



Job Code: 2114

Grade: 20

HCWR: N

Job Title

Epidemiologist IV (Substance Use)

Department

Public Health

Job Summary

Under the direction of the Director of Epidemiology, the Epidemiologist IV is responsible for independently gathering, analyzing, interpreting, reporting, and providing data visualization of surveillance, health services utilization, and population-based data to inform community health strategies related to opioid use, overdose, and substance use treatment. This position will primarily support activities related to the surveillance and monitoring/evaluations components of the Centers for Disease Control and Prevention (CDC) Opioid Data to Action Local grant as well as other substance use-related surveillance activities by providing by applying epidemiologic, statistical, and behavioral health theory methodologies that will directly impact public health strategies, interventions, and policies aimed at reducing opioid-related overdoses, improving access to care, and addressing health disparities. In this position, various software applications such as SAS, SPSS, STATA, R, SQL, MS Access, Excel are used for data management and analysis. The Epidemiologist IV prepares reports related to public health and epidemiology as well as collaborates with other units within the health department and community partners to establish surveillance systems. This position plays a critical role in addressing the local opioid crisis and gaining insight into the impact of other substance use within the jurisdiction of the health department.

Typical Duties

- Promotes use of epidemiological surveillance at the clinical, environmental, population and personal health level.
- Monitors real-time opioid events by integrating ESSENCE, Medical Examiner, and Illinois Prescription Drug Monitoring (PDMP) data into alerts and monthly reports to senior leadership and behavioral health staff to inform response.
- Creates comprehensive data management plans to ensure the integrity and security of data collected and analyzed.
- Designs data analysis plans outlining the methodologies and statistical techniques to be employed in epidemiological research and reporting.
- Develops and maintains scripts and codes for defining and identifying cases in surveillance data, ensuring accuracy and consistency.
- Prepares and distributes weekly reports summarizing key epidemiological findings and trends related to opioid use and overdose.
- Establishes crisis response plans and workflows for rapid response to surges in opioid-related overdose incidents.
- Generates and shares monthly reports that provide in-depth analysis and insights into the evolving opioid crisis and related public health strategies.
- Collaborates with relevant stakeholders and agencies to create joint opioid reports that facilitate a coordinated response to the opioid epidemic.
- Compiles and publishes comprehensive annual reports on the state of opioid use, overdose, and related interventions within the jurisdiction.
- Monitors and updates health atlas indicators, ensuring that they accurately reflect the



Typical Duties

- evolving health landscape and opioid-related data.
- Contributes to the development of grant proposals for the CDC Opioid Data to Action (OD2A) Local program, outlining strategies to address opioid-related issues.
- Collaborates with the Behavioral Health Unit's Monitoring and Evaluation Coordinator to develop and implement quality performance measures to assess the effectiveness of public health interventions and initiatives aimed at reducing opioid-related harms.
- Collaborates with epidemiologists and researchers on shared metrics and data analysis.
- Develops, manages, analyzes, and interprets surveillance, registry, service utilization and population-based data.
- Provides technical assistance to public health efforts and programs by aligning project needs with existing data.
- Independently designs and produces public health, epidemiologic and technical reports for various audiences, publication, and other purposes.
- Independently prepares and provides oral presentations of epidemiologic analysis to various audiences and purposes.
- Identifies and applies appropriate epidemiologic, statistical and informatics methodologies to the study, identification, measurement and evaluation of population health problems and risk factors.
- Contributes to the preparation of a comprehensive analysis and assessment of community health status required for accreditation.
- Conducts geographic analysis of selected health indicators, health systems data and population parameters as required using GIS or other geospatial software.
- Assists with the development and monitoring program evaluation, performance management and quality improvement activities.
- Assures that grant-based activities protect the confidentiality, security, and integrity of data while maximizing the availability of information for public health.
- Performs other duties as assigned.

Minimum Qualifications

- Master's degree or higher in from an accredited college or university with an emphasis in epidemiology, biostatistics, health informatics or similar discipline
- Two (2) years of post-graduate work experience in public health, epidemiology, biostatistics, demography, urban planning, health informatics or other types of applied quantitative research
- Demonstrated knowledge in programming using SAS, SPSS, STATA, R, SQL, MS Access, Excel software as well as Microsoft Word and Excel
- Position requires moderate to heavy local travel for which the employee must possess a valid driver's license and insured vehicle or otherwise provide an acceptable and reliable means of transportation

Preferred Qualifications

- Intermediate experience in programming using SAS, SPSS, R, or STATA
- Experience with collecting, aggregating, and analyzing large data sets
- Demonstrated experience with technical writing/or publication and presentation
- Prior project management experience



Preferred Qualifications

- Prior experience using Geographic Information Systems, (e.g., esri ArcGIS)
- One (1) year of experience analyzing mental health or substance use-related data

Knowledge, Skills, Abilities and Other Characteristics

- Knowledge and ability to independently use analytical epidemiologic, statistical and informatics methods for analysis, planning and problem solving.
- Knowledge and experience with SQL, R, MS Access, SAS, SPSS, STATA, and Excel.
- Superior written and verbal communication skills including technical or grant writing.
- Ability to translate technical language and concepts for non-technical staff and the public.

Physical and Environmental Demands

This position is functioning within a healthcare environment. The incumbent is responsible for adherence to all hospital and department specific safety requirements. This includes but is not limited to the following policies and procedures: complying with Personal Protective Equipment requirements, hand washing and sanitizing practices, complying with department specific engineering and work practice controls and any other work area safety precautions as specified by hospital wide policy and departmental procedures.

The above statements are intended to describe the general nature and level of work being performed by people assigned to this classification. They are not intended to be construed as an exhaustive list of all responsibilities, duties and skills required of the personnel so classified.

For purposes of the American with Disabilities Act, “Typical Duties” are essential job functions.