

Maternal and Child Health

The Kentucky Department of Public Health (DPH) Maternal and Child Health Epidemiology positions are located in the Division of Maternal and Child Health (MCH). The Division has three main branches- Early Childhood Development Branch, Child and Family Health Improvement Branch, and Nutrition Services Branch. The MCH Division maintains a close working relationship with the Division of Prevention and Quality Improvement which includes programs such as Tobacco Control, Diabetes, Arthritis, Osteoporosis, Comprehensive Cancer, Physical Activity and Obesity prevention.

The Fellow's primary mentor will be a senior Maternal and Child Health Epidemiologist/CDC assignee, and the secondary mentor will be the Director of the Division of Maternal and Child Health. Both mentors have experience in mentoring MPH, medical and nursing students. These mentors will assure opportunities to develop applied skills and achieve competencies in MCH epidemiology, in a multidisciplinary division that administers a variety of MCH programs.

Fellow's Anticipated Day-to-Day Activities:

The MCH Division is responsible for conducting MCH needs assessment, and the fellow's day-to-day activities will focus on participation in the planning, implementation and reporting of this state wide assessment. This will enable the fellow to understand the needs assessment process within the context of Title V MCH program framework and learn the needs assessment methods and processes. He/she will learn hands on a strategic community planning process such as MAPP(Mobilization for Action through Planning and Partnerships). The MCH Division envisions conducting community forums at nine locations throughout Kentucky. All these activities entail extensive interdisciplinary collaboration. The fellow will be part of a team of epidemiologists from the Division and the different branches. This team meets regularly on a weekly basis to troubleshoot different issues as part of a group. The needs assessment will be multidimensional, so will provide ample opportunity for involvement in numerous analytic studies.

Potential Analytic/Interdisciplinary Projects

- Collect and analyze statewide primary quantitative and qualitative data for needs assessment. These activities include participation in conducting community wide forums at nine locations throughout Kentucky. The fellow will have the opportunity to learn intra-agency and inter-agency collaboration with persons from a variety of disciplines. Data collection will also include research on resources available for MCH services in the different counties in Kentucky and ability to identify potential gaps.

- Assist in performing data linkages using MCH datasets such as vital records, WIC and Hospital Discharge data to develop the ability to identify morbidities from NICU stays and readmissions for asthma etc.
- Analyze variations of fetal and infant mortality rates by geographic regions in Kentucky using perinatal periods of risk (PPOR) approach.
- Study the trend in stillbirths over time and compare with preterm birth data. The fellow will assess the quality of stillbirth files especially after the change in format of the birth file in 2004.
- Participate in the second phase of Kentucky Pregnancy Risk assessment Monitoring System (KY-PRAMS) pilot project. Participation will include data collection and data analysis regarding an array of maternal and child health issues that occur before, during and after pregnancy. The fellow will have the opportunity to plan a research proposal using data from the first phase of KY-PRAMS on issues such as pre-cursors to labor including induction for convenience and its relationship with health care coverage; link the information about breastfed infants with WIC to determine obesity in child; IPV(Inter personal violence) and birth outcomes.
- Work with the Office of Minority Health in a community-level analysis of contextual factors that affect perinatal outcomes and participate in the state's formulation of a strategic plan for the reduction of disparities in high-risk communities.

Potential Program Evaluation Projects:

- Evaluate the effectiveness of implementing Fetal Infant Mortality Review (FIMR) in Louisville, KY as a pilot project.
- Evaluate the quality of linked datasets and assess the effectiveness of method used for linking databases.

The fellow will have the opportunity to work with the senior mentor and SSDI coordinator (State Systems Development Initiative) to develop collaborations for building MCH data-capacity system. The fellow will also be part of the Kentucky Vital Events Tracking System(KVETS) workgroup assigned to help in creating an IT universe. There may be an opportunity for the fellow to observe the functioning of KY-CHILD, an electronic public health record with a web-based system for hospitals to enter birth certificate data and newborn screening data.

Role in State Emergency Preparedness Plan:

The fellow will be able to work with the Public Health Preparedness Committee to improve disaster and bioterrorism surveillance among the special population of pregnant women, infants, and children.

Assignment Location:

Frankfort, Kentucky

Primary Mentor:	Sarojini Kanotra, PhD, MPH Senior MCH Epidemiologist CDC Assignee to Kentucky Department for Public Health
Advanced Degrees:	MPH, Emory University PhD, New Delhi India MS, New Delhi, India
Secondary Mentor:	Ruth Ann Shepherd, MD Division Director, Division of Adult and Child Health Improvement Kentucky Department of Health
Advanced Degree:	MD, University of Louisville (1978)