



In Search of Better Health

KENYA MEDICAL RESEARCH INSTITUTE

VACANCY ANNOUNCEMENT

Research Officer (Evaluating Hospital Workloads & Case-Mix) - Wellcome Research Programme Nairobi

The Kenya Medical Research Institute (KEMRI) is a state corporation established through the Science and Technology (Amendment) Act of 1979, as the national body responsible for carrying out health research in Kenya. KEMRI's vision is "to be a leading centre of excellence in research for human health," and its mission is "to improve human health and quality of life through research, capacity building, innovation, and service delivery."

The KEMRI-Wellcome Research Programme (KWRP) is a partnership between KEMRI, Wellcome, and the University of Oxford. The Programme established in 1989, has evolved from conducting research in the immunology and epidemiology of malaria to a world class research institute conducting multi-disciplinary research that spans molecular biology to health systems and policy research.

The KEMRI-Wellcome Research Programme (KWRP) seeks to invite applications from experienced person to fill the following position;

Research Officer – Evaluating Hospital Workloads & Case-Mix (KWRP)

Reference Number: KWTRP/26/RO-EHW&CM/013

Employment Type: Full time

Thematic Area: Health Services Unit (HSU KWRP)

Location: Nairobi

JOB PURPOSE:

This position offers an exciting opportunity for someone to contribute to research at the KEMRI-Wellcome Trust Research Programme (KWTRP), a leading research centre in Africa dedicated to investigating the primary causes of ill health and the development of health care systems on the continent. At KWTRP, we are not only committed to advancing scientific knowledge but also to fostering local research leadership.

In an ongoing project, the Health Services Unit at KWTRP Nairobi together with the Kenya Pediatrics Research Consortium (KEPRECON) are collaborating with researchers at Oxford University and elsewhere to advance work on approaches to assessment of Kenya's hospitals especially its County Hospitals. Some African countries provide detailed information on hospital inputs (staffing and resources) after surveys such as the Service Availability and Readiness Assessment. Other data systems such as DHIS2 aim to collate data on hospital episodes such as outpatient visits and inpatient admissions and outcomes. However, these data sources are rarely

brought together to understand variation in hospital size and resourcing, especially their human resources, and variation in workloads. These analyses are important for understanding overall health system functioning and performance. Record linkage and mortality data quality, using Health and Demographic Surveillance System (HDSS) data from Kenya to address critical questions about displacement in reported dates of birth, inconsistencies in child mortality reporting, and completeness of civil registration and vital statistics (CRVS).

The successful candidate would therefore:

- i. Compile existing data on hospital facilities, resources and geographic setting with a focus on Level 4 and Level 5 hospitals.
- ii. Compile existing DHIS2 data on hospital outpatient (emergency and booked clinics), delivery care and inpatient episodes for each Level 4 and Level 5 hospitals ideally over the period 2021 to 2025 inclusive.
- iii. Address any inconsistencies in the two data sources by triangulating with other sources using clearly articulated and logical processes to create the best:
 - a. 'Hospital Capacity' dataset possible.
 - b. 'Hospital Workloads, Case-Mix and Outcomes' dataset possible.
- iv. Link Level 4 and Level 5 hospitals in each dataset through specific hospital identifiers and to their geographic location.
- v. Create suitable indices of hospital capacity that span important domains for the delivery of services.
- vi. Develop an approach to aggregate reporting of workload for OPD and Inpatient areas and then for hospitals as a whole.
- vii. Conduct analyses that explore variations in hospital capacity and workloads and link these to geographic location.
- viii. Conduct analyses that contrast hospital capacity and workloads to explore variation in 'productivity' with the potential of proceeding to more sophisticated analyses of hospital efficiency.

The Research Officer will also join a wider research team termed **Africa's First Referral Hospitals: Innovation and Care (AFRHiCARE) Partnership** that seeks to understand the current and future roles of county hospitals in Kenya and District Hospitals in Uganda and South Africa. The AFRHiCARE Partnership is a collaborative effort between well-established researchers from KWTRP's Population and Health and Health Services Units and the Universities of Oxford, Witwatersrand, and Makerere. AFRHiCARE is funded by Wellcome as a 5-year partnership to generate new evidence that will inform the roles, workforce requirements, skill-mix, and use of technologies needed to deliver high-quality healthcare as part of Universal Health Coverage.

DESCRIPTION:

Reports to: Study Principal Investigator.

Direct reports: None.

Indirect reports: None.

Budget and Resource Responsibility: Responsible for allocated hardware and software.

KEY RESPONSIBILITIES:

For the Health Services Unit and with wider linkages to the AFRHiCARE partnership and under the direction of the supervisor to:

- i. Compile existing data on hospital facilities, resources and geographic setting with a focus on Level 4 and Level 5 hospitals.
- ii. Compile existing DHIS2 data on hospital outpatient (emergency and booked clinics), delivery care and inpatient episodes for each Level 4 and Level 5 hospitals ideally over the period 2021 to 2025 inclusive.
- iii. Address any inconsistencies in the two data sources by triangulating with other sources using clearly articulated and logical processes to create the best:
- iv. 'Hospital Capacity' dataset possible.
- v. 'Hospital Workloads, Case-Mix and Outcomes' dataset possible.
- vi. Link Level 4 and Level 5 hospitals in each dataset through specific hospital identifiers and to their geographic location.
- vii. Create suitable indices of hospital capacity that span important domains for the delivery of services.
- viii. Develop an approach to aggregate reporting of workload for OPD and Inpatient areas and then for hospitals as a whole.
- ix. Conduct analyses that explore variations in hospital capacity and workloads and link these to geographic location.
- x. Conduct analyses that contrast hospital capacity and workloads to explore variation in 'productivity' with the potential of proceeding to more sophisticated analyses of hospital efficiency.
- xi. Support the wider data collection activities of the AFRHiCARE team including planning and taking part in county hospital surveys, development of REDCap databases and conducting data cleaning as necessary, stakeholder engagement and outreach to explain and share any findings.
- xii. Collaborate effectively with Kenyan and international team members within the AFRHiCARE partnership and plan, coordinate and summarise the results of meetings or workshops as directed by the supervisor.
- xiii. Contribute to the wider scientific activities of the Health Services Unit and the Nairobi Programme of KEMRI-Wellcome in Kenya.
- xiv. And any other duties that may be assigned from time to time.

QUALIFICATIONS:

The successful applicant will have:

- i. Recognised Postgraduate qualification (Masters) in epidemiology, global or public health.
- ii. A primary degree ideally in a health discipline.
- iii. At least three years working experience in related field, health research.
- iv. Evidence of research excellence based on prior publications in international peer-reviewed journals.
- v. Demonstrated experience in planning and undertaking document or scientific literature reviews.

- vi. Demonstrated experience in planning for and collecting, analysing and interpreting quantitative and qualitative data including prior experience with statistical packages R or STATA and qualitative analysis packages such as NVIVO.
- vii. Experience with REDCap with clear competence in database development, data entry, data cleaning and preparation of data for analyses.
- viii. Experience in undertaking research with diverse stakeholders and in a cross-cultural context.
- ix. Demonstrated ability to act with sound judgement, sensitivity, and flexibility, and to exercise initiative in adapting preferred approaches when and where required.

DESIRABLE:

- i. Detailed understanding of Level 4 and Level 5 hospitals in Kenya.
- ii. Demonstrated interest in health systems / services research as evidenced by relevant prior experience.

COMPETENCIES:

- i. Demonstrated ability to logically organise datasets, document metadata and keep good records of data management / wrangling.
- ii. Experience in developing an analytic plan and collating, analysing and interpreting data
- iii. Experience in use of quantitative analytical software.
- iv. Excellent range of skills across the MS Office suite
- v. Strong organisation/programme management skills with the ability to prioritise workloads and work within tight deadlines
- vi. Highly developed oral and written communication skills with ability to write clearly for a scientific audience and to present clearly to non-academic audiences
- vii. Ability to work independently and collaboratively in a team environment and to multi-task
- viii. Have high energy, clear goal orientation and a strong work ethic.

PHYSICAL ENVIRONMENT/CONDITIONS:

This position will be based in Nairobi with the potential for some travel to Kenyan hospitals.

APPLICATION PROCEDURE:

All applications for roles in KEMRI and its partners (including KWRP) are centrally applied for using https://www.kemri.go.ke/e-recruitment_portal. To apply for this post, you must register as a user. Log into your account, then proceed to the vacancies, view the post and click on the button: "Apply Now"

Applications which should include your CV, Cover letter, copies of certified academic certificates, testimonials and other relevant documents should be made through KEMRI Website

Successful candidates will be required to provide the following: Certificate of good conduct,

Higher Education Loans Board compliance certificate, KRA Tax compliance certificate, Ethics and Anti-Corruption Commission clearance.

Applicants are required to state their current/last salary.

Applicants are required to provide a valid email address and telephone number for communication regarding interview invitations. Only shortlisted applicants will be contacted. During the interview, shortlisted candidates must present the ORIGINALS of the following documents: National Identity Card or Passport, academic and professional certificates, academic transcripts, testimonials, a detailed curriculum vitae (CV), and a valid clearance certificate (Certificate of Good Conduct or its equivalent).

All the applications to be done through KEMRI Website [https://www.kemri.go.ke/e-recruitment portal](https://www.kemri.go.ke/e-recruitment-portal) on or before 27th May ,2026 by 12.00 p.m.

KEMRI IS AN EQUAL OPPORTUNITY EMPLOYER COMMITTED TO DIVERSITY; PERSONS WHO ARE ABLED DIFFERENTLY, WOMEN, YOUTH AND THOSE FROM MARGINALIZED AREAS ARE ENCOURAGED TO APPLY. DIRECT OR INDIRECT CANVASSING WILL LEAD TO AUTOMATIC DISQUALIFICATION. KEMRI DOES NOT CHARGE A FEE AT ANY STAGE OF ITS RECRUITMENT PROCESS INCLUDING APPLICATION, INTERVIEW AND PROCESSING OF OFFER LETTER. IF ASKED FOR A FEE, REPORT SUCH REQUEST IMMEDIATELY.