Methodological Evaluation of Urban Primary Care Networks in Ethiopia: A Randomized Field Trial for Clinical Outcomes Measurement

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Abstract

Urban primary care systems in Ethiopia are underdeveloped, leading to suboptimal clinical outcomes for patients. A methodological evaluation is needed to assess and improve these systems. A mixed-methods approach will be employed, including quantitative data collection through structured questionnaires and observational audits, supplemented by qualitative interviews with patients and healthcare providers. Statistical analysis will employ a linear regression model to estimate the impact of UCPCN interventions on patient outcomes, accounting for potential confounders. In preliminary findings, there is an observed directionality in favour of improved clinical outcomes among UCPCNs that implemented standardised care protocols, with a proportion of 75% showing significant improvements over baseline measures. The randomized field trial design will provide robust evidence to support the efficacy of UCPCN interventions in improving patient health metrics. Based on the findings, recommendations for policy and practice include scaling up standardised care protocols across all urban primary care networks and enhancing training for healthcare providers. Urban Primary Care Networks, Clinical Outcomes Measurement, Ethiopia, Randomized Field Trial Treatment effect was estimated with $text\{logit\}(\pi)=beta\,0+\beta^{\rightarrow}\,p\,X_i$, and uncertainty reported using confidence-interval based inference.

Keywords: *Ethiopia, Geographic Information Systems (GIS), Mixed-methods, Community Health Workers, Outcome Measurement, Randomized Controlled Trials, Spatial Analysis*

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