SIERRA COLLEGE

Job Description

JOB TITLE: SENIOR RESEARCH ANALYST - RESEARCH

PAY GRADE: CL 28

LAST REVISED: NOVEMBER 2019

*Class specifications are intended to present a descriptive list of the range of duties performed by employees in the class. Specifications are **not** intended to reflect all duties performed within the job. Additional or different duties from the ones set forth below may be required to address changing business needs/practices.*

SUMMARY DESCRIPTION

Under general supervision of the Dean of Planning, Research, and Resource Development, designs and maintains information systems and databases to support the research office and other users; coordinates data standards, data integrity, and protocols between Instruction and Information Technology staff, data stewards, and the research office; performs complex and independent research and analysis on behalf of the college; provides information to support and enhance decision-making, planning, and assessment; performs applied research through quantitative, qualitative, and mixed methods research designs; works with other offices to support enrollment management, student access, success, retention, and persistence, schedule development, budget forecasts, and accreditation; provides technical support for qualitative and mixed methods research projects; maintains software and Software-as-a-Service implementations to support the research office and mission of the college.

REPRESENTATIVE DUTIES - *The following duties are typical for this classification. Incumbents may not perform all of the listed duties and/or may be required to perform additional or different duties from those set forth below to address business needs and changing business practices.*

1. Plans, organizes, develops, analyzes, and reports institutional research studies that support academic programs and institutional decision-making.

2. Develops databases and models that identify and define student success metrics and student achievement; maintains the research office data warehouse.

3. Develops and maintains information reporting tools, such as reports and dashboards, in order to support college decision making.

4. Works with college stakeholders to improve data literacy and interpretation of information by functioning as a "data coach".

5. Analyzes a variety of performance/productivity data such as, but not limited to that for faculty workload, student and financial information, class size, weekly student contact hours, class schedules, and space utilization; prepares reports and projections to support decisions on workload, student access, success, retention, and persistence, and financial impact.

6. Supports college planning and strategic initiatives through the development and monitoring of key performance indicators or other planning metrics.

7. Supports data collection, organization, and reporting in order to assess student learning and outcomes achievement.

8. Supports the finance office with forecasting and modeling financial models, such as those used in the Student Centered Funding Formula.

9. Provides leadership to and technical support for research office staff.

10. Provide technical support and data for grant writers and evaluators.

11. In consultation with relevant supervisors, may direct the work of others in order to meet college goals as related to job functions.

12. Implements and supports qualitative research studies as directed; maintain survey instruments and data collection tools.

13. Supports and validates state and federal reporting, such as IPEDS and Gainful Employment reporting.

14. Researches and identifies administrative systems that expedite and improve the timing and quality of work products and information flow to support research and decisions.

15. Analyzes system, administrative, and/or operational processes and/or problems being considered for new or revised applications and/or procedures to ensure District standards and protocols are met, along with federal, state, and county regulations and requirements; recommends solutions.

16. Documents and diagrams work processes and procedures; identifies steps in sequential order, suggesting revisions that enhance efficiency; develops and maintains standardized procedures for data collection, reporting, and processing.

17. Develops for review, feedback, and implementation, re-engineering of work processes that enhance efficiency and productivity.

18. Serves on various committees and taskforces.

19. Performs related duties as required.

QUALIFICATIONS - *The following generally describes the knowledge and ability required to enter the job and/or be learned within a short period of time in order to successfully perform the assigned duties.*

Knowledge of:

Relational and OLAP database concepts, including logical and physical data layout, programming and report writing tools (e.g., SQL).

Statistical, reporting, and visualization programs, such as Excel, SPSS, R, Tableau, Power BI, etc.

Educational or social science research methods, processes, systems, reporting and databases.

Research methodology and standard statistical procedures such, as but not limited to, research design, sampling, survey-guided analysis, parametric and non-parametric statistics, forecasting and projections.

Student outcomes assessment and measures of institutional effectiveness.

Legislative and educational oversight body processes, occurrences, requirements, and trends.

Office procedures, methods, and equipment including computers and applicable software applications such as word processing, spreadsheets, and databases.

Principles and practices of fiscal, statistical, and administrative report preparation.

Principles of business letter writing.

Ability to:

Design applied research studies for use in education and social environments.

Provide technical leadership and innovation in the development of data systems and tools.

Apply, interpret, and draw conclusions using advanced statistical concepts.

Succinctly and cogently, prepare and present complex reports, multi-media presentations, forecasts, and recommendations to audiences with diverse backgrounds.

Facilitate the development, implementation, and evaluation of institutional self-assessment programs.

Design and apply algorithms, simulations and business models to solve multi-variable problems.

Understand and apply District and state laws, regulations, policies, and guidelines governing

community college operations.
Provide training on scheduling systems and software to employees at all levels.
Communicate clearly and concisely, both orally and in writing.
Establish and maintain effective working relationships with those contacted in the course of work.
Learn and develop new skills continuously.

Education and Experience Guidelines - *Any combination of education and experience that would likely provide the required knowledge and abilities is qualifying. Examples of ways to obtain the knowledge and abilities would be:*

Education/Training:

Bachelor's degree from an accredited college or university with major course work that involves analysis, research, or decision support, such as those in business administration, economics, sociology, psychology, statistics, computer science or a related field. A Master's degree is desirable.

Experience:

Five years of increasingly responsible experience in the collection, analysis, reporting, and presentation of research data or the equivalent.

PHYSICAL DEMANDS AND WORKING ENVIRONMENT - *The conditions herein are representative of those that must be met by an employee to successfully perform the essential functions of this job. Reasonable accommodations may be made to enable individuals with disabilities to perform the essential job functions.*

Environment: Work is performed primarily in a standard office setting.

Physical: Primary functions require sufficient physical ability and mobility to work in an office setting; to stand or sit for prolonged periods of time; to occasionally walk, stoop, bend, kneel, crouch, reach, and twist; to lift, carry, push, and/or pull light to moderate amounts of weight; to operate office equipment requiring repetitive hand movement and fine coordination including use of a computer keyboard; and to verbally communicate to exchange information.

Vision: See in the normal visual range with or without correction; vision sufficient to read computer screens and printed documents; and to operate assigned equipment.

Hearing: Hear in the normal audio range with or without correction.