



## Planetary Health as a Central Context to the Sustainable Development Goals (SDGs)

Christiana Oluwatoyin Onabola<sup>1\*</sup>

<sup>1</sup> School of Health Sciences, University of Northern British Columbia, British Columbia, Canada.

ARTICLE INFO	
LETTER TO EDITOR	*Corresponding Author: Christiana Oluwatoyin Onabola
<b>Article History:</b> Received: 21 June 2019 Accepted: 10 August 2019	Email: onabola@unbc.ca Tel: 1-604-355-8231

**Citation:** Onabola CO. *Planetary Health as a Central Context to the Sustainable Development Goals (SDGs).* J Environ Health Sustain Dev. 2019; 4(3): 798-801.

The 2016 World Health Organization's Shanghai Declaration on Health Promotion - 'Promoting Health in the SDGs (Sustainable Development Goals)' - established a primal place for health promotion on the SDGs agenda and contextualized health promotion as a central framework of the 17 Sustainable Development Goals <sup>1, 2</sup>. However, there exist ongoing enquiries that identify gaps in this proposition and provide evidence to rather advance planetary health as a more appropriate central context to the SDGs.

From systems-thinking and socio-ecological perspectives, the concept of health goes beyond human well-being to include well-being of natural ecosystems, healthy transactions and flow of resources between humans and nature, in a manner that precludes vulnerabilities and inequities for humans and other socio-ecological systems <sup>3</sup>. Health promotion, however, acknowledges a socio-ecological analysis to health of human populations by considering the impact of social factors, actors and institutions, as well as abiotic and biotic components on human health <sup>4</sup>. It leaves gaps, as it does not explicitly capture how humans interact within their surrounding ecosystems and the impact of human health

interventions on biotic and abiotic components as well as on the integrity of planetary entities in socio-ecological systems. These gaps put holes in health promotion, which though embraces useful approaches and localizing ideas for human health, but lacks capacities to promote ecological health and human health as inseparable, co-evolving, co-dependent concepts in a coupled humanenvironment system. Such gaps also explain why advancement of human health and pursuits of environmental sustainability have long been treated as two separate domains of interventions <sup>5</sup>. The current state of health research has reinforced that the health of living systems is intrinsically linked with the health of their surrounding natural and human-made ecosystems <sup>6</sup>. Therefore, the attribution of health promotion, as an intrinsic core of the Sustainable Development Goals, should be progressed to embrace a more systems-thinking nuanced term, such as Planetary Health <sup>7-9</sup>.

## Parallel Dynamics of the SDGs and Planetary Health

The SDGs agenda space is a web of 17 interrelated and interacting goals set within the boundaries of coupled human-natural systems;

with nested socio-ecological components having multi-scalar patterns, overlapping dynamics, feedback loops, and resilience parameters <sup>10</sup>. In the same vein, planetary health is a systems-thinking paradigm that explores coupled human-natural systems draws on trans-disciplinary and approaches (wise stewardship) in wide-ranging fields such as public health, environmental science, ecology, anthropology, welfare economics. geography, policy, and organization theory <sup>11</sup>. It addresses the contemporary challenges of human progress and civilization, which threaten the health and wellbeing of humans and planetary resources <sup>11</sup>.

In 2015, the Rockefeller Foundation report on 'Safeguarding Human Health in the Anthropocene *Epoch*<sup>, 8</sup>, published in the Lancet Commission on Planetary Health, refers to Planetary Health as "the health of human civilization and the state of the natural systems (biodiversity, planetary entities and ecosystems resources) on which it depends <sup>8</sup>." To shed light on the complexities of the term 'human civilization,' it is a concept conditioned by socioeconomic freedom, human progress, economic and development, industrial technological advancement, urbanization, social movements, population growth, and increased flow of resources between humans and nature <sup>6</sup>. All of these factors are drivers of the global ecological change <sup>6</sup>. It is, therefore, apparent that planetary health draws on the established interdependencies of human health and natural ecosystems to lay emphasis on appropriate conduct and stewardship of economic, environmental, political, social, and cultural processes<sup>8</sup>. These processes which shape transactions and interactions of the human-natural systems should be conducted within planetary boundaries in order to avoid sabotaging the health humans and disrupting life-supporting of ecological systems (natural and human-made) that support humanity and our planet<sup>8</sup>.

Moreover, planetary health favours the achievement of sustainable human civilization, in its broad-ranging dimensions, with emphasis on approaches that are environmentally sound, socially and culturally responsible and appropriate <sup>12</sup>. As the challenges erupting from human civilization continue to emerge as sustainability challenges clogging the wheel of progress in the sustainable development agenda, how do we nurture efficient stewardship to ensure that advancement in human civilization stays within the planetary boundaries? Particularly, how do we design and coordinate implementation efforts of the 17 SDGs to avoid violating planetary boundaries or producing imbalance and conflicts with one another?

These questions bring home the utility of "systems and complexity thinking",<sup>12</sup> which is inherent in planetary health science as a way to unravel interconnections and inter-relationships and to address a broad array of issues that are overlapping and deeply intertwined <sup>10-12</sup>. Planetary health employs a whole-of-systems perspective and tackles extensive range of challenges driven by equally wide-ranging actors and factors in the social, economic, and environmental domains<sup>8</sup>, <sup>11</sup>. As opposed to current reductionist or siloed approaches employed in interventions to tackle challenges of the SDGs, planetary health offers a holistic, all-encompassing, and whole-of-systems approach to investigate all systemic parts, structures, conditions, processes, and functions culminating in a challenge. This facilitates unpacking inherent complexities and uncertainties. Hence, a SDGs intervention that is framed using a planetary health context at its core (as depicted in figure 1), will apply systems thinking to understand and frame the problem from diverse points of sustainability concerns and map complex, multi-scalar, and multi-dimensional pathways that produce the problem. Such an intervention will also mobilize collaborations that utilize the trans-disciplines<sup>13</sup>, capacities of sectors, geographies, and generations. These systemsthinking capacities amplify the spectrum of solutions, including nexuses that transcend conventional siloed approaches.

Systems thinking conditions planetary health as a unifying framework for the Sustainable Development Goals (SDGs), its implementers, researchers, solution designers and sectors. In 799

## Onabola CO.

order to have a clear perception of planetary health utilization in the SDGs, it is important to unpack all the complex dynamics between human civilization, natural systems, and each of the SDGs. Furthermore, complex realities and scalar dimensions of health should be deconstructed in the context of social-ecological systems<sup>14</sup>.

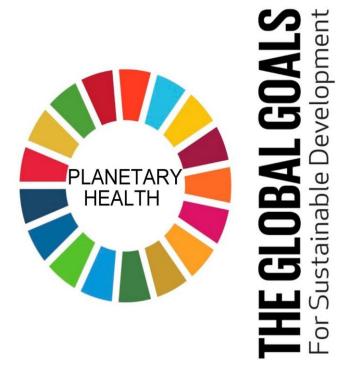


Figure 1: What should be? Planetary Health as a framework at the Core of the Sustainable Development Goals. Adapted from WHO<sup>2</sup>

This is an Open Access article distributed in accordance with the terms of the Creative Commons Attribution (CC BY 4.0) license, which permits others to distribute, remix, adapt and build upon this work for commercial use.

## References

- 1.World Health Organization. Promoting health in the SDGs: Report on the 9th Global conference for Health Promotion, all for health, health for all [cited November 21;2016].
- 2.Kickbusch I, Nutbeam D. A watershed for health promotion: The Shanghai Conference 2016. Health Promotion International. 2017;32(1):2-6.
- 3.Bircher J, Kuruvilla S. Defining health by addressing individual, social, and environmental determinants: new opportunities for health care and public health. Journal of public health policy. 2014; 35(3):363-86.

- 4. Parkes M, Horwitz P. Ecology and ecosystems as foundational for health. In H. Frumkin (Ed.), Environmental Health: From Global to Local. Wiley, 2016; 3rd ed:27-5.
- 5.Parkes MW, Morrison KE, Bunch MJ, et al. Towards integrated governance for water, health and social–ecological systems: The watershed governance prism. Glob Environ Change. 2010;20(4):693-704.
- 6. Hancock T, Spady DW, Soskolne CL. (Editors). Global change and public health: Addressing the ecological determinants of health: The report in brief: Canadian public health association discussion paper; 2015.
- 7.Buse CG, Oestreicher JS, Ellis NR, et al. Public health guide to field developments linking ecosystems, environments and health in the Anthropocene. J Epidemiol Community Health. 2018;72(5):420-425.

Jehsd.ssu.ac.ir

800

- 8. Whitmee S, Haines A, Beyrer C, et al. Safeguarding human health in the Anthropocene epoch: Report of The Rockefeller Foundation-Lancet Commission on planetary health. The Lancet. 2015;386(10007):1973-2028.
- 9. World Health Organisation. Ottawa Charter for Health Promotion, First International Conference on Health Promotion Ottawa [cited November 21;1986].
- 10. Nilsson M, Griggs D, Visbeck M. Policy: Map the interactions between sustainable development goals. Nature. 2016;534:320-2.

- 11. Cole J. Planetary Health: Human health in an era of global environmental change. CABI: CABI Wallingford, United Kingdom. 2019.
- 12. Charron DF. (Ed.) Ecohealth research in practice: Innovative applications of an ecosystem approach to health. Insight and Innovation in International Development; 2012.
- 13. Mack D. The bigger picture of planetary health. The Lancet Planetary Health. 2019;3(1):e1.
- Zywert K. Human health and social-ecological systems change: Rethinking health in the anthropocene. The Anthropocene Review. 2017; 4(3): 216–238.

801