STATE OF CALIFORNIA • DEPARTMENT OF TRANSPORTATION

POSITION DUTY STATEMENT

PM-0924 (REV 01/2022)

CLASSIFICATION TITLE	OFFICE/BRANCH/SECTION	OFFICE/BRANCH/SECTION		
Research Data Specialist III	Data Science Branch - Data and D	Data Science Branch - Data and Digital Services		
WORKING TITLE	POSITION NUMBER	REVISION DATE		
Senior Data Scientist	900-064-5770-919			

As a valued member of the Caltrans leadership team, you make it possible for the Department to provide a safe and reliable transportation network that serves all people and respects the environment.

GENERAL STATEMENT:

Under the direction of a Research Data Manager, the Senior Data Scientist provides technical leadership and performs analysis with Data Analysts and Data Scientists (Research Data Specialists) who perform transit and transportation analytics. This role focuses Transit and Transportation analytics using Big Data, GTFS, c(EMV) payment data and more. The teams core comptencies are in Python / R, accessibility analysis, Dashboards (powerBI / Tableau / Metabase) and other tools.

Under general direction, this is the full specialist level over analytical data research as a senior individual contributor. In this setting, incumbents provide guidance over a well-established and fully developed research function that continues to grow with the overall growth of the Division of Data and Digital Services.

CORE COMPETENCIES:

As a Research Data Specialist III, the incumbent is expected to become proficient in the following competencies as described below in order to successfully perform the essential functions of the job, while adhering to and promoting the Department's Mission, Vision, Values, Strategic Imperatives and Goals. Effective development of the identified Core Competencies fosters the advancement of the following Leadership Competencies: Change Commitment, Risk Appetite, Self-Development/Growth, Conflict Management, Relationship Building, Organizational Awareness, Communication, Strategic Perspective, and Results Driven.

TYPICAL DUTIES:

Percentage	Job Description
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Essential (E)/Marginal (M)¹

50%	E	Data Science and Analytics - preforms complex statistical and programming work in Python and R, along with other tools. Analyzes problems, writes research reports, does other analytical functions. Prepares presentations, does statistical analysis, preforms reviews of others code / reports via github or other tools. Implements version control procedures for the team.
25%	E	Guidance and direction - provides guidance, feedback, manages issues. Suggest trainings and help mentor staff in working with Python & R. Provides guidance and feedback on work.
10%	E	Contracts and Admin: Oversees the work on contractors and others for technical competence. May serve on evaluation committees for contractors hired by the department.
10%	E	Coordination, Speaking and Reporting: Works with other DDS divisions and Planning and Modal Staff to report on activities, speaks at conferences, boards and other areas about DDS work.
5%	M	Other Duties as Assigned

¹ESSENTIAL FUNCTIONS are the core duties of the position that cannot be reassigned. MARGINAL FUNCTIONS are the minor tasks of the position that can be assigned to others.

SUPERVISION OR GUIDANCE EXERCISED OVER OTHERS

Guidance given on technical matters to more junior data analysts and scientist

KNOWLEDGE, ABILITIES, AND ANALYTICAL REQUIREMENTS

- Knowledge of either Python / PyData or R / Tidyverse Environment
- Knowledge of Data Science and Statistical Methods
- Ability to preform guidance and mentorship.
- Ability to analyze transportation and transit projects

RESPONSIBILITY FOR DECISIONS AND CONSEQUENCES OF ERROR

Responsible for delivering data science projects to Caltrans to inform planning and transit policy, without that, Caltrans will be hampered in ability to meet goals and strategic plan objectives.

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PUBLIC AND INTERNAL CONTACTS

This position will engage with external stakeholders in similar positions in comparable agencies, and with internal partners to drive collaboration and alignment.

PHYSICAL, MENTAL, AND EMOTIONAL REQUIREMENTS

The incumbent may be required to sit for periods of time using a keyboard and video display terminal. May also be required to lift, carry, and move boxes of material under 25 pounds from one location to another. Employee will occasionally bend, stoop, kneel to pull or push objects, grasp objects with fingers, stand for long periods of time, and twist the body or neck in a sideways motion, either seated or standing.

The incumbent should be able to quickly adapt behavior and work methods in response to new information/priorities, and unexpected obstacles; multi-task; effectively interact with many levels of people in a cooperative manner; be decisive; take appropriate actions; and complete tasks or projects with a short notice. The incumbent should be able to deal effectively with pressure, maintain focus and intensity yet remain optimistic and persistent, even under adversity.

The incumbent shall act in a fair and ethical manner toward others and demonstrate a sense of responsibility and commitment to public services; develop new insights into situations and apply innovative solutions to make organizational improvements; be willing to take risks and initiate actions that involve a deliberate risk to achieve a recognized benefit or advantage; and value cultural diversity and other individual differences in the workforce.

WORK ENVIRONMENT

The incumbent works in front of a dual-monitor computer system under artificial light in an office setting with long periods of working in a sitting or standing position.

This position may be eligible for telework. The amount of telework is at the discretion of the Department and based on Caltrans's evolving telework policy. Caltrans supports telework, recognizing that in-person attendance may be required based on operational needs. Employees are expected to be able to report to their worksites with minimum notification if an urgent need arises. The selected candidate will be required to commute to the headquartered location as needed to meet operational needs. Business travel may be required, and reimbursement considers an employee's designated headquartered location, primary residence, and may be subject to CalHR regulations or applicable bargaining unit contract provisions. All commute expenses to the headquartered location will be the responsibility of the selected candidate.

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I have read, understand and can perform the duties listed above. (If you believe you may require reasonable accommodation, please discuss this with your hiring supervisor. If you are unsure whether you require reasonable accommodation, inform the hiring supervisor who will discuss your concerns with the Reasonable Accommodation Coordinator.)		
EMPLOYEE (Print)		
EMPLOYEE (Signature)	DATE	
LIVIT LOT LE (Orginatare)	DATE	
I have discussed the duties with, and provided a copy of this duty statement to the employee named above.		
SUPERVISOR (Print)		
SUPERVISOR (Signature)	DATE	
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