

## Mapping Requirements for Permit Applications

Permit applications must be accompanied by digital maps and associated metadata (see [New Jersey Safe Drinking Water Act rules](#) under N.J.A.C. 7:10-11.5(c)6). This rule supports the Department's long term planning, disaster response, master plan development, and updating of its water service area layer in its geographic information system (GIS). Even if you have an approved permit, you still need to submit GIS data. Failure to respond may result in revocation of permits, deficiencies with future applications and possibly enforcement action.

Very few people in the Division of Water Supply & Geoscience can access detailed data on water system components, to ensure its confidentiality (for more information, contact our security expert at 609-292-2957).

DEP will send an approval letter to notify you that the GIS submission has been accepted. Submissions and re-submissions (i.e., after you receive a deficiency letter from a GIS reviewer) will be processed as soon as possible. If you have specific questions on your deficiency letter, contact the reviewer directly. For other questions, contact 609-292-2957.

### Format

DEP Mapping and Digital Data Standards are at <http://www.nj.gov/dep/gis/njdepstandards06.pdf>. You may use 2002 Orthophoto tiles (Aerials) ([http://njgin.nj.gov/OIT\\_IW/index.jsp](http://njgin.nj.gov/OIT_IW/index.jsp)) in combination with Roads (TIGER) (<http://www.nj.gov/dep/gis/tgr2000shp.html>) to create a digital data set for your water system. CAD files can be used; acceptable formats appear in sections 6.0 and 6.1 of the Mapping and Digital Data Standards (pp. 11-12). You can digitize your old paper maps as long as the electronic file is in an acceptable format and mapping meets the 1:12000 scale requirement.

The five required items for existing and proposed areas—we ask that you provide as much information as possible—are as follows:

1. Distribution System (pipes [including sizes; pipe material information is desirable, but not required if not readily available], interconnections and pump stations; hydrants and valves are not required)
2. Sources (wells, intakes, interconnections)
3. Storage Tanks
4. Treatment Plants
5. Service area - defined in N.J.A.C. 7:10-11.5(c)6 as the geographical area within which a water system operates for the provision of water.

Thus you would submit polyline (#1), point (#2-4), and polygon (#5) data, each labeled in the attributes tables (e.g., wells, storage tank names, size of mains), and each accompanied by a metadata file. We prefer but do not require removal of extraneous information before submittal; if you include such data (e.g., curb lines, trees), document them in the metadata.

For Department information on metadata, see <http://www.nj.gov/dep/gis/metastan.htm> and <http://www.nj.gov/dep/gis/faqmeta.htm>. Free metadata tools are available at <http://sco.wisc.edu/wisclinc/metatool/>. A generic metadata checklist will help confirm you have included all necessary data (<http://www.nj.gov/dep/gis/metahelp.htm>, 5th bullet point).

Metadata are vital to DEP understanding what you are submitting. The Department will not make assumptions on what information is in the submission. Describing in the metadata what is being submitted helps the Department identify if all required items are included, and thus help you avoid receiving a deficiency letter on grounds that data were not submitted.