



Illinois Department of Transportation

Memorandum

To: DEPUTY SECRETARIES, DIRECTORS AND BUREAU CHIEFS
From: Dianna L. Taylor
Bureau Chief of Personnel Management
Subject: Technical Vacancy
Date: August 29, 2017

Attached are the Position Summary Sheet and Position Description for the vacant technical position listed below. Please post this vacancy announcement August 30, 2017 in the designated areas.

The deadline for applicants to submit their applications for consideration is **4:30 p.m. on Wednesday, September 13, 2017**. Applications will not be accepted after that time and date.

NOTE: A copy of each applicant's certification for the following must be attached: Portland Cement Concrete I, Aggregate Technician, Hot Mix Asphalt Level I, Documentation of Contract Quantities and Geotechnical Field Testing and Inspection. Please be advised that if a high volume of applications are received, the applications may be screened to establish a smaller pool of applicants for interview. The screening will be based on the information contained in the application.

If you have any questions, please contact the Bureau of Personnel Management at 217/782-5594.

ET III (6 pos) Materials Technician
Region 1/District 1/Materials
Highways Project Implementation
Schaumburg

Attachments
42085

Technical Applications [PM1080 rev 6/1/17](#)****must be received** by the Bureau of Personnel Management, Room 113, 2300 South Dirksen Parkway, Springfield, IL 62764 (Fax# 217/557-3134) or emailed to DOT.CO.BPM.EmploymentApplications@Illinois.gov by **Wednesday, September 13, 2017**, 4:30 p.m. Please include address, daytime phone and position for which applying if not already listed on application. Applicants will be notified in writing to schedule interviews.

NOTE: A copy of each applicant's certification for the following must be attached: Portland Cement Concrete I, Aggregate Technician, Hot Mix Asphalt Level I, Documentation of Contract Quantities and Geotechnical Field Testing and Inspection. Please be advised that if a high volume of applications are received, the applications may be screened to establish a smaller pool of applicants for interview. The screening will be based on the information contained in the application.



Illinois Department of Transportation

An Equal Opportunity Employer

Position Summary Sheet

Classification:	Engineering Technician III (6 positions)	Salary:	\$3,840 - \$5,308*
Position Title:	Materials Technician	Union Position:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Position Number:	PW013-23-51-700-00-01	IPR#:	42085

Office/Central Bureau/District/Work Address:

Office of Highways Project Implementation/Region One/District One/Bureau of Materials/ 201 W. Center Ct., Schaumburg, IL

Description Of Duties:

This position is accountable for performing inspection, sampling, testing, documentation and reporting for various construction materials used in District One highway projects; providing support for the bureau staff in the Geotechnical, Mixture Control, Physical Tests and Quality Assurance Sections.

Special Qualifications:

Required:

- Valid driver's license
- Successful completion of the PCC 1 (CET 030), Aggregate Technician (CET 021 or a combination of CET 020 & 027) and Hot Mix Asphalt Level 1 (CET 029) courses
- Successful completion of S-14 Documentation of Contract Quantities
- Successful completion of S-33 Geotechnical Field Testing and Inspection
- Frequent districtwide travel; and overtime

Desired:

- An Associate Degree from an accredited two-year civil engineering technology program or two years of college in pre-engineering or civil engineering technology
- Five years' experience in highway construction
- Strong communication skills
- Working knowledge of math to include trigonometry
- Working knowledge of materials testing and laboratory testing equipment
- Working knowledge of the Department's QC/QA program

Shift/Remarks:

7:00 am - 3:30 pm / Monday - Friday (30 minute lunch)

*Individual salary offers are computed based on an applicant's current position and experience level in comparison to the posted title as well as internal equity of staff in the organizational unit.

**Technical Application PM1080 (revised 6/1/17) is required. No previous version of the PM1080 will be accepted.

**ILLINOIS DEPARTMENT OF TRANSPORTATION
POSITION DESCRIPTION**

DATE:	August 2017	POSITION:	Materials Technician
APPROVED BY:	George Houston	OFFICE/DIVISION:	OHPI/District One/Bureau of Materials
CODE:	PW013-23-51-700-00-01	REPORTS TO:	Bureau Chief of Materials

Position Purpose

This position is accountable for performing inspection, sampling, testing, documentation and reporting for various construction materials used in District One highway projects and to provide support in a timely manner for the Bureau staff in the Geotechnical, Mixtures Control, Physical Tests and Quality Assurance Sections.

Dimensions

Subordinate Personnel:	1 (1 seasonally)
Number of Projects Annually:	15-100
Number of Plants:	5-25

Nature and Scope

This position reports to the Bureau Chief of Materials; however, assignments will be made as needed on a rotating basis to the Geotechnical, Mixtures Control, Physical Tests and Quality Assurance Sections.

This position operates in an area characterized by intense land development and continuously high levels of construction activity. Within District One, every function required for highway construction projects including concrete producers, asphalt producers, steel plants, fabricators, and other various material sources, used not only for the State of Illinois but other states, complicate the task of knowing and applying guidelines and specifications.

Typical problems in this position include: determining the data required for soils reports and including appropriate calculations; determining the acceptability of aggregate; understanding the application of Hot Mix Asphalt and Portland Cement Concrete mixture designs; developing a working knowledge of local agency and other state specifications governing a wide variety of materials for which the district is the sole or principal source; ensuring that materials incorporated into projects have been properly inspected; coordinating resolution of material deficiencies with multiple individuals/agencies such as IDOT resident engineers, construction supervisors, consultants, Federal officials and local agencies; and determining the acceptability of producer's certifications for documentation.

The greatest challenge to this position is recognizing situations requiring corrective actions and then recommending corrective action and acquiring a working knowledge of Department requirements including PFP, QCP, QC/QA, AGCS and Method Specification for project inspection. This position ensures material documentation and certification on projects is done in accordance with established guidelines and various supplemental specifications.

The incumbent personally is responsible for conducting field testing of mixtures, soils boring operations, soil laboratory testing and reporting of various materials in a lab environment. The incumbent is also responsible for the testing of aggregates and field inspection and proportioning of asphalt and cement mixtures. The incumbent will use MISTIC system and will call up or enter tests results as necessary. The incumbent will review project materials inspection reports and ensure documentation meets certification and acceptability requirements of materials used on Federal and State funded projects.

The incumbent operates within the guidelines included in the Standard Specifications for Road and Bridge Construction, the supplemental specifications and the special provisions for each job as well as the specifications and guidelines of several neighboring states. The incumbent may be required to travel throughout the District to various job sites to inspect and sample various materials as needed, and to oversee various materials inspection procedures. Overtime may be necessary to fulfill the duties of this position.

Internal contacts include other Materials personnel, Unit supervisors and project personnel within the district. Externally, the incumbent has contact with various materials suppliers, producers, county & local agency inspectors and consulting engineers.

The effectiveness of this position is measured by how quickly the incumbent acquires the ability to ensure that the materials are tested in accordance with proper standards and on schedule.

Principal Accountabilities

1. Inspects and samples both raw and finished materials produced for a particular job to ensure compliance with specifications.
2. Inspects PCC/HMA mixtures to ensure that all are within the Specification during production.
3. Provides soil testing and inspection to minimize construction delays.
4. Develops appropriate solutions to embankment, subgrade, topsoil, and foundations problems to reduce possibilities of subsequent failures.
5. Assists in calibrating and maintaining laboratory testing equipment to ensure information is accurate.
6. Maintains complete and accurate materials testing records.
7. Prepares complete and accurate reports for MISTIC and other reporting systems.
8. Utilizes a working knowledge of a wide variety of inspection/testing procedures and specifications checklist to perform functions.
9. Performs duties in the resolution of materials deficiencies and the proper documentation of materials exceptions.
10. Operates within the guidelines of the Personnel Policies.
11. Performs duties in compliance with departmental safety rules. Performs all duties in a manner conducive to the fair and equitable treatment of all employees.
12. Performs other duties as assigned.