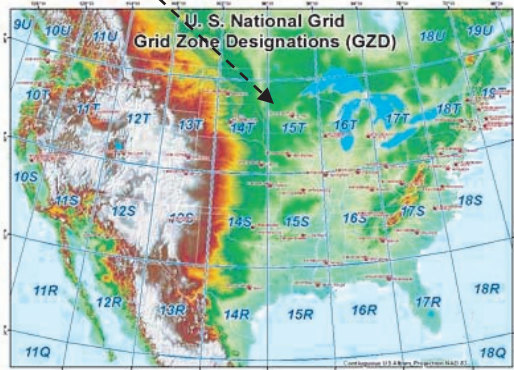


## The USNG at a Glance

Normally, the USNG uses a string of up to 15 characters to describe a precise location. The first three characters correspond to a zone designation. The next two letters indentify the 100,000 meter grid. In the example below, the last ten digits pinpoint a one square meter area located within a 1,000 meter grid.

15T VK 83 399 53 353



100,000 m-grid designation VK with 1,000 m-grid lines for a portion of Apple Valley, MN

## Contact Information



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<http://www.mngeo.state.mn.us/committee/emprep/index.html>

## The U.S. National Grid



Wadena, MN an EF4 tornado struck on June 17th— The metal roof of the city community center was twisted and blown 4 city blocks! Photo courtesy of FEMA/Michael Mancino

On June 17, 2010 deadly tornadoes swept across Polk, Otter Tail, Freeborn and Wadena counties in Minnesota creating a wide path of death and destruction. In a major emergency like this, spatial interoperability between state, local and federal emergency responders is required — even if street signs and landmarks are destroyed, or if the emergency is in a remote area. Impossible? Not with the U.S. National Grid (USNG)!

The USNG:

- Is easy to use
- Provides a universal location reference system that is not dependent on landmarks or street signs
- Enables EMS responders to quickly locate and respond to the emergency

## The USNG at a Glance Accessing Printable Maps

The USNG is a standard grid reference system which quickly enables multi-agency and multi-jurisdictional EMS to precisely locate incidents using paper maps and/or electronic applications. It's recognized nationally and by the State of Minnesota as a standard cartographic tool that:

- Universally defines geographic coordinates and facilitates fast, unambiguous and repeatable means of communicating locations
- Enables easy and precise calculations between two locations
- Is easy to learn how to use
- Can be viewed and downloaded from many locations

The following websites provide training and access to free, printable USNG maps including GeoPDF\* enabled files:

- MnGeo's MN USNG Map Finder: [www.mngeo.state.mn.us/USNG/maps.html](http://www.mngeo.state.mn.us/USNG/maps.html)
- USGS National Map Viewer: <http://viewer.nationalmap.gov/viewer/>
- Dakota County Fire Map Books: <http://gis.co.dakota.mn.us/content/dakco/usng/1kfireortho/maps.htm>

\* The GeoPDF extension is a trademark of TerraGo Technologies. GeoPDF files enable users to share geo-referenced maps and data in Adobe PDF documents. Download a free Adobe Reader GeoPDF plug-in at: [www.prospatial.com/geopdf.html](http://www.prospatial.com/geopdf.html)

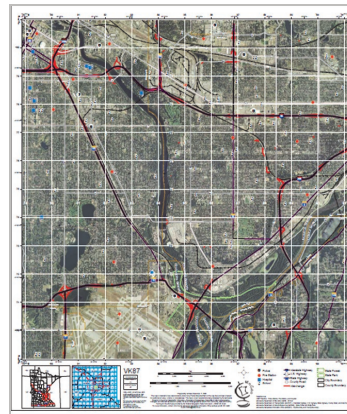
## Query and Print USNG Maps Online



quered online and downloaded using MnGeo's MN USNG Map Finder.

By zooming to and clicking on an area of interest, the 10K USNG grids are identified and can be then be downloaded. All maps (2,000+) conform to the FGDC standard for the USNG (FGDC-STD-011-2001) and are fixed at a scale of 1:24,000 yielding a print size of 22 by 24 inches. Visit our website and download your USNG map today:

[www.mngeo.state.mn.us/USNG/maps.html](http://www.mngeo.state.mn.us/USNG/maps.html)



Funded by a 2008 FGDC CAP grant, MnGeo and the Emergency Preparedness Committee collaborated to produce standardized USNG 10K grid based maps in a PDF format that can now be

## Why the USNG?

- USNG is based on the Military Grid Reference System (MGRS), a world-wide system used by the U.S. and NATO Armed Forces for over 50 years.
- In May 2009, FEMA Director Fugate set agency-wide implementation of the USNG as a near term priority.
- The National Search and Rescue Committee designated the USNG as the primary system for conducting land based search and rescue.
- US-Topo, the new topographic map series from USGS, incorporates the USNG as the primary reference system.
- The National Geospatial-Intelligence Agency will only produce USNG based products for U.S. disaster events.
- GPS units are available with USNG as a selectable display, while others incorporate it through the display of MGRS in the NAD83/WGS84 mode.



For MORE INFORMATION, EXAMPLES and TUTORIALS on the USNG visit:

- EPC: [www.mngeo.state.mn.us/committee/emprep/download/USNG/index.html](http://www.mngeo.state.mn.us/committee/emprep/download/USNG/index.html)
- Dakota County: <http://gis.co.dakota.mn.us/content/dakco/usng/1kfireortho/maps.htm>
- Rice County: <http://beacon.schneidercorp.com/?site=RiceCountyMN>