

State Geospatial Data Coordination Procedure

New Hampshire

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

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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:

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

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Default Flood Hazard Base Map for the State

The default base map for flood hazard maps for the State is an image base map (orthophoto).

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.

Major State Holdings

Orthophotos

Dataset Name: "2003 National Agricultural Imagery Program (NAIP) Imagery

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Data currentness: 2003

Accuracy/Scale: Horizontal accuracy within +/- 3 meters of reference 1:12,000-scale digital ortho quarter quads.

Ground sample resolution: 1 meter

Horizontal datum: NAD 83

Fee associated? No charge when downloaded through the Internet.

Available for redistribution? Yes

Dataset source: Complex Systems Research Center, University of New Hampshire at <http://www.granit.sr.unh.edu>

Dataset contact: GRANIT Database Manager, 603-862-1792, granit@unh.edu

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). Also see the "Federal Mapping Program Factsheets" available through "Tools & Links" on the MIP web site.

(2) For display in GIS software environments, it is recommended that users set the image stretch to "none" to achieve seamless coverage across multiple tiles within a county. The file format is MrSID, Generation 3. This image format is not supported in ArcView 3x.

Users wishing to view the *.sid files in ArcView 3x may go to

http://www.lizardtech.com/download/dl_download.php?detail=geo_avmrsid_dll&platform=win and follow the instructions provided (e.g. copy and unzip AVMrSID.dll to your Arcview32/bin directory, and invoke the MrSID extension as usual).

Transportation (roads, railroads, and airports)

Dataset name: Roads and Trails (1:24,000-scale Roads and Trails); New Hampshire Railroads at 1:24,000 Scale

Data currentness: Publication Date: 19920101 for both datasets

Accuracy/Scale: The data were generated from standard USGS 1:24,000/1:25,000-scale Digital Line Graphs, and thus meet National Map Accuracy standards for both datasets

Horizontal datum: NAD 83 for both datasets

Fee associated? No charge when downloaded from the internet. Cost of reproduction for provision on CD-ROM or other media for either dataset

Available for redistribution? Yes for both datasets

Are road names part of the dataset? No for either dataset

Dataset source: Complex Systems Research Center, University of New Hampshire at <http://www.granit.sr.unh.edu>

Dataset contact: GRANIT Database Manager, 603-862-1792, granit@unh.edu

Notes:

Hydrography (rivers, streams, lakes, and shorelines)

Dataset name: New Hampshire Hydrography Dataset: 01080103; HUC Stream; HUC Waterbodies

Data currentness: Publication date: NHHD 20030819, HUCs 20040901 for both datasets

Accuracy/Scale: 1:24,000-scale New Hampshire Hydrography Dataset (NHHD); The stream network data provides a digital representation of streams and rivers, and is based

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on USGS 1:24,000 Digital Line Graphs (DLGs). The data also includes features called artificial paths, which mark the flow of water through areal water bodies, creating a fully connected stream network; The water bodies data provides a digital representation of areal lakes and rivers, and is based on USGS 1:24,000 Digital Line Graphs (DLGs).

Horizontal datum: NAD 83,

Fee associated? No charge when downloaded from the Internet. Cost of reproduction for provision on CD-ROM or other media.

Available for redistribution? Yes

Are hydrography names part of the dataset? Yes, All names on the 1:24,000-scale reaches were validated against an April 1999 extract from the Geographic Names Information System. The entry and identifier for the names match those in the Geographic Names Information System. The association of each name to reaches has been interactively checked against the April 1999 Geographic Names Information System names extract, however, operator error could in some cases apply a name to a wrong reach.

Dataset source: Complex Systems Research Center, University of New Hampshire at <http://www.granit.sr.unh.edu>

Dataset contact: GRANIT Database Manager, 603-862-1792, granit@unh.edu

Notes: These data are a shapefile extract from the USGS's National Hydrography Dataset; see <http://nhd.usgs.gov> for more information.

Political boundaries (county, municipal)

Dataset name: New Hampshire Political Boundaries at 1:24,000 Scale

Data currentness: Publication date: 19920101

Accuracy/Scale: The data were generated from standard USGS 1:24,000/1:25,000-scale Digital Line Graphs, and thus meet National Map Accuracy standards.

Horizontal datum: NAD 83

Fee associated? No charge when downloaded from the Internet. Cost of reproduction for provision on CD-ROM or other media.

Available for redistribution? Not Disclosed

Dataset source: Complex Systems Research Center, University of New Hampshire at <http://www.granit.sr.unh.edu>

Dataset contact: GRANIT Database Manager, 603-862-1792, granit@unh.edu

Notes: The metadata from GRANIT reports that the data are not for legal use.

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

Dataset name: New Hampshire Conservation/Public Lands at 1:24,000 Scale

Data currentness: Publication Date:19860101

Accuracy/Scale: Data meet National Map Accuracy Standards at the stated scale.

Horizontal datum: NAD 83

Fee associated? No charge when downloaded from the internet. Cost of reproduction for provision on CD-ROM or other media.

Available for redistribution? Yes

Dataset source: Complex Systems Research Center, University of New Hampshire at <http://www.granit.sr.unh.edu>

Dataset contact: GRANIT Database Manager, 603-862-1792, granit@unh.edu

Notes: The development of this data layer was initiated in the early 1990's as a collaboration between the Society for the Protection of NH Forests (SPNHF), the NH

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Office of State Planning (OSP), and the Complex Systems Research Center at the University of New Hampshire (CSRC). While the methodologies used to develop the data set have evolved over a period of years, the basic approach has remained relatively constant throughout this period. As of 2001/2002, the entities responsible for the development of the data set include: OSP (collection, compilation, and automation of state/federal lands), the regional planning agencies (collection, compilation, and automation of municipally-managed parcels), SPNHF (collection and compilation of Forest Society Lands), and CSRC (collection, compilation, and automation of all other protected lands, and integration of all contributions into a seamless, statewide data set). The process starts with the collection of source information (PARCELSOURCE) from agencies protecting/managing parcels in the state. Protecting agencies typically include state/federal organizations, county/municipal agencies, land trusts, watershed associations, and other non-profit organizations. The protecting entity is asked to provide the best available source map, and the associated descriptive information, to the organization responsible for parcel compilation (SPNHF, OSP, an RPA, and/or CSRC).

Extraterritorial jurisdiction (ETJ) boundaries

Dataset name: NH Wildlife Actin Plan 2005: Coastal islands

Data currentness: Publication Date: 20051001

Accuracy/Scale: Information not provided

Horizontal datum: NAD 83

Fee associated? No

Available for redistribution? Yes

Dataset source: Complex Systems Research Center, University of New Hampshire at <http://www.granit.sr.unh.edu>

Dataset contact: GRANIT Database Manager, 603-862-1792, granit@unh.edu

Notes: New Hampshire does not indicate any ETJs; nevertheless this dataset would be as pertinent as if it were identified as such. The New Hampshire Fish and Game Department (NHFGD) has worked together with partners in the conservation community to create the state's first Wildlife Action Plan (WAP). The plan, which was mandated and funded by the federal government through the State Wildlife Grants program, provides New Hampshire decision-makers with important tools for restoring and maintaining critical habitats and populations of the state's species of conservation and management concern. It is a proactive effort to define and implement a strategy that will help keep species off of rare species lists. For more information about the NH Wildlife Action Plan, please see the files [wapexecsummary.pdf](#) and [wapplannershandout.pdf](#). Development of this coverage provides general coastal island locations within the state of New Hampshire.

Terrain (elevation)

Dataset name: Digital Elevation Model

Data currentness: 19790701 to present

Accuracy/Scale: 7 meter RMSE or better; the header record provides the accuracy measured.

Vertical datum: Not Provided

Fee associated? No charge when downloaded from the internet. Cost of reproduction for provision on CD-ROM or other media.

Available for redistribution? Yes

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Dataset source: Complex Systems Research Center, University of New Hampshire at <http://www.granit.sr.unh.edu>

Dataset contact: GRANIT Database Manager, 603-862-1792, granit@unh.edu

Notes: USGS elevation data that have been reprocessed and are distributed by the State.

Data Distribution Process for State Data

Downloadable electronic data is available for download from GRANIT's website at http://www.granit.sr.unh.edu/cgi-bin/load_file?PATH=/data

Ordering instructions for data provided on media: Email GRANIT (granit@unh.edu) or order from web site at <http://www.granit.sr.unh.edu>. The turnaround is two weeks.

Digital data in NH GRANIT represent the efforts of the contributing agencies to record information from the cited source materials. Complex Systems Research Center, under contract to the NH Office of State Planning, and in consultation with cooperating agencies, maintains a continuing program to identify and correct errors in these data. OSP, CSRC, and the cooperating agencies make no claim as to the validity or reliability or to any implied uses of these data.

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 New Hampshire Geographic Information System (NH GRANIT) is a cooperative project to create, maintain and make available a statewide digital geographic data base serving information to state, regional and local government decision-makers. The NH GRANIT Data User Guide is available at http://www.granit.sr.unh.edu/cgi-bin/load_file?PATH=/data/userguide.html. [Section I](#) of this Users Guide provides an overview of NH GRANIT (Geographically Referenced Analysis and Information Transfer), including its objectives, participating agencies, organization, and general characteristics. [Section II](#) presents standards governing the creation and updating of the

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data base layers. [Section III](#) presents the procedures for obtaining access to NH GRANIT data.

A companion document, [NH GRANIT Data Catalog](#), describes each of the available digital data layers and its status.

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.

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=NH>.

Of special interest are:

New Hampshire Office of Energy and Planning (NH OEP) – The GIS program of NH-OEP has two main functions. First, the program provides mapping support and geographic analysis to other programs in the office. Second, the program develops particular geographic data layers for the statewide GRANIT project and provides guidance to GRANIT through its position as coordinator of the statewide GIS Advisory Committee. See <http://nh.gov/oep/programs/GIS/index.htm> for more information.

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New Hampshire Geographically Referenced Analysis and Information Transfer System (NH GRANIT) – GRANIT is a cooperative project to create, maintain, and make available a statewide geographic data base serving the information needs of state, regional, and local decision-makers. The core GRANIT system includes a geographic database, hardware and software to build, manage, and access the database, and a staff of experts knowledgeable in geographic information systems, image processing, and computer analysis. In addition to database development and maintenance, the GRANIT staff offers a range of application development, training, and related technical services to GIS users in the state and the region. See <http://http://www.granit.sr.unh.edu> for more information.

USGS New England Mapping Partnership Office – The USGS partnership program is the geospatial liaison between the USGS and the New England States. The office is responsible for New Hampshire and other New England states.

Involving the State's Geospatial Coordinator in Flood Studies

In order to participate in the FEMA flood hazard mapping effort, this office prefers to be contacted in all of the following ways:

- a. Send project list at the start of each year

New Hampshire's Geospatial Coordinator already has a working relationship with the office (GRANIT), a cooperating technical partner (CTP), that is responsible for updating many of the multi-hazard maps, and they have access to their state's flood map modernization business plan.

GRANIT is also the repository for the DFIRMs, which can be downloaded from their website. The RMC is in regular contact with them to discuss any issues related to Map Modernization.

State Coordination Process for Building Geospatial Partnerships

The NH GIS Advisory Committee was established in 1987 as a sub-committee of the Governor's Council on Resources and Economic Development (CORD). The Committee was formed to coordinate mapping and GIS-related activities of the members, and to recommend policies, standards, and related measures to CORD for endorsement and implementation. The Committee meets regularly, and has drawn into its membership representatives of all state agencies actively involved in mapping, as well as representatives of several federal agencies, regional planning agencies, and the University of New Hampshire. For more information see http://www.granit.sr.unh.edu/cgi-bin/load_file?PATH=/about/giscomm/index.html.

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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>.

All of the regional planning commissions (RPC) in New Hampshire provide GIS services to their member communities. The RPCs in New Hampshire and their websites are listed below.

- Southern New Hampshire Planning Commission, <http://www.snhpc.org/GIS.html>
- Rockingham Planning Commission, <http://www.rpc-nh.org/index.html>
- Central New Hampshire Regional Planning Commission, <http://www.cnhrpc.org/>
- Strafford Regional Planning Commission, <http://www.strafford.org/mappinggis.htm>
- Southwest Region Planning Commission, <http://www.swrpc.org/data/>
- Lakes Region Planning Commission, <http://www.lakesrpc.org/>
- Nashua Regional Planning Commission, <http://www.nashuarpc.org/>
- North County Council, <http://www.nccouncil.org/>
- Upper Valley Lake Sunapee Regional Planning Commission, <http://www.uvlsrc.org/>

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.