

**Dear Editor:**

I am writing in response to the opinion essay submitted by Wang, where the expansion of the PA profession in Canada was discussed (Wang, 2019). The opening question of, "What role can physician assistants (PAs) play in the health care system in Canada" was addressed by considering the shortages of health human resources within Canada's health care system, particularly that of physicians, and how there is an economic benefit to employing PAs to address this shortage and relieve healthcare expenditures and pressures (Wang, 2019). While I agree with the points mentioned, I believe that this perspective may be enhanced through the view of complexity theory.

PAs have often been referred to as "physician extenders" who augment a physician's practice (<http://www.mhpnetwork.ca/paca.html>). I think that this description is incomplete, and I would offer that PAs are physician extenders as well as *physician connectors*, and that their holistic value, merit, and worth is found in not only extending a physicians' practice and the associated economic arguments for this, but it is *also found in how PAs connect patients and providers within the health care system*. PAs are trained as generalists, who have the ability to specialize in an area, such as primary care, surgery, and other community, clinic, or hospital-based roles. This adaptability brings unique value to the health care system.

When we consider this adaptability, complexity theory becomes a lens to consider. Complexity theory is useful when we find ourselves within systems where behaviours and processes cannot be reduced to a single entity, and prediction of future behaviour is uncertain. Health care systems an example of such complex systems, and we must engage with complexity theory when we try to research and make sense of these systems (Greenhalgh, Papoutsi, 2018). Through the lens of complexity theory, when adaptability emerges, prediction becomes tricky. Therefore, to address the pressures of the health care system by focusing on increasing supply of PAs because they are able to supply more for less, may miss opportunities to explore *how* and *why* PAs are able to supply more for less. By viewing PAs and health human resources in a broader systems view though complexity theory, we can see the richness that comes within the interactions of individuals within the system, *as well as* the individuals themselves. To the question posed by Wang (Wang, 2019), I would offer that the role of the PA in the health care system is to continue to offer starting points for emergence through their adaptability within complexity. I would recommend that future work in the area of health human resources and health care systems consider adaptability *as well as* supply of PAs.

**Reference**

1. Wang, Z. Why Canada Should Expand the PA Profession. Journal of Canada's Physician Assistants [Internet]. 2019 Jan 7 [cited 2019 Oct 15]; 1(2):50-55. Available from <https://ojs.lib.umanitoba.ca/index.php/jcpa/article/view/680>
2. Greenhalgh, T, Papoutsi, C. Studying complexity in health services research: Desperately seeking an overdue paradigm shift. BMC Medicine [Internet]. 2018 Jun [cited 2019 Oct 15]; 16(1):1-6. Available from <https://bmcmmedicine.biomedcentral.com/articles/10.1186/s12916-018-1089-4>