



# A Quasi-Experimental Evaluation of Health Systems Adoption in Ugandan Community Health Centres, 2000–2024

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## Author notes

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## ABSTRACT

**Background:** The adoption of formal health systems by community health centres in sub-Saharan Africa is critical for improving service delivery and health outcomes. However, robust empirical evidence on the drivers and rates of adoption remains scarce, particularly for longitudinal evaluations in resource-constrained settings.

**Purpose and objectives:** This case study aimed to evaluate the adoption rates of a standardised health management information system (HMIS) across a network of community health centres, and to identify the facility-level factors associated with successful implementation.

**Keywords:** *Health systems strengthening, Sub-Saharan Africa, quasi-experimental design, community health centres, implementation science, Uganda, adoption rates*

### Article Highlights

- Dedicated data officer roles were the strongest predictor of successful system adoption.
- Reliable electricity supply was a critical, often overlooked, facility-level factor.
- High staff turnover showed a strong negative association with sustainable integration.
- Quasi-experimental design provides robust evidence for health systems strengthening.

### Methodological Note

A difference-in-differences design analysed longitudinal administrative data from a panel of Ugandan community health centres, using a linear probability model with facility and time fixed effects.

*This longitudinal evaluation offers causal evidence for policymakers designing health system interventions in resource-constrained settings.*

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