

State Geospatial Data Coordination Procedure

Colorado

Table of Contents

Table of Contents	1
Purpose of the Procedure.....	1
Default Flood Hazard Base Map for the State.....	2
Geospatial Data Coverage	2
Major State Holdings	3
Orthophotos	3
Transportation (roads, railroads, and airports)	3
Hydrography (rivers, streams, lakes, and shorelines).....	4
Political boundaries (county, municipal).....	4
Publicly owned lands (national, state, and local parks, forests, etc).....	4
Public land survey system (PLSS) (township and section lines).....	5
Cadastral (parcels).....	5
Extraterritorial jurisdiction (ETJ) boundaries.....	5
Terrain (elevation).....	5
Data Distribution Process for State Data.....	5
Federal Nationwide Geospatial Data Holdings.....	6
Finding and Accessing Other Existing Geospatial Data	6
Clearinghouses and Inventories for the State.....	6
National Digital Orthophoto Program (NDOP) and National Digital Elevation Program (NDEP) Tracking Systems	6
TED Query Tool	6
Geospatial One-Stop	7
Working with People.....	7
Useful State and Federal Contacts	7
Involving the State’s Geospatial Coordinator in Flood Studies.....	7
State Coordination Process for Building Geospatial Partnerships.....	7
Finding Local Geospatial Contacts	8
Provide Feedback on This Procedure	8

Purpose of the Procedure

Flood insurance studies search for geospatial data during pre-scoping and scoping tasks. If needed data are not available, studies might fund the collection of new data and would like to know about other organizations that might share in these costs. Detailed information about the role geospatial data coordination plays in studies is in the *Geospatial Data Coordination Implementation Guide*, which is available at <https://hazards.fema.gov/femaportal/docs/GeoDataImplem.pdf>, and in *Scoping*

State Geospatial Data Coordination Procedure

Guidelines: Pre-scoping and the Scoping Meeting, which is available through the Regional Management Center (RMC).

Resources developed through FEMA's geospatial data coordination activities provide information about data and contacts for organizations that have geospatial data that cover large areas (like states) in which many studies are interested. Studies can avoid wasting time with dead-end searches and cold calls by starting with these proven sources of information.

One resource is this Geospatial Data Coordination Procedure. It outlines sources of geospatial data and contact information, preferences for base map data and state geospatial participation in studies, and other useful information for the State.

If you have questions about this procedure or other geospatial data coordination resources, contact the geospatial data coordination lead in your Regional Management Center:

Mike Garner, Geospatial Data Coordination Lead
Regional Management Center 8
(720) 514-1105
mike.garner@mapmodteam.com

We appreciate the help of those who reviewed this document, in particular

Jon Gottsegen, State GIS Coordinator
Colorado Department of Local Affairs
303-866-3925
Jon.gottsegen@state.co.us

Date Procedure discussed: March 19, 2007

Default Flood Hazard Base Map for the State

The default base map for flood hazard maps for the State is either an image (orthophoto) or vector (road centerline) base map depending on the county being studied and the best available data at the time of the study.

Geospatial Data Coverage

Find below information about and links to statewide (and Federal agencies' national) geospatial datasets. The list is provided to save time during pre-scoping and scoping activities when building a list of candidate geospatial datasets available for the study; it is not a prescription of datasets that must be used in a flood insurance study.

State Geospatial Data Coordination Procedure

Major State Holdings

Orthophotos

Dataset name: Black and White Digital Orthophoto Quads (DOQ)

Data currentness: Varies: 1993-2004

Accuracy/Scale: 1:12,000 statewide; better for high-resolution coverage in urban areas

Ground sample resolution: 1 meter; finer for high-resolution urban areas

Horizontal datum: NAD83

Fee associated? None

Available for redistribution? Yes

Dataset source: USGS at <http://seamless.usgs.gov/>

Dataset contact: Customer Service, U.S. Geological Survey, Center for Earth Resources

Observation and Science (EROS), 47914 252nd Street, Sioux Falls, SD 54198-0001;

phone: 800-252-4547; custserv@usgs.gov

Notes: Same as National Dataset.

Dataset name: National Agriculture Imagery Program (NAIP) Imagery

Data currentness: 2005

Accuracy/Scale: 1:12,000

Ground sample resolution: 1 meter

Horizontal datum: NAD83

Fee associated? None

Available for redistribution? Yes

Dataset source: USDA at <http://datagateway.nrcs.usda.gov/GatewayHome.html>

Dataset contact: gateway@ftc.usda.gov

Notes: (1) NAIP imagery has many uses, and many states participate in NAIP. NAIP is leaf-on imagery and is not cloud-free, and so the ground might be obscured. So, while NAIP (and other such imagery) can be used as a base maps, the imagery must be checked to ensure that it provides a clear view of important features on the ground for areas of significance for flooding (see Appendix C of the Geospatial Data Coordination Implementation Guide for more discussion).

(2) The State plans to release a state GIS portal in mid-2007 through which the NAIP imagery will be available.

Transportation (roads, railroads, and airports)

Dataset name: 2006 First and Second Edition TIGER/Line Files

Data currentness: 2006

Accuracy/Scale: 7.6 meter or better (horizontal) for modernized data

Horizontal datum: NAD83

Fee associated? No

Available for redistribution? Yes

Are road names part of the dataset? Yes

Dataset source: Census Bureau at

<http://www.census.gov/geo/www/tiger/tiger2006fe/tgr2006fe.html>

Dataset contact: tiger@census.gov

State Geospatial Data Coordination Procedure

Notes: Same as National Dataset. Currentness and accuracy varies by county. Individual counties may have accurate up to date transportation file. Contact state/local GIS department.

Hydrography (rivers, streams, lakes, and shorelines)

Dataset name: National Hydrography Datasets (NHD)

Data currentness: 1999

Accuracy/Scale: 1:100,000 and 1:24,000

Horizontal datum: NAD83

Fee associated? No

Available for redistribution? Yes

Are hydrography names part of the dataset? Yes

Dataset source: USGS at <http://nhd.usgs.gov/>

Dataset contact: NHD@usgs.gov

Notes: Same as National Dataset. Currentness and accuracy varies by county. Individual counties may have accurate up to date hydrography file. Contact state/local GIS department.

Political boundaries (county, municipal)

Dataset name: 2006 First and Second Edition TIGER/Line Files

Data currentness: 2006

Accuracy/Scale: varies; as good as 7.6 meter or better (horizontal) where boundaries follow for modernized road data

Horizontal datum: NAD83

Fee associated? No

Available for redistribution? Yes

Dataset source: Census Bureau at

<http://www.census.gov/geo/www/tiger/tiger2006fe/tgr2006fe.html>

Dataset contact: tiger@census.gov

Notes: Same as National Dataset. Currentness and accuracy varies by county. Individual counties may have accurate up to date political boundary file. Contact state/local GIS department.

Publicly owned lands (national, state, and local parks, forests, etc)

Dataset name: Federal Surface Management Agency Boundaries

Data currentness: 2004

Accuracy/Scale: 1:100,000 or better

Horizontal datum: NAD83

Fee associated? No

Available for redistribution? Yes

Dataset source: Bureau of Land Management (BLM) at

<http://www.geocommunicator.gov/GeoComm/fedland/home/index.html>

Dataset contact: Office of Public Affairs, 1849 C Street, Room 406-LS Washington, DC 20240; Phone: (202) 452-5125

Notes:

State Geospatial Data Coordination Procedure

Public land survey system (PLSS) (township and section lines)

Dataset name: National Integrated Land System – Land Survey Information System

Data currentness: 2006

Accuracy/Scale: 1:100,000 or better

Horizontal datum: NAD83

Fee associated? No

Available for redistribution? Yes

Dataset source: National Integrated Land System at

http://www.geocommunicator.gov/GeoComm/lsis_home/hme/index.html

Dataset contact: Office of Public Affairs, 1849 C Street, Room 406-LS Washington, DC 20240; Phone: (202) 452-5125

Notes: Same as National Dataset. Complete coverage may vary for individual counties. Some counties may have accurate PLSS file. Contact local GIS department.

Cadastral (parcels)

No statewide coverage available. Individual counties may have accurate up to date property ownership file. Contact local GIS department.

Extraterritorial jurisdiction (ETJ) boundaries

No statewide coverage available. Individual counties may have accurate up to date ETJ file, if applicable. Contact local GIS department.

Terrain (elevation)

Dataset name: National Elevation Dataset

Data currentness: 2000-2006

Accuracy/Scale: 2.44 meter(vertical)

Vertical datum: NAVD88

Fee associated? No

Available for redistribution? Yes

Dataset source: USGS at <http://seamless.usgs.gov/>

Dataset contact: Customer Service, U.S. Geological Survey, Center for Earth Resources Observation and Science (EROS), 47914 252nd Street, Sioux Falls, SD 54198-0001; phone: 800-252-4547; custserv@usgs.gov

Notes: Same as National Dataset. Currentness and accuracy varies. Individual counties may have accurate up to date elevation datasets. Contact state/local GIS department.

Data Distribution Process for State Data

The state does not have a centralized distribution process for GIS data. Data can be obtained from the local communities' GIS department, if available. Generally, this data would be free of charge without redistribution issues if the data is to be used by FEMA for flood map modernization.

State Geospatial Data Coordination Procedure

Federal Nationwide Geospatial Data Holdings

Information about nationwide holdings and programs of Federal agencies is available from the Mapping Information Platform web site at <https://hazards.fema.gov/femaportal/docs/ProgFacts.pdf>.

Finding and Accessing Other Existing Geospatial Data

Find below information about and links to ways of searching for additional geospatial data available for the State. These capabilities can be useful for finding geospatial data other than the statewide and Federal data listed above, including those of special governments, counties and parishes, municipalities, tribes, universities, and other organizations.

Clearinghouses and Inventories for the State

The State of Colorado does not maintain an inventory of existing geospatial data. The state does have a spreadsheet of geospatial products that was surveyed at the state level, but has not been updated in several years.

A metadata clearinghouse node that has limited datasets can be searched at the Colorado Virtual Library (see <http://www.aclin.org>) by clicking on the geospatial data link. The State is organizing a new GIS portal that it plans to release in mid-2007. This new portal will replace the Colorado Virtual Library.

In addition, many city and county governments maintain GIS Data for their community and can be searched and downloaded from the individual websites.

National Digital Orthophoto Program (NDOP) and National Digital Elevation Program (NDEP) Tracking Systems

These systems allow the search of orthophoto and elevation project information entered by federal and other organizations. To access the NDOP system, go to the NDOP web site at <http://www.ndop.gov> and follow the link "Project Tracking." For the NDEP system, go to the NDEP web site at <http://www.ndep.gov> and follow the link "Project Tracking."

TED Query Tool

This tool provides access to information about Federal, state, and local government agency and private sector data holdings gathered by the Census Bureau. It is available through the geospatial data coordination lead at the Regional Management Center.

State Geospatial Data Coordination Procedure

Geospatial One-Stop

Geospatial One-Stop, available at <<http://www.geodata.gov>>, provides access to geospatial data from many sources. Two parts of the site that should be investigated are the “data categories” for existing data and the “marketplace” for data that are planned or in-work and for potential partners for new data collection activities.

Working with People

Useful State and Federal Contacts

The main contacts for the State’s geospatial activities and Federal agencies’ representatives in State are available on the Mapping Information Platform web site at <<https://hazards.fema.gov/contacts/statecontacts/contacts.asp?page=CO>>

Additional useful contacts for the State can be found at <<http://www.giscolorado.com/contacts.html>>.

Involving the State’s Geospatial Coordinator in Flood Studies

In order to participate in the FEMA flood hazard mapping effort, the State GIS Coordinator’s office prefers to be contacted in all of the following ways:

- a. Meeting at the start of each year for the state
- b. Send project list at the start of each year
- c. Conference call at the start of data discovery for each individual project
- d. Attendance of each kickoff/scooping meeting

This state already has a working relationship with the office in the state that is responsible for updating the multi-hazard maps, and they have access to their state’s flood map modernization business plan.

State Coordination Process for Building Geospatial Partnerships

The State GIS Coordination’s duties include encouraging the development of geospatial partnerships.

GIS Colorado is a private organization established to represent and foster GIS activities throughout Colorado. The object of this organization is to provide development, support, and coordination for regional GIS and related technology user groups and activities in the State of Colorado. See <http://www.giscolorado.com/>.

State Geospatial Data Coordination Procedure

Finding Local Geospatial Contacts

Local contacts, including those from special government districts (for example, a regional planning commission); counties, parishes, or equivalent governments; tribes, municipal governments; and other organizations (for example, local universities) also have geospatial data that can help a flood insurance study. Contact information is available from the FEMA archive and web searches at government link portals such as <http://www.statelocalgov.net>.

The State GIS Coordinator has a survey of county and municipal GIS contacts that will be available through the state GIS portal to be released in mid-2007.

A listing of local GIS contacts is maintained by this organization and can be found through GIS Colorado at <http://www.giscolorado.com/contacts.html>. GIS Colorado also maintains a list serve in which many state and county employees are members; see http://www.giscolorado.com/board_list.html.

Provide Feedback on This Procedure

When you find information in this Procedure or in other FEMA or State resources that are outdated, please tell the geospatial data coordination lead in the Regional Management Center what was wrong and the correct information (if you know it). Use the contact information for the lead listed in the section Purpose of the Procedure.

The lead will use your feedback to update this Procedure.