

HOSPITAL OUTCOMES OF NEWBORNS ADMITTED AFTER INTRODUCTION OF FREE MATERNITY SERVICES AT MOI TEACHING AND REFERRAL HOSPITAL, ELDORET, KENYA.

Muyonga J, Nyandiko W, Songok J

Moi University, School of Medicine, Eldoret.

Abstract

BACKGROUND: Kenya has undergone a series of dynamic changes in health care since independence. In June 2013, the Government of Kenya unveiled a free maternity policy in public facilities. There was approximately 10% increase in deliveries across the country in July 2013. The Neonatal Mortality Rate in Uasin Gishu county was 52/1000 live births in 2012 while patient staff ratio was 270:1. Sustainable Development Goals stipulate that we need to reduce NMR to less than 12/1,000 live births by 2030. The study aims to identify the gaps in the implementation of this new policy so as to improve on it for the future.

OBJECTIVE: To evaluate hospital outcomes of neonates 1 year pre-and post-implementation of free maternity services at Moi Teaching and Referral Hospital and their relationship to clinical staff.

METHODS:

Study site: Newborn unit at MTRH Eldoret, Kenya

Study design: Mixed methods cross sectional (qualitative and quantitative) study.

Study population: Newborns admitted at the newborn unit 1yr pre-and post-implementation.

Study method: A data form for patient admission, morbidity and mortality was abstracted from archived records for 1year pre-and post-implementation. Monthly clinical staff return records were used for patient staff ratio. Self-administered questionnaires with open and closed ended questions were issued to staff while key informant interviews were done to assess their perception of free maternity services and challenges faced.

Data management and analysis: Data analysis was done by STATA version 13; qualitative data was coded and analyzed thematically. Data was presented in graphs and frequency tables. Outcomes assessed were: number of patients discharged, referred, neonatal mortality and length of stay.

RESULTS: A total of 3953 babies were admitted (1700 pre-and 2253 post implementation of free maternity services). There was a 5% reduction in number of babies discharged; 5% higher mortality rate while no neonates were referred. Average length of stay post implementation ranged from 4-7 days. Post implementation, case fatality rate of gastroschisis decreased by 10.3%, while there was an increase in the following: extremely low birth weight 17.5%, neonatal sepsis 0.5%, birth asphyxia 2.7% and respiratory distress syndrome 3.8%. There was a positive correlation between the patient staff ratio and death rate whereby, the higher the patient staff ratio, the higher the death rate ($r=0.6$, $p=0.002$). Staff cited the following advantages after the change: free services for all; more patients were managed especially surgical cases and they had better outcomes, while the challenges cited were that staff were overworked due to overcrowding; lack of adequate resources and inadequate emergency equipment. The key informants also cited delayed reimbursements; inadequate funds to improve infrastructure and fewer clinical staff.

CONCLUSION: There was a higher mortality rate that was correlated with a higher patient to clinical staff ratio.

RECOMMENDATION: We recommend an increase in clinical staff numbers.