



## PERSPECTIVES

## The ripple effect: why promoting female leadership in global health matters

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Leadership positions in global health are greatly skewed toward men; the imbalance is more pronounced in low- and middle-income countries (LMICs). The under-representation of women in leadership is a threat to gender equality, and also impacts the improvement of women's health outcomes globally. In this perspectives piece, we assert that the promotion and retention of women in global health leadership has a ripple effect that can achieve improvement in global health outcomes. We present pragmatic, actionable solutions to promote and retain female global health leaders in this field.

Women are vastly underrepresented in global health leadership—only 54 (28%) of the 194 World Health Organization states employ a woman as their top health official. The gender imbalance is particularly pronounced in low- and middle-income countries (LMICs), where longstanding biases and structural inequalities prevent women from stepping onto the first rung of the career ladder, let alone ascending to the top.<sup>1–3</sup> The lack of female global health leaders is more than another example of inequity in the science, technology, engineering, and mathematics (STEM) fields; it undermines efforts to improve women's health globally.

Evidence of the problem is widespread. While most of the global health and development targets laid out in the United Nations Millennium Development Goals were achieved, those relating to women's health fell far short. Maternal deaths, for example, missed the targeted 75% reduction by nearly 200 000 annual deaths.<sup>4,5</sup>

Evidence shows that elevating women creates a ripple effect that benefits families, communities, and countries. Female political leaders in India promoted immunization programs, girls' education, and women's employment.<sup>6</sup> In the United States, female senators sponsored the Breast and Cervical Cancer Mortality Prevention Act to ensure preventive breast and cervical cancer screening for all women.<sup>7</sup>

Just as female doctors are crucial in delivering care around the world, female scientists play a critical role in conducting and advocating for women's health research. Female patients and study participants in LMICs often prefer female researchers over males due

to cultural or religious reasons.<sup>8,9</sup> These studies help shape health care policies. Women researchers are also more likely to conduct research on women's health. In a National Institutes of Health (Bethesda, MD, USA) program for scientists interested in women's health research, 19/24 (79%) principal investigators and 46/57 (81%) junior faculty trainees are women.<sup>10</sup> Efforts to increase the proportion of female leaders in global health research therefore play an important role in improving women's health globally.

## DEFINING THE PROBLEM

The inaugural Women in Global Health Research Symposium (<http://www.womenglobalhealth.com/events>) convened in 2015 to address gender-based challenges women face on the path to global health leadership. Over 60 female health researchers from seven countries on five continents attended. Attendees worked primarily in Africa (39%), Asia (13%), and the Americas and Caribbean (48%).

Both women who work in LMICs and women from LMICs reported major gender-based barriers. The type and severity of barriers experienced by each group, however, differed significantly. During medical school, colleagues from LMICs reported cases of professors demanding sex from female students in exchange for passing grades. In some international residency programs, symposium participants described an unwritten rule that pregnancy and maternity leave were prohibited and would result in failing the program. Because of this, several women chose the hardship of training far from their families (e.g., in Germany, Dominican Republic, Japan), spending a year learning a foreign language before they could commence medical training. Those who successfully transitioned to junior faculty continued to face challenges, such as being excluded from leadership meetings or expected to remain silent during high-level discussions. Attendees also noted that, in many LMICs, overtly sexist assumptions that women achieve leadership positions through nepotism or by exchanging sex for promotion remain commonplace. Women are thus doubly challenged—they are prevented from pursuing leadership positions, and they are punished for achieving them.

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## KEY WORDS

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## SOLUTIONS

If women's health is a global goal, so then must be the elevation of female health leaders. We recommend the following actions to retain and promote women from LMICs in global health research:

- 1 Investigators conducting research in LMICs should proactively recruit female trainees from LMICs. Institutions could 'twin' these trainees with investigators from high-income countries to work together, thereby building capacity.
- 2 An international mentorship network to connect women researchers, including women from LMICs, should be developed to provide advice on topics such as promotion, maternity leave, and sexual harassment.
- 3 Academic institutions in high-income countries should provide direct support for research and leadership training for women from partner institutions in LMICs.
- 4 Donor agencies should recommend implementation of a sexual conduct policy at all study sites, including LMICs. The policy should include clear definitions of gender bias and harassment, taking into account relevant cultural norms.
- 5 Funding organizations should prioritize high-impact women's health issues, including maternal health, sex/gender differences in health, and women's education and empowerment.

## CONCLUSION

Achieving health equity for women worldwide rightly remains a central priority in the newly formulated United Nations Sustainable Development Goals,<sup>4</sup> and we believe that increasing female leadership in global health research is part of the solution. The pragmatic, low-cost steps outlined above represent the beginning of a sustained initiative to support and retain women from LMICs

Les positions de dirigeant dans la santé du monde sont largement orientées vers les hommes et ce déséquilibre est encore plus prononcé dans les pays à revenu faible et moyen. La sous-représentation des femmes en termes de dirigeant menace l'égalité des genres et a également un impact sur l'amélioration de l'état de santé des femmes dans le monde. Dans cette perspective, nous

Los puestos directivos en materia de salud mundial se asignan de manera desproporcionada a los hombres; este desequilibrio es aun más notorio en los países de ingresos bajos y medianos. La subrepresentación de las mujeres en los cargos de responsabilidad pone en peligro la equidad entre los hombres y las mujeres y tiene además repercusiones en los resultados de salud de las mujeres en el mundo. En el presente artículo de opinión, se sostiene que promover

in global health research; this is where the need for female leaders is most acute. Investment from governments, foundations, and academic institutions in promoting female leadership will have a ripple effect that will improve the lives of women, families, and the global community.

## References

- 1 Downs J, Reif L, Hokororo A, Fitzgerald D. Increasing women in leadership in global health. *Acad Med* 2014; 89: 1103–1107.
- 2 George A. Human resources for health: a gender analysis. Background paper prepared for the Women and Gender Equity Knowledge Network and the Health Systems Network of the World Health Organization Commission on Social Determinants of Health. Geneva, Switzerland: WHO, 2007. [http://www.who.int/social\\_determinants/resources/human\\_resources\\_for\\_health\\_wgkn\\_2007.pdf](http://www.who.int/social_determinants/resources/human_resources_for_health_wgkn_2007.pdf) Accessed November 2016.
- 3 Cox C. Medical education, women's status, and medical issues effect on women's health in the Caribbean. *Health Care Women Int* 1997; 18: 3 83–893.
- 4 United Nations Development Programme. A new sustainable development agenda. New York, NY, USA: UN, 2016. [http://www.undp.org/content/undp/en/home/sdgoverview/mdg\\_goals.html](http://www.undp.org/content/undp/en/home/sdgoverview/mdg_goals.html). Accessed November 2016.
- 5 Alkema L, Chou D, Hogan D, et al. Global, regional, and national levels and trends in maternal mortality between 1990 and 2015, with scenario-based projections to 2030: a systematic analysis by the UN Maternal Mortality Estimation Inter-Agency Group. *Lancet* 2016; 387: 462–474.
- 6 Beaman L, Duflo E, Pande R, Topalova P. Female leadership raises aspirations and educational attainment for girls: a policy experiment in India. *Science* 2012; 335: 582–586.
- 7 Lee N, Wong F L, Jamison P, et al. Implementation of the National Breast and Cervical Cancer Early Detection Program: the beginning. *Cancer* 2014; 120: 2540–2548.
- 8 Amer-Alshiek J, Alshiek T, Amir Levy Y, Azem F, Amit A, Amir H. Israeli Druze women's sex preferences when choosing obstetricians and gynecologists. *Isr J Health Policy Res* 2015; 4: 13–23.
- 9 McLean M, Al Yahyaie F, Al Mansoori M, Al Ameri M, Al Ahbabi S, Bernsen R. Muslim women's physician preference: beyond obstetrics and gynecology. *Health Care Women Int* 2012; 33: 849–876.
- 10 National Institutes of Health. Summaries of co-funded research. Bethesda, MD, USA: Office of Research on Women's Health, NIH. <http://orwh.od.nih.gov/research/fundedresearch.asp>. Accessed November 2016.

affirmons que la promotion et la rétention des femmes au sein du leadership de la santé dans le monde a un effet d'entraînement qui peut aboutir à une amélioration de l'état de santé dans le monde. Nous présentons des solutions pragmatiques et réalisables pour promouvoir et retenir des leaders féminins en matière de santé dans le monde.

a las mujeres a las funciones directivas relacionadas con la salud mundial y facilitar su permanencia en ellas genera una reacción en cadena que puede dar lugar a mejores resultados de salud a escala mundial. Se proponen soluciones viables y prácticas encaminadas a estimular la presencia de las mujeres en los cargos de responsabilidad en materia de salud mundial y a respaldar su permanencia en esta actividad.