

State of Michigan
Civil Service Commission
Capitol Commons Center, P.O.
Box 30002
Lansing, MI 48909
POSITION DESCRIPTION

This position description serves as the official classification document of record for this position. Please complete this form as accurately as you can as the position description is used to determine the proper classification of the position.

2. Employee's Name (Last, First, M.I.)	8. Department/Agency
	Environment, Great Lakes and Energy (EGLE)
3. Employee Identification Number	9. Bureau (Institution, Board, or Commission)
4. Civil Service Position Code Description	10. Division
Student Assistant	Water Resources Division
5. Internship Working Title	11. Section
Hydrogeologist Intern	Permits
6. Name of Intern's Direct Supervisor	12. Unit
Kristine Rendon	Groundwater Permits Unit
7. Name of Next Level Supervisor	13. Work Location (City and Address)/Hours of Work
Christine Alexander (VACANT)	Hybrid Work Schedule Office: 525 W Allegan St, Lansing, MI Monday – Friday 29 hours per week

14. General Summary of Function/Purpose of Position

Under the direction of the supervisor and senior staff, this position provides technical support for activities addressing permitted groundwater discharge sites in accordance with Part 22 (Groundwater Quality), as promulgated pursuant to Part 31, Water Resources Protection, of Michigan's Natural Resources and Environmental Protection Act, 1994 PA 451, as amended.

The intern assists staff by compiling and organizing geological, hydrogeological, topographical, and other environmental data from multiple sources, including drinking water well logs, site-specific data, and aerial imagery. The compiled data will be used to generate geologic cross-sections, maps, and groundwater discharge concentrations models that support the evaluation of hydrogeologic reports.

By the end of the internship, the student will (1) Develop applied experience in geological and hydrogeological data analysis; (2) Gain proficiency using environmental data visualization tools such as ArcGIS and Rockworks; (3) Understand the role of hydrogeologic reviews in groundwater discharge permitting; and (4) Strengthen technical communication and presentation skills through data interpretation and reporting

15. Please describe the assigned duties, percent of time spent performing each duty, and what is done to complete each duty. List the duties from most important to least important. The total percentage of all duties performed must equal 100 percent.

Duty 1

General Summary of Duty 1 % of Time 90%

Under the supervision and guidance of the supervisor and senior staff, assist in compiling, analyzing, and visualizing geological, hydrogeological, and environmental data to support hydrogeologic reviews and activities conducted under Part 22 of Michigan's environmental regulations.

Individual tasks related to the duty

- Review and compile geological, hydrogeological, topographical, and related environmental data for sites permitted under Part 22.
- Collect hydrogeological samples for analysis at sites permitted under Part 22.
- Develop 2D and 3D cross-sectional diagrams illustrating subsurface conditions, contamination, and groundwater flow pathways using GIS and modeling tools such as Rockworks.
- Create maps that depict key geological and environmental features, such as transects, groundwater flow patterns, discharge concentrations, and site boundaries, to support site review and evaluation.
- Assist in developing conceptual site models using software such as Rockworks, ArcGIS Pro, or equivalent tools to integrate geological and contaminant data for visualization and interpretation.
- Contribute to the development of 3D models to visualize geological structures and the movement or concentration of contaminants within affected areas.
- Provide support to the Groundwater Discharge Program geologists in evaluating groundwater discharges to determine current risk, identify data gaps, and assist in prioritizing sites for potential permitting actions.

Duty 2

General Summary of Duty 2 % of Time 10%

Create and present an overview of our project work to be presented at the end of the internship to staff and stakeholders.

Individual tasks related to the duty.

- Document key tasks and accomplishments throughout project.
- Develop presentation materials using data and knowledge gained in project work.
- Prepare 45 minutes to 1 hour presentation to be given virtually to EGLE staff and other project stakeholders.

16. Describe the types of decisions made independently in this position and tell who or what is affected by those decisions.

Prioritization of daily work assignments based on general guidance from supervisors or lead worker. Independent decision-making is limited to organizing data and performing preliminary analysis.

17. Describe the types of decisions that require the supervisor's review.

Daily work assignments require supervisory review.

18. What kind of physical effort is used to perform this job? What environmental conditions is this position physically exposed to on the job? Indicate the amount of time and intensity of each activity and condition.

Work will involve office tasks. Occasionally, this job will involve field sampling at various sites with permitted groundwater discharge. Field visits may occur in wet weather or extremely hot or cold temperatures.

Boxes 19-22: Have been purposely removed and are not relevant to this internship role.

23. What are the essential functions of this position?

The essential duties of this position are to assist staff within assigned work area. This position provides technical hydrogeological assistance to Program staff under close supervision.

24. Indicate specifically how the position's duties and responsibilities have changed since the position was last reviewed.

This is a newly established position.

25. What is the function of the work area and how does this position fit into that function?

The Groundwater Discharge Program regulates the discharge of treated wastewater to ground or groundwaters of the state under Part 31, Water Resources Protection, of the Natural Resources and Environmental Protection Act, 1994 PA 451 and the Part 22 Groundwater Quality Rules. This position provides hydrogeological and GIS assistance to staff under close supervision by direct supervisor and other senior staff.

26. What are the minimum education and experience qualifications needed to perform the essential functions of this position?

A student currently enrolled pursuing a bachelor's degree in Geology, Hydrogeology, Geological Sciences, Environmental Geosciences, Geophysics, or Geologic Engineering. The student will have (1) Knowledge and understanding of hydrogeology/geology; (2) Experience with basic computer tools, including word processing and spreadsheet, and (3) Some familiarity with Geographic Information Systems (GIS).

EDUCATION:

Current enrollment in college or university and pursuing a degree in Geology, Hydrogeology, Geological Sciences, Environmental Geosciences, Geophysics, or Geologic Engineering.

EXPERIENCE:

Candidate must possess proficiency with Microsoft Office applications. Experience working with spreadsheets is required. Experience in Database development/maintenance or geographic information systems (GIS) is preferred. Background with geological/hydrogeological modeling software is preferred. Rockworks familiarity is a plus.

KNOWLEDGE, SKILLS, AND ABILITIES:

Knowledge and ability to operate common business software (e.g. MS Office, Excel).

GIS training and experience preferred.

Ability to spend multiple hours working at a computer workstation.

Ability to read and think critically.

Ability to write descriptively and succinctly.

Ability to understand and follow direction.

Ability to communicate effectively, orally and in writing.

Ability to organize, plan, and complete projects efficiently.

CERTIFICATES, LICENSES, REGISTRATIONS:

Possession of a valid driver's license preferred

NOTE: Civil Service approval of this position does not constitute agreement with or acceptance of the desirable qualifications for this position.

I certify that the information presented in this position description provides a complete and accurate depiction of the duties and responsibilities assigned to this position.

Supervisor's Signature

Date

I have reviewed the project and approve the allocation of funds to cover payroll for the selected intern or interns.

Division Director's Signature

Date

TO BE FILLED OUT BY APPOINTING AUTHORITY

Indicate any exceptions or additions to statements of the employee(s) or supervisors.

I certify that the entries on these pages are accurate and complete.

Appointing Authority Signature

Date

TO BE FILLED OUT BY EMPLOYEE

I certify that the information presented in this position description provides a complete and accurate depiction of the duties and responsibilities assigned to this position.

Employee's Signature

Date

NOTE: Make a copy of this form for your records.