

Technical Vacancy Announcement

Civil Engineer Trainee (1 Position) Safety Programs Evaluation Engineer

IPR Number: 44215 Union Position:

✓ Yes

✓ No

Position Number: PW110-23-75-803-10-01 Shift: 8:00 am – 4:30 pm

January 27, 2020 Monday – Friday

Anticipated

Closing Date: April 24, 2020 Starting Salary: \$4,275 – \$4,655 *

Office/Central Bureau/District/Work Address:

Office of Highways Project Implementation / Bureau of Safety Programs and Engineering / 2300 South Dirksen Parkway, Springfield, IL

Position Purpose:

Opening Date:

This position is responsible for assisting in the evaluation of the state-of-the-practice published research on state-of-the-art roadside appurtenances, assisting with revisions to existing policies and development of new policies, and assisting with roadway safety issues. This position, under immediate supervision, provides technical assistance on work zone and highway railroad grade crossing safety issues, reviews crash data to identify patterns with specific roadway designs, and assists in developing mitigating measures.

Qualifications:

Position Requirements:

- Completion of a master's or bachelor's degree in engineering from an ABET accredited college OR a current Engineer Intern License in the state of Illinois (includes those expecting to graduate in the spring of 2020)
- Minimum 2.5 cumulative GPA in engineering related courses (If 2.0-2.5 GPA, candidate must have passed the Fundamentals of Engineering exam)
- Valid driver's license
- In-state and out-of-state travel

Position Desirables:

- Working knowledge of the routine practices of civil engineering
- · Working knowledge of mathematics as applied to engineering activities
- Basic skill in the use of engineering field and office instruments
- Ability to make relatively difficult technical computations and estimates
- Strong oral and written communication skills

How to Apply/Remarks:

Technical Applications PM1080 (rev 8/23/19) 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 4:30 pm on the closing date listed above. Applications will not be accepted after this date and time.

Agency Contact: Bureau of Personnel Management, 217/782-5594

Unofficial college transcripts must be included with application. Official college transcripts must be submitted upon date of employment. Applicants possessing an Engineer Intern License must also include a copy with application. Applicants not submitting these documents by the posting deadline will not be considered for employment.

To be considered for a permanent position within IDOT, you must either be a US citizen or a non-citizen with permanent work authorization.

Only education/coursework and experience listed within the application will be considered for determining eligibility for this position.

Please be advised that if a high volume of applications is 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.

In an attempt to fill the posted positions, IDOT will contact applicants during the posting period to schedule interviews. All postings will result in three interview pools, with application cut off dates of: February 26, 2020, March 26, 2020 and April 24, 2020. Those applicants that have been deemed qualified and have submitted a completed application with all required attachments will be invited to interview accordingly based on the date their application documents are received.

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

ILLINOIS DEPARTMENT OF TRANSPORTATION POSITION DESCRIPTION

DATE:

January 16, 2019

WORKING TITLE:

Safety Programs Evaluation

Engineer

POSITION

CLASSIFICATION:

Civil Engineer Trainee

OFFICE/BUREAU:

Office of Highways Project

Implementation / Bureau of Safety

Programs and Engineering

POSITION

NUMBER:

PW110-23-75-803-10-01

REGION/DISTRICT:

n/a

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Dimensions

Programs:

Crash analysis, work zone and highway railroad grade crossing safety,

clear zones, safety audits

Construction projects:

\$1 - 3 Billion annually

Training:

1 - 2 annually

Nature and Scope

This position reports to the Highway Safety Programs Unit Chief. There are no subordinates reporting to this position.

This position operates in an environment of developing and applying the skills to perform policy and procedure research concerning work zone and highway railroad grade crossing safety items in order to assist in making recommendations to revise or develop new policies. The incumbent is also responsible for being current on innovative safety engineering practices and assisting in crash data analysis. This position aids in the administration of simple railroad projects in accordance with state and federal regulations and guidelines; assists in coordinating railroad projects with the railroad companies; and provides basic engineering expertise necessary for the development of agreements, plans, and the inspection projects for railroad-highway projects.

Typical problems in this position involve the continual screening and review of research papers, federal notices, new equipment, and product literature. In addition, in-house and industry recommendations for new and/or revised policies must be reviewed with the objective of determining applicability to departmental interest and goals. The greatest challenge of this position is to develop recommendations for meaningful, cost-effective, and timely policies for a wide range of highway safety engineering features; maximizing the safety of local system rail crossings of the state within limited funding constraints; and ensuring that highway and related railroad work are scheduled to accommodate each other.

The incumbent is personally responsible, under immediate supervision, for preparing technical correspondence and reports on safety engineering issues along with on-site reviews on an as-needed basis. The incumbent assists with recommendations to changes/revisions to the standards, procedures, and policies relative to highway safety needs. S/He may consult with policy development units in the Bureau of Design and Environment, other central bureaus, other states, and the Federal Highways Administration (FHWA) to ensure that proposed policies are uniform. The incumbent also assists in the development and administration of programs aimed at rail-highway crossing safety. S/He provides districts and local agencies with direction necessary to upgrade local agency rail-highway crossings.

The incumbent performs under immediate supervision and is given little latitude to act independently when performing the responsibilities assigned to this position. S/He must refer all problems to the supervisor for resolution. The incumbent is guided by state and federal policies and by the rules and regulations of the department.

The incumbent's regular contacts within the department involve the other central bureaus in the Office of Highways Project Implementation. S/He is in moderate contact with district staff to interpret design policies relating to safety and design deviation requests. In addition, contacts are frequently made with the FHWA, railroad companies, and with other state highway agencies and research consultants. S/He is required to travel within the state for district technical training, on-site reviews, and occasionally outside the state for technical meetings.

The effectiveness of the position is measured by the ability of the incumbent to develop timely and effective standards, procedure, and policy recommendations which result in safe, cost-effective traffic operations. The effectiveness can also be measured by the incumbent's ability to innovate and recommend new concepts in development of solutions for crash patterns in specific roadway designs.

Principal Accountabilities

- 1. Assists in the evaluation of state-of-the-practice published research on state-of-the-art roadside appurtenances.
- Assists with revisions and development of new standards, procedures, and policy recommendations relative to highway safety needs.
- 3. Prepares technical correspondence and reports of safety issues, under immediate supervision.
- 4. Performs on-site reviews on an as-needed basis, under immediate supervision.
- 5. Assists with crash data analysis and roadway safety issues.
- 6. Consults with policy development units in the Bureau of Design and Environment, other central bureaus, other states, and FHWA to ensure that proposed policies are uniform.
- Performs duties in compliance with departmental safety rules. Performs all duties in a manner conducive to the fair and equitable treatment of all employees.
- 8. Performs other duties as assigned.

Subordinates of this position (if applicable, list subordinate information in the chart below)

Position Classification	Position Number	Working Title	Authorized Identical
n/a			
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Supervisor of this position

Immediate Supervisor Position Classification: Civil Engineer VI

Working Title: Highway Safety Programs Unit Chief

Position Number: PW116-23-75-803-10-01

Printed 1/16/2019 Page 3 PM1244 (Rev. 12/05/18)

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Agency Approvals

Secretary, Department of Transportation