave a demonstration on using various online map services, such as ArcGIS.com and the Iowa Geographic Map Server at Iowa State University.

### **Next Meeting**

The next meeting is set for Wednesday, January 19, 2011, at the Johnston Public Library.

### **Adjourn**

Jon Paoli made a motion to adjourn the meeting and it was 2nd by Micah Cutler. All members present voted aye. The meeting was adjourned at 2:05pm.

Respectfully submitted,  
Micah Cutler  
IGIC Secretary

Treasurer's Report IGIC October 20, 2010

Final Income and Disbursements – FY 2009-2010						22960.26	
7/30/2009	DEPOSIT		ruralsmt	multiple	Registration for Rural Water S	630.00	\$ 23,590.26
8/3/2009	Robin Bartley	654	ruralsmt		Travel Reimbursement	(100.00)	\$ 23,490.26
8/3/2009	City of moberly	655	ruralsmt		Travel Reimbursement	(200.00)	\$ 23,290.26
8/3/2009	Dave Gausepohl	656	ruralsmt		Travel Reimbursement	(100.00)	\$ 23,190.26
8/3/2009	Marion County 911	657	ruralsmt		Travel Reimbursement	(200.00)	\$ 22,990.26
8/3/2009	Pike County Health Dept.	658	ruralsmt		Travel Reimbursement	(100.00)	\$ 22,890.26
8/3/2009	Jeanne Jennings	659	ruralsmt		Travel Reimbursement	(100.00)	\$ 22,790.26
8/3/2009	City of Jackson	660	ruralsmt		Travel Reimbursement	(200.00)	\$ 22,590.26
8/3/2009	Megan Moeller	661	ruralsmt		Travel Reimbursement	(100.00)	\$ 22,490.26
8/3/2009	Kraig Nelson	662	ruralsmt		Travel Reimbursement	(100.00)	\$ 22,390.26
8/3/2009	BJ Straw	663	ruralsmt		Travel Reimbursement	(100.00)	\$ 22,290.26
8/3/2009	Mark Deuwell	664	ruralsmt		Travel Reimbursement	(93.24)	\$ 22,197.02
8/3/2009	Shannon White	665	ruralsmt		Travel Reimbursement	(87.65)	\$ 22,109.37
8/3/2009	Pamela E. Kelrick	666	ruralsmt		Travel Reimbursement	(830.00)	\$ 21,279.37
8/3/2009	A+ Conferencing	667	orgexp	multiple	conference calls	(112.66)	\$ 21,166.71
8/3/2009	ISU GIS Facility	668	orgexp		website support	(1,200.00)	\$ 19,966.71
8/3/2009	ISU GIS Facility	669	CAP		08HQAG0062	(9,458.95)	\$ 10,507.76
8/3/2009	Electronic DEPOSIT		CAP		08HQAG0063	9,458.95	\$ 19,966.71
8/3/2009	GITA	670	USGS		GITA / ROI Project	(7,125.00)	\$ 12,841.71
8/17/2009	A+ Conferencing	671	orgexp		conference calls	(151.13)	\$ 12,690.58
9/2/2009	DEPOSIT - EDUCATION		education		statewide license fees	22,800.00	\$ 35,490.58
9/9/2009	Paula Lemke	672	orgexp		meal expenses under charged	(30.00)	\$ 35,460.58
9/9/2009	A+ Conferencing	673	orgexp		conference calls	(80.36)	\$ 35,380.22
9/9/2009	ESRI	674	Education		statewide license fees	(27,000.00)	\$ 8,380.22
9/9/2009	Deposit - USGS		USGS		Deposit for ROI grant	15,000.00	\$ 23,380.22
9/18/2009	DEPOSIT - education		Education	multiple	statewide license fees	1,350.00	\$ 24,730.22
9/21/2009	ISU GIS Facility	675	CAP		08HQAG0063	(4,736.68)	\$ 19,993.54
9/22/2009	Deposit - USGS		CAP		08HQAG0063	4,736.68	\$ 24,730.22
9/30/2009	A+ Conferencing	676	orgexp	1685111	conference calls	(18.84)	\$ 24,711.38
10/9/2009	DEPOSIT		Education	multiple	statewide license fees	9,450.00	\$ 34,161.38
10/14/2009	ESRI	677	Education	25378027	statewide license	(18,512.33)	\$ 15,649.05
10/28/2009	Kirkwood CC	678	Outreach		Eastern IA GIS Day	(250.00)	\$ 15,399.05
10/29/2009	Terrible's Lakeside Casino	679	ruralsmt	175938	Facilities for rural summit	(2,478.05)	\$ 12,921.00
11/6/2009	DEPOSIT 1 of 2		Education		statewide license fees	10,200.00	\$ 23,121.00
11/6/2009	DEPOSIT 2 of 2		ruralsmt		registrations	1,610.00	\$ 24,731.00

Treasurer's Report IGIC October 20, 2010

11/6/2009	A+ Conferencing	680	orgexp	1715898	conference calls	(159.72)	\$ 24,571.28
11/9/2009	DEPOSIT		ruralsmt		USGS support	2,625.00	\$ 27,196.28
12/4/2009	DEPOSIT		Education		Statewide License fees	300.00	\$ 27,496.28
2/10/2010	Clay County	681	ruralsmt		ruralsummit-travel reimburse	(100.00)	\$ 27,396.28
2/10/2010	Grundy County	682	ruralsmt		ruralsummit-travel reimburse	(66.08)	\$ 27,330.20
2/10/2010	Grundy County	683	ruralsmt		ruralsummit-travel reimburse	(100.00)	\$ 27,230.20
2/10/2010	Jerry Lawson	684	ruralsmt		ruralsummit-travel reimburse	(88.48)	\$ 27,141.72
2/10/2010	Cherese Sexe	685	ruralsmt		ruralsummit-travel reimburse	(88.48)	\$ 27,053.24
2/10/2010	SICOG	686	ruralsmt		ruralsummit-travel reimburse	(100.00)	\$ 26,953.24
2/10/2010	Decatur County Assessor	687	ruralsmt		ruralsummit-travel reimburse	(91.62)	\$ 26,861.62
2/10/2010	ISU GIS Facility	688	website		support for clearinghouse	(2,200.00)	\$ 24,661.62
2/25/2010	DEPOSIT		ruralsmt		Fees and MAGIC support	1,720.00	\$ 26,381.62
2/25/2010	A+ conferencing	689	orgexp	1812767	conference calls	(141.89)	\$ 26,239.73
2/25/2010	Pamela E. Kelrick	690	ruralsmt		reimbursement	(1,661.50)	\$ 24,578.23
3/29/2010	DEPOSIT		ruralsmt		rural summit - USGS support	2,375.00	\$ 26,953.23
4/13/2010	Pamela E. Kelrick	691	ruralsmt		reimbursement	(3,625.00)	\$ 23,328.23
4/13/2010	MAGIC	692			Registration fee	(400.00)	\$ 22,928.23
5/12/2010	A+ Conferencing	693			conference calls	(105.89)	\$ 22,822.34
5/14/2010	DEPOSIT				ruralsummit	34.43	\$ 22,856.77
6/8/2010	GITA	694			Iowa Map One	(2,200.00)	\$ 20,656.77
6/8/2010	J. Giglierano	695			Iowa Map One	(732.39)	\$ 19,924.38
6/17/2010	DEPOSIT 1 of 2				NAIP	1,000.00	\$ 20,924.38
6/17/2010	DEPOSIT 2 of 2				Rural Summit	634.66	\$ 21,559.04

First Quarter – Treasurer's Report – IGIC FY 2010-2011

21559.04

7/13/2010	A+ Conferencing	696			conference call	(32.98)	\$ 21,526.06
7/15/2010	DEPOSIT				NAIP	3,800.00	\$ 25,326.06
8/23/2010	A+ Conferencing	697			conference call	(202.75)	\$ 25,123.31
9/20/2010	Brad Cutler	698			NSGIC Dues (reimbursement)	(250.00)	\$ 24,873.31
9/23/2010	DEPOSIT				Statewide License	19,900.00	\$ 44,773.31
9/27/2010	ESRI	699			Statewide License	(46,000.00)	\$ (1,226.69)
10/4/2010	DEPOSIT				Statewide License	3,500.00	\$ 2,273.31
10/15/2010	DEPOSIT				Statewide License	400.00	\$ 2,673.31

# IGI and Related GIS Activities

## Status Oct 20, 2010

### Ongoing IGI Framework Data Projects

- Statewide Lidar Project – all 57k square miles of the state have been collected!!! All the data has been delivered. Initial processing to blocks is completed. Derivative products continue. Some reflights may be necessary this fall and winter.
- Iowa Geocoding Project – create address points (E911 driveway points and rooftop points) for 50 counties using \$650k from pooled technology fund
  - address points for 25 counties is goal for first year of project, many to be released by GIS Day Nov 17
  - Contract with ISU GIS facility for address points for 15 counties by December 2010 - 10 students working this summer, making good progress completed 12 counties so far.
  - Contour shape files, 3 meter DEMs and 1 meter hill shades created from lidar for all 99 counties, and most are available on the NRGIS library, to be completed by Nov 17
  - ISU GIS is setting up an ftp distribution point for IGI files which should be ready by Nov 17 GIS Day - will include orthos in state plane from the 2' statewide project, 2' contours and other data
  - DNR has called all 99 counties to inventory basic framework data layers, with results stored in Ramona tool <http://ia.gisinventory.net/>
  - Project workers from Iowa City and Ames completed a crowdsourcing GPS pilot August 10-11 in Ida County. Using handheld cameras and GPS units, we photographed buildings and addresses in the towns of Galva, Battle Creek, Holstein, Arthur and Ida Grove and sync GPS location using open source geotagging software. Ida does not have parcel polygons or address point GIS data. 13 volunteers helped out.
  - 2nd GPS crowdsourcing event held Oct 16 in Greenfield, in Adair County. Six project staff and 12 volunteers had a good time with Ginny Kuhfus, Greenfield Chamber of Commerce director.
- Collection of the 2010 2' 4-band orthos for eastern 41 counties is completed. Delivery of 2' orthos as uncompressed tiles is complete and CIR and RGB mosaics are available on the NRGIS library.
  - Dan Corbin, Inc. is again providing a horizontal accuracy assessment
- IGIC's application for \$50k to do a 2010 FGDC CAP ROI Case Study was successful. We are doing an ROI study of a public-private partnership to build and maintain the IGI, called Iowa One Map - will include ROI data from cities, COGs and utilities – with added emphasis on economic development. GITA is our major partner in this project again. Project has commenced with interviews of city GIS programs, rural electric coops and other utilities.

### New IGI Projects

- 2010 NAIP 1 meter color is currently being flown again this summer with federal funding. Iowa partners are contributing an additional \$91k for 4<sup>th</sup> infrared band. County color mosaics are currently being delivered and becoming available on the NRGIS library. 4-band deliveries unknown.
- Grant from USGS State Liaison office to DNR for updating critical infrastructure structure layers and GNIS database using geocoding products for 10 counties in central Iowa - \$50k total, started fall 2010, 2 staff persons hired.
- DNR, DOT, Homeland Security and Emergency Management, and Public Health are developing a pilot project for sharing data and web services among state agencies. The pilot project will initially provide DOT and DNR services through ITE's SOA appliance. Hopefully this will provide a basis for future IGI web services that can be used directly or within other applications.
- Pooled Technology Application for 2 FTEs for 2 years to start a state agency GIS service bureau - awarded \$320k. DNR and others will hire contractors for a service bureau to begin work this fall to begin working with state agency GIS projects. Will contract with ISU GIS facility for service bureau staff. Project to start January 2011.
- DNR is working with the Iowa Dept of Education and UI Geography Dept to published updated school district boundaries on the NRGIS library. IDE has contracted with UI Geography to update school boundaries and perform other analysis. School boundaries should be available by the end of the 2010.

## IGI Outreach

- GIS Day Nov. 17 2010 hosted by ISU and others will celebrate the progress of the Iowa Geospatial Infrastructure. Accomplishments and plans for the future will be presented in Ames and on the Web.

## Related GIS Projects

- High-resolution land cover for state – 1 meter from NAIP, leaf-off, lidar and other input layers - IGWS working on pilot, Lyon and Osceola Counties with 2007 NAIP data, 2' orthos and lidar - there may be some funding from a DNR habitat mapping effort in the near future
- Floodplain Mapping - \$15M to complete floodplain maps for the state – should create hydro-enforced DEMs, contours and hydrography layers as well as approximate DFIRMs for all Iowa counties - two staff persons hired, program manager and GIS analyst – pilot project with Iowa Flood Center for floodplain models for Poweshiek County. Contracting for DFIRMs will start later year. DNR will produce stream centerlines derived from the lidar.
- ARRA Broadband Mapping - Iowa Utility Board contracted with Connected Nation to map broadband availability in Iowa [http://broadband.iowa.gov/board\\_information/docs/Connect-Iowa-Presentation-10.02.2009.pdf](http://broadband.iowa.gov/board_information/docs/Connect-Iowa-Presentation-10.02.2009.pdf) Online mapping application was made available at the end of June. [http://connectiowa.org/mapping/interactive\\_map\\_interface/?q=map](http://connectiowa.org/mapping/interactive_map_interface/?q=map)
- ICIT Data Repository revamped - <https://www.iowagisdata.org/> Currently 21 counties have some data available in the data repository.
- DNR completed last summer the 1950's historical aerial photography layer for the state. Both 1950s and 1930s are available on the ISU Ortho server and NRGIS Library. Currently working on scanning and orthorectifying the 1960's data set, which is about 53 counties completed. Check availability in the NRGIS library.
- USGS is currently producing *The National Map* US TOPO products for Iowa this year. 99% of the state is available now at the [USGS Map Store](http://usgs.gov) Copy will be available on IGI website by Jan 2011.
- Rebuild Iowa Office (RIO) is recommending creation of a state office of planning and GIS (OPGIS) to help various groups perform "smart planning" efforts.

## Possible Future Projects

- Applying for 2011 FGDC CAP grant for metadata training, \$25k. Emphasis on creating metadata for IGI framework data layers including county GIS files on ICIT Data Repository, and state agencies data layers.

## Projects looking for funding

- NHD attribute conflation on lidar-derived stream network.
- Geocoding Phase 2 – address points for 50 or so remaining counties, applied for PT funding in July 2010, for July 2011 project continuation. Project rated 4th on list, should happen if legislature appropriates funding for PT account next spring.
- County GIS Service Bureau - 4 FTEs requiring about \$300k per year of ongoing funding

If you have any relevant progress on statewide or local framework data layers, web services, training or coordination efforts to add to this list, please contact me at [james.gigliero@dnr.iowa.gov](mailto:james.gigliero@dnr.iowa.gov)

Next update in January 2011

	Original IGI Concept 2008	Current "makeshift" IGI 2009-2011	"Refined" IGI	"Enhanced" IGI	"Smart" IGI
<b>GIS Data Layers</b>					
control	county GPS monuments maintained through county GIS SB	Lubke collection of 50+ paper and digital records of county GPS monumentation, needs conversion and management; ICEASB control point website folded after lack of progress	as is	low distortion projections defined	height modernization; geodetic advisor program
imagery	1' RGB ortho every 3 years with state, local and IFTN funding; lead by state imagery coordinator	statewide collection of 2' 4-band orthos completed (NW 2007, west 2009, east 2010) available as tiles and county mosaics; No plans for follow-on. NAIP 2010 4-band 1 m orthos delivered fall 2010. ARRA proposal for high-res buyups not funded. Historical ortho program continues to work on 1960s, 1970s and 1980s collections.	1' RGB ortho every 3 years split between state, local and private	one time 6" statewide, 1' every 3 years thereafter	6" statewide and obliques alternating every three years
boundaries	county and city boundaries aggregated by county SB	DOT city boundaries available without metadata; yearly school district boundaries added end of 2010 by Iowa Dept of Ed	add tax districts?		
cadastral	county parcels aggregated by county SB every year	IDNR PLSS layer; 2 counties in FGDC Core Parcel layer; several counties in the NO GIS list have gone ahead and built a GIS program without any outside help	add utility right of ways?		
transportation	county road networks aggregated by DOT every year	2009 Census TIGER road network w/ address ranges; FGDC CAP grant for transportation layer - DOT base map layer file available without metadata			
hydrography	streams and lakes derived from lidar and imagery created by DNR	24k NHD statewide; some local-resolution NHD derived from lidar; stream centerlines from floodplain mapping program with 4 year plan to complete state. Updated National Wetlands Inventory completed 2010.			
elevation	lidar derived contours, DEMs, hillshades with updates every 10 years; maybe 5 years in Polk and other urban counties	statewide lidar completed fall 2010; lidar derived 2' contours, 1 and 3 m DEMs, hillshades for all 99 counties available 11/17/10	add floodplain boundary data?		repeat lidar every 6 years
address points	address point for every address	state geocoding project - E911 driveway points, rooftop points			
structures	building footprint for every building	state geocoding project - rooftop points, some building footprints; USGS funding for critical infrastructure and GNIS updates; CAP grant for structures funded, built and tested structure web mapping app			
Other GIS Data		Legislative Services Bureau will perform redistricting of voter precincts, US House, and Iowa Statehouse boundaries in 2011	add new large category for Census data?		
Other GIS Data		Iowa Broadband Mapping project delivers GIS files of unserved areas.		add new large category for utility infrastructure	
Other GIS Data		DNR create high-resolution land cover data from imagery and lidar, 2009-2011.			
Other GIS Data		Iowa Utility Board creates GIS data from CAD files			
<b>Geospatial Infrastructure and Web Services</b>					
GIS Servers	redundant GIS data servers in county and state SBs				
Web Services	general mention	basemap tile cache; future geocoding service			
Clearinghouse	general mention	Iowa Geospatial Data Clearinghouse virtually unused; NSGIC/Ramona slightly used; plans for new clearinghouse based on geoportal toolkit using Geocoding resources			
<b>Coordination and Staffing</b>					
federal GIS	Imagery for the Nation program	The National Map USTopo product completed 2010; Bob Lemen, USGS Geospatial Liaison retires end of 2010, replacement uncertain			
state GIS	4 staff state SB - maintains a state GIS server, coordinator, analyst, trainer, web app programmer	Pooled Tech funding for two SB staff for 18 months, project start Jan 2011; state agency GIS steering committee started; IGI ftp service online Jan 2011, funded by geocoding project. RIO Smart Planning initiative fall 2010, for state office of planning and GIS.			
county GIS	4 staff county SB	In 2010 ICIT data repository with 21 counties providing limited data, no metadata; 2008 LGIF proposal for county SB not funded; DNR does county framework data inventory spring 2010			
city GIS	none	none		add a city GIS service bureau	
regional GIS	none	none; Rural GIS Summit 2009 in south-central Iowa			
private GIS	none	none	limited public-private partnership; private assistance funding Imagery for Iowa Program	add a utility GIS service bureau; limited to full public-private partnership	full public-private partnership
university and community college GIS		DNR contracts with ISU for state service bureau staff, geocoding and IGI data management; DNR agreement with UI Flood Center for floodplain mapping			
<b>Key concepts</b>					
	Original concept was to build nine framework layers over 10 years. Many data layers missing or incomplete, 10+ counties without GIS would form regional consortia to save on costs. Imagery for the Nation played major role in reducing costs to counties for 1' imagery. Two GIS service bureaus, one county, one state would support IGI data creation for each sector, create data library, distribute data to users, train data producers, build web services.	Significant progress made in address points, elevation and hydrography in 2010, using project funds. Pilot project for state agency GIS service bureau to run 18 months, then reapply for two more years. Some progress on starting web services.	add economic development benefits of IGI; add benefits to transmission line siting; removed IFTN and replaced with private funding	add asset and pavement management costs and benefits to cities, utilities; additional economic development benefits for knowing where infrastructure is located relative to available properties	Idea is to create GIS data layers and web services needed to refit Iowa utility infrastructure, transportation system, housing stock for "smart" technology. Based on city of Dubuque Smart City project; calculate costs and benefits of smart technology across the state