STATE OF MONTANA
JOB DESCRIPTION

Montana state government is an equal opportunity employer. The State shall, upon request, provide reasonable accommodations to otherwise qualified individuals with disabilities.

Job Title: Junior Traffic Engineer (FE)

Position Number: 55029, 59053, 53117, 57036, 51046, 51208

Location: Statewide **Department: Transportation**

Division and Bureau: District Project Development **Section and Unit: N/A**

Job Overview:

This position is the journey-level (FE) District Traffic Engineer. The position is responsible for providing expertise and consultation in the evaluation of traffic control devices to ensure highway safety and that devices and controls meet Manual on Uniform Traffic Control Devices and MDT design criteria; providing a field extension of the Traffic Safety Bureau and/or support to senior District Traffic Engineers by collecting and evaluating site data and making recommendations to resolve safety problems or to enhance highway safety; representing the department with the public and other public and private agencies; coordinating with the Planning Division on qualifying projects in the System Impact Action Process (SIAP) related to the requests for approach permits from major developments; Coordinating with the Planning Division on highway capacity and safety issues related to traffic demand models and long-term impact to the system from local land-use changes; and analyzing non-major approach permit requests. The position reports to the District Project Development Engineer and does not supervise others.

Essential Functions (Major Duties or Responsibilities):

Traffic control – 35%

- Provide expertise and consultation in the evaluation of traffic control devices to ensure highway safety and that devices and controls meet Manual on Uniform Traffic Control Devices and MDT design criteria.
- Review district pre-construction projects for traffic-related items and provide comments and recommendations to the District Project Development Engineer.

- Review traffic control on active construction projects to provide recommendations to the Engineering Project Manager and District Project Delivery Engineer to improve safety and ensure compliance with Uniform Traffic Control requirements. Monitor work zone traffic control operations and provide guidance and training in traffic control practices as required.
- Review and inspect all maintenance section routes at least biennially to ensure proper and adequate signing and striping is in place. Verify that signing is uniform in application and that it conforms with state and federal specifications, and recommend and direct modifications as required. Provide technical assistance and information to field and maintenance personnel regarding signing and pavement marketing standards and procedures including traffic control recommendations for the safe and efficient movement of vehicles and pedestrians.
- Provide training for field, construction, and maintenance crews and utility companies regarding traffic control standards as required.
- Review utility company formal Traffic Control Plans to ensure they match the applicable signing on the roadway. Coordinate with utility representatives to resolve traffic control deficiencies.

Traffic studies – 30%

- Provide a field extension of the Traffic Safety Bureau by collecting and evaluating site data and making recommendations to resolve safety problems or to enhance highway safety and/or capacity performance. Incumbent will also coordinate with the Planning Division on issues related to system capacity and safety within the Systems Impact Analysis Process, traffic demand models, technical elements of urban/metro/and statewide plans, and representation of MDT positions on new development before local planning boards.
- Study accident data, road geometrics, traffic control devices and roadside culture to identify problems and relay information to the Traffic Safety Bureau so they can design solutions to increase the safety of locations.
- Collect and analyze data for school/pedestrian crossing, speed zone, speed monitoring, and intersection control warrant studies. Identify and analyze trends and potential counter measures to enhance roadway performance.
- Report findings, needs and requests for further study to the Traffic Safety Bureau.
- Conduct special projects such as off-system signing programs, on-system sign inventories, and signing and striping evaluations to assist in data collection, evaluate the status of signs and striping, identify problems, and recommend solutions to enhance highway safety.
- Investigate fatal collision and construction or maintenance work zone fatal or serious injury sites to document the existence and condition of existing traffic control devices and identify changes or improvements to enhance safety. Ensure proper documentation and retention of records for potential litigation defense.
- Study system traffic capacity and safety trend information and suggest strategies that can be incorporated into mid and long-range planning documents.

Public relations – 20%

- Represent the department and District Project Development Engineer with the public and other public and private agencies to facilitate safety improvement projects, coordinate the identification and resolution of safety and traffic congestion problems, and to explain the department's position and technical aspects of projects.
- Provide technical expertise and attend meetings involving the public and local governments regarding speed zones, safety issues and designs. Represent the district at public meetings and report findings to the appropriate authority or department
- Consult with relevant units within the Planning Division towards developing an MDT position on proposed development related impacts to the transportation system within the District.
- Represent MDT's position to local planning boards regarding highway capacity and safety issues related to proposed developments (housing developments, box stores, and other traffic generators) based on coordination with the Planning Division.
- Represent district on mobility and highway traffic safety issues related to the development of urban, metropolitan, and statewide transportation plans.
- Receive and respond to calls from federal, local, and state agencies; transportation and county commissioners; highway patrol; and the public on traffic complaints or suggested improvements. Explain MDT processes for modifications and present alternate solutions if available. Review traffic concerns and determine if further study is required. Schedule and proceed with preliminary evaluation of areas of concern and relay information or direct calls and follow-up to the appropriate MDT work unit or other agency as needed.
- Provide technical assistance to cities, counties, outside agencies, the public, and the private sector. Work with city, county and state governments and law enforcement agencies to improve traffic safety and advise and assist local government officials with their signing programs and traffic control items.
- Respond to requests for clarification of laws, rules and regulations related to motor vehicle operating requirements, signal legends, and proper use of traffic control devices.
- Coordinate investigations with local government officials to ensure that the study and results are fully understood. Explain solutions to non-technical individuals in a clear and positive manner.

Approach permitting – 10%

- Analyze approach permit requests for access to highway right-of-way to ensure safe traffic movement and compliance with state and federal regulations and engineering standards. Make recommendations to the supervisor on the approval or denial of permit requests including recommendations for modifications to requests to make them acceptable.

Other duties – 5%

- Perform a variety of other technical, professional, and administrative duties in support of the District Project Development as assigned by the supervisor.

Supervision

The number of employees supervised is: n/a

The position number for each supervised employee is: n/a

Physical and Environmental Demands:

The position performs work in both an office environment and in the field. The position involves travel throughout the district (in excess of 20,000 miles per year) to highway project locations. Fieldwork involves hazards and demands associated with an active road construction site including exposure to asphalt fumes, traffic, weather, loud noises, and overhead construction equipment; traversing rough terrain; and extreme weather and driving conditions.

Knowledge, Skills and Abilities (Behaviors):

The position requires an advanced knowledge of the principles and practices of traffic engineering including engineering drafting; CADD; engineering mathematics including trigonometry, geometry, and calculus; physics; engineering mechanics; analytical and problem solving methods; and engineering plan organization. The position also requires knowledge of the Manual on Uniform Traffic Control Devices; state and federal traffic engineering regulations; the geographic area including terrain and site characteristics; accident analysis techniques; the functions of traffic control equipment; public relations methods and techniques; and written and verbal communications including presentation methods and technical writing.

The position requires skill in the operation of traffic control study and control devices; the use of computers and applicable software including CADD; analyzing and evaluating engineering designs; specialized analytical methods and techniques; and analyzing and interpreting statistical information.

Minimum Qualifications (Education and Experience):

The required knowledge and skills are typically acquired through a combination of education and experience equivalent to Bachelor's Degree in Civil Engineering or a related field.

This position requires a minimum of one year experience in a related field.

Certifications, licensure, or other credentials include: Position requires a EIT certification.

Special Requirements:

List any other special required information for this position

☐	Fingerprint check	☒	Valid driver's license
☐	Background check	☐	Other; Describe
	Union Code		Safety Responsibilities

The specific statements shown in each section of this description are not intended to be all inclusive. They represent typical elements and criteria considered necessary to perform the job successfully.

Signatures

My signature below indicates the statements in the job description are accurate and complete.

Immediate Supervisor	**Title**	**Date**

Administrative Review	**Title**	**Date**

My signature below indicates that I have read this job description.

Employee	**Title**	**Date**

Human Resources Review

Job Code Title: Engineering Analyst Job Code Number: D25012 Level: 2

My signature below indicates that Human Resources has reviewed this job description for completeness and has made the following determinations:

☐ FLSA Exempt ☒ FLSA Non-Exempt

☒ Telework Available ☐ Telework Not Available

☒ Classification Complete ☐ Organizational Chart attached

Human Resources:

Signature **Title** **Date**