

Appendix S1 – Reflexivity Statement.**Consensus statement on measures to promote equitable authorship in the publication of research from international partnerships.⁽¹⁾****Study conceptualisation****1. How does this study address local research and policy priorities?**

This study was conducted in a rural area of Maharashtra, India with high infant and under 5 mortalities, the reduction of which is a high global, national and local priority. Research into sustainable methods for mortality reduction have become top priorities for the local villages and Amravati district, as well as Maharashtra state and India. It is a global priority for achieving the SDG's .

2. How were local researchers involved in study design?

The local researchers Dr. Ashish Satav, Dr. Kavita Satav, Dr. Abhijit Bharadwaj, Mrs. Jayashri Pendharkar designed the study from the beginning. Dr. Ashish and Dr. Kavita realised the need of reducing very high malnutrition and mortality in this area and were involved in developing solutions for high mortality rates in this area, three years before starting the study. They realised that the low and delayed health seeking behaviour and scarcity of doctors were major causes of the high U5MR and IMR in this region. Hence the local researchers designed the home-based child care program to address health care needs of the community and to reduce U5MR and IMR.

Research management**3. How has funding been used to support the local research team?**

This project was funded by national and international funding agencies to support the recurring expenditure and salary expenses of the local research staff working in this project. Entire funds were utilized on activities by the local research team. The international researcher's contribution was voluntary and he was paid nothing for his involvement in this study.

Data acquisition and analysis**4. How are research staff who conducted data collection acknowledged?**

All investigators have been included as co-authors, and given priority as first author and the subsequent authors. Contribution made by the data collection team has been recognized in the acknowledgment section.

5. Do all members of the research partnership have access to study data? How have members of the research partnership been provided with access to study data?

All members of the research partnership have access to the study data. All data are housed on databases at the local site. The statisticians work with these databases to run analysis. All authors requested analyses that satisfied their individual probing of the data for consistency of data and completeness of data.

6. How was data used to develop analytical skills within the partnership?

The senior investigators arranged multiple meetings with the junior staff for the data analysis. The junior staff were trained by the statistician for data analysis throughout the entire study period. The data staff were given responsibilities to analyse the data locally as much as they can. Quality of data was assessed by the LMIC statistician and investigators. Local team members were actively involved in data analysis, and all data analysis was only done locally. Data was never sent out of the country.

Data interpretation

7. How have research partners collaborated in interpreting study data?

Five inclusive online and offline workshops were held during the process of data interpretation. The first two sessions served to define the issue of research and agreement that we should focus on the development of equitable partnership. At the conclusion of these two sessions, researchers formed working groups to conduct literature reviews. These reviews were reported back at a subsequent workshop where all partners collaborated to agree on recommendations and contents of the results and discussion sections. During final meetings, all the investigators interpreted the final study data with the help of data team. Local team members were involved in conception, design, data acquisition and data analysis.⁽²⁾

Drafting and revising for intellectual content

8. How were research partners supported to develop writing skills?

The research team for drafting and revising the intellectual content is predominantly composed of senior Indian investigators. The junior authors were supported by senior academics who worked in small groups to

develop and refine their writing skills. The senior author guided the Indian writing team for publication in international medical journals.

9. How will research products be shared to address local needs?

The study results will be disseminated with the local community members, key public representatives, local government health and integrated child development scheme staff (village to district level) and other local voluntary organisations and academicians. Advocacy meetings will be conducted with above external stakeholders who influences local policy changes and if needed public interest litigation will be filed for its implementation in all 300 villages of the two rural blocks of Amaravati district. For its wide dissemination in local community, we will use methods like community meetings, davandi (announcement in local language by a key person), pamphlets, street plays, one to one counselling, group counselling and audio-visual shows.

This study will be published in an open access platform. A post-publication dissemination plan has been devised to discuss the study findings and recommendations across a wide constituency of scientific fora and conferences. This will include interactions with research leaders engaged in setting national and international health priorities and other fields involved in national collaborations, and also with the media including press and journalists, based in Maharashtra state and other states of India. We propose to conduct advocacy meetings with government officers and other stakeholders who are especially dealing with the implementations of various health schemes and integrated child development schemes in the community and other voluntary organisations (NGOs, CBOs) and academicians for replication of the study in other parts of the country.

Authorship

10. How is the leadership, contribution and ownership of this work by LMIC researchers recognised within the authorship?

Authors Ashish Satav, Vibhawari Dani and Dhananjay Raje worked as part of the senior authorship team in developing this manuscript, and their contribution has been recognised as joint first and main co- authors respectively. We have specifically included researchers based in the USA (Eric Simoes) within the senior authorship team as last author. We acknowledge, that the authorship team is predominantly based in LMIC.

LMIC team members were given ample opportunity to sign off on the final manuscript version. ⁽²⁾ All LMIC authors agreed to be accountable for all aspects of the work in ensuring that questions related to the accuracy or integrity of any part of the work are appropriately investigated and resolved. ⁽²⁾

11. How have early career researchers across the partnership been included within the authorship team?

We have included early career researchers (Kavita Satav, Abhijit Bharadwaj, Jayashri Pendharkar) within the authorship team. They attended all the workshops, contributed to the literature review and evidence synthesis and for development of the consensus recommendations. They are based in India.

12. How has gender balance been addressed within the authorship?

Five authors are male (Ashish Satav, Abhijit Bharadwaj, Dhananjay Raje, Suresh Ughade, Eric Simoes) and three authors are female (Kavita Satav, Jayashri Pendharkar and Vibhawari Dani).

Training

13. How has the project contributed to training of LMIC researchers?

All the senior authors based in LMIC have contributed to the training of the early career research staff. The senior author from USA assisted with the planning of the analysis as well as assisted with writing, and as such contributed to training of all LMIC authors as well.

Infrastructure

14. How has the project contributed to improvements in local infrastructure?

This project has directly contributed to improvements in local infrastructure. This project has strengthened the research capacity of the local investigators, developed a resource pool of grass root manpower which can now do other research studies also. We could procure some logistics like vehicles and other valuable items, which can be used, for other projects even after the end of this research study.

Governance

15. What safeguarding procedures were used to protect local study participants and researchers?

We have conducted gram sabhas (community meetings) in all the villages before start of the study. Informed written consents were obtained from the senior key persons and 60% of the villagers for execution of the study. The pros and cons of the study were discussed with the villagers in detail. Participants were actively involved in the study from the beginning to the end of the implementation phase. The field level staff was selected by the community. Free services were provided to all the villagers during the study. Due to the extensive community involvement, the community actively supported the local study participants. For reporting adverse events, a fast-track (bottom to top) system was developed from village level up to investigator level. There was a provision of free treatment in the study hospital for any adverse events. All legal formalities specified as per the government norms were fulfilled. Government was an active partner for a substantial period of six years in this research study. Databases are in password protected databases behind firewalls, so study participant personal information is secure.

Local researchers were protected, as all research activities were governed by an Ethics committee and an IRB; the study had to pass scrutiny of the local gram sabhas (community meetings), needed 60% agreement of the villagers where the study was going to be done, and needed tribal department, Government of Maharashtra clearance. Thus, they were protected both from the ethical and law perspectives. Of course, as all data was kept at the local site all research data was under the complete control of the local researchers, and there was no question of the foreign entity using any data for non-sanctioned use. The local researcher's access to, control of and use of the data is absolute.

1. Morton B, Vercueil A, Masekela R, Heinz E, Reimer L, Saleh S, et al. Consensus statement on measures to promote equitable authorship in the publication of research from international partnerships. *Anaesthesia*. 2022;77(3):264-76.
2. Sam-Agudu NA, Abimbola S. Using scientific authorship criteria as a tool for equitable inclusion in global health research. *BMJ Glob Health*. 2021;6(10).