

ATLANTIC COUNTY GOVERNMENT

JOB ANNOUNCEMENT

PLEASE POST

Posting Date:

Closing Date:

TITLE: Geographic Information Systems Specialist Trainee

SALARY: \$30,887 - \$34,657

Hours: 40 X 35 ___

DEPARTMENT: Planning

Union ___ Mgmt X ___

LOCATION: Northfield

NJCSC Test Required: Yes ___ No X ___

Grant Funded: Yes ___ No X ___

Note: Applicants must provide a copy of college transcripts. If degree is in Environmental Studies, transcripts must be included with application for consideration.

DEFINITION:

Under close supervision of a higher level Geographic Information Systems (GIS) Specialist or other supervisory official, learns and/or assists in professional GIS work relating to geographic analysis of environmental parameters and/or other factors, image processing, interpretation, and application of geographic data digitizing; operates all computer hardware/software associated with the GIS; does other related duties.

NOTE: The examples of work for this title are for illustrative purposes only. A particular position using this title may not perform all duties listed in this job specification. Conversely, all duties performed on the job may not be listed.

REQUIREMENTS:

EDUCATION:

Graduation from an accredited college or university with a Bachelor's degree in Geography, or Environmental Science including or supplemented by twelve (12) semester hour credits in computer mapping/GIS which shall have included spatial programming and digital image processing.

NOTE: A Master's degree in one of the above disciplines including or supplemented by the additional credits as shown may be substituted if the applicant holds a Bachelor's degree in another field.

LICENSE:

Appointee will be required to possess a driver's license valid in New Jersey only if the operation of a vehicle, rather than employee mobility, is necessary to perform essential duties of the position.

EXAMPLES OF WORK:

Learns and/or assists in data acquisition, data reformatting and application of GIS and image processing software i.e. assigned classifications, feature enhancement, area calculation) for application to agency projects, activities, and issues.

Prepares and verifies maps for digitization.

Performs geographic data digitization and conventional data capture.

Maintains plotter supplies and notifies supervisor when supplies need to be reordered.

Learns and/or assists in integration of satellite-acquired data with the GIS for analysis of spatial distributions and display of results as computer-generated maps and/or photographic images.

Learns and/or assists in data acquisition, taking measures to ensure quality control of conventional data capture; and in the design of coding conventions, ensures compatibility with geographic files, and instructs users in data entry and editing procedures.

May assist in coordination of the creation of SAS data bases from reformatted data files.

Learns and operates the GIS and all associated hardware/software to display results of computer analysis which cannot be economically prepared with conventional cartography by applying cartographic principles in the production of finished maps.

Learns and/or assists in the geographic analysis of the spatial distribution of environmental contaminants which may affect public health and traffic generations which may affect the public.

Learns and assists in use of image processing packages and other software on color graphics computer systems to interpret remote sensing data from satellites to solve problems in specific program areas.

May assist in procurement of data, preparation for machine coding, editing to ensure accuracy of machine-readable data, and in verifying resulting data.

May assist in application of mathematical analysis of computer color videographics to ensure correct and effective use of color in the production of maps/graphs.

Provides hardware/software support for the GIS including training and assisting system users.

Learns and assists in the operation of a color graphics display computer as it is simultaneously linked to time-sharing computers to produce maps and remote sensing images.

May assist in designing layout/features of all map, graph, and chart output products from the GIS using both computerized and manual cartographic techniques.

Learns and/or assists in research on modeling, computer graphic, and mathematical mapping techniques made possible by the GIS, and relates these directly to information needs.

Maintains base map collection and library, and conducts file management for digitized data.

Prepares technical reports and correspondence.

Will be required to learn to utilize various types of electronic and/or manual recording and information system used by the agency, office, or related units.

KNOWLEDGE AND ABILITIES:

Knowledge of cartography including mathematics of scale and projection transformation.

Knowledge of geography and its applications to GIS.

Knowledge of manual map/chart/graph preparation including graphic display, layout/design, and various techniques such as scribing, inking, leroy lettering, and peel coat.

Knowledge of computerized data entry and formatting, data base management, and data base utilization.

Knowledge of all phases of computer map preparation, digitization, data transmission, and data reformatting.

Ability to use computer operating systems including logon, logoff, system editor, moving between directories, listing directory contents, copying and deleting files, and listing printouts.

Ability to learn to utilize specialized computer graphics hardware such as various plotters, vector scan terminals, raster graphics displays, microcomputers, and identify their advantages/disadvantages for production of specific map types.

Ability to use state-of-the-art graphic reproduction methods including slide preparation, diazo processing, PMT camera, photographic enlargement/reduction, compugraphic lettering, and film development techniques after a period of training.

Ability to understand techniques of computer image processing and map categorization of remote sensing data from aircraft and earth satellites.

Ability to assist in work using different operating systems and database software utilized by a geographic information unit while pursuing complex geographic research.

Ability to work with environmental quality and natural resource data.

Ability to handle routine computer graphic hardware/software problems under guidance from a higher level GIS specialist.

Ability to transfer data from one operating system to another.

Ability to utilize various types of electronic and/or manual recording and information systems used by the agency, office, or related units.

Ability to read, write, speak, understand, and communicate in English sufficiently to perform duties of this position. American Sign Language or Braille may also be considered as acceptable forms of communication.

Persons with mental or physical disabilities are eligible as long as they can perform essential functions of the job after reasonable accommodation is made to their known limitations. If the accommodation cannot be made because it would cause the employer undue hardship, such persons may not be eligible.

ADVANCEMENT

Appointees who successfully complete the 12-month training period will be eligible for advancement to the title of Geographic Information Systems Specialist 3 under Department of Personnel procedures.

The inability of an employee in this trainee title to attain a level of performance warranting advancement to a title listed above shall be considered as cause for separation.

**Interested, qualified applicants should apply online at www.aclink.org
Alternatively, applications may be mailed to the
Atlantic County Division of Human Resources
1333 Atlantic Avenue, Atlantic City, NJ 08401
- We are an Equal Opportunity Employer -**