

# Improving access to emergency obstetric care through better referral systems in rural northern Ghana

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**Problem:** Transport and referral system delays block access to essential emergency obstetric interventions among pregnant women in rural Ghana.

**Approach:** The Sustainable Emergency Referral Care (SERC) project aims to develop lasting improvements to emergency transport equipment, communication systems, patient triage protocols, and financing and supervision of the referral system to improve access and save lives.

**Local Setting:** The Upper East Region is the epicenter of community-based primary health care innovation in Ghana and has dramatically improved child survival despite high rates of poverty. However, geographically-dispersed populations and a lack of transportation infrastructure are a barrier to continued improvements in maternal and neonatal health.

**Relevant Changes:** SERC piloted several vehicles Lessons Learnt:

## Introduction

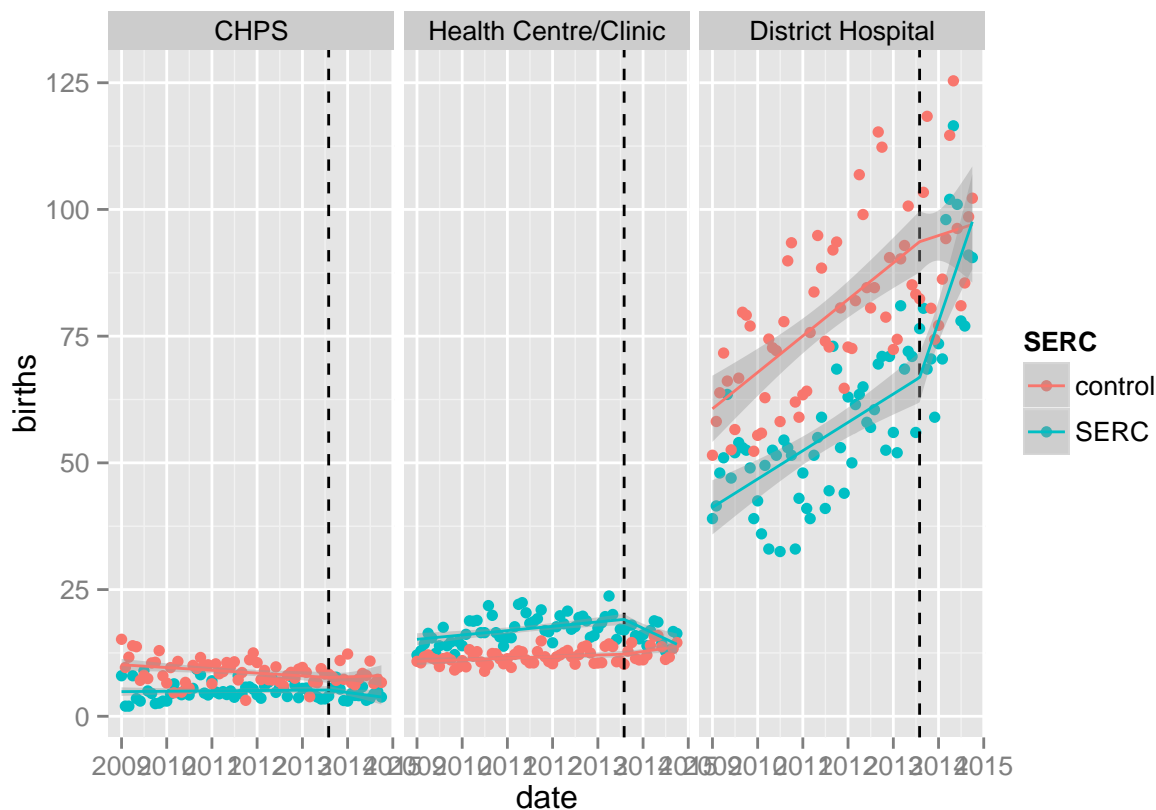
Cite fancy references [1].

## Methods

Data for the present study were derived from Ghana's District Health Information Management System (DHIMS) which records vital health statistics from all public health facilities in Ghana on a monthly basis. We consider only tallies of relevant indicators over the period 2009 to 2014, a period that includes a year and a half of data from fully operational SERC districts. The period prior to 2009 included only

We aim to estimate the impact of SERC services using piecewise spline regression to model change in mean facility reports of births, maternal deaths, and cesarian sections in the period before and after the implementation of SERC. The experience of SERC facilities is compared to that of a control group comprised of facilities in neighboring districts in the Upper East and Upper West Regions of Ghana. Controls were selected with careful consideration

## Results



## Discussion

## Material and Methods

You may title this section “Methods” or “Models”. “Models” is not a valid title for PLoS ONE authors. However, PLoS ONE authors may use “Analysis”

## Acknowledgments

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## References

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## Figure Legends

## Tables

1. Garnier S, Gautrais J, Theraulaz G (2007) The biological principles of swarm intelligence. *Swarm Intelligence* 1: 3–31. Available: <http://www.springerlink.com/index/10.1007/s11721-007-0004-y>.