Editorial

Frontiers of health policy research

MICHAEL K. GUSMANO

Associate Professor and Concentration Director in Health Systems & Policy, Rutgers University, New Jersey, USA Research Scholar, The Hastings Center, New York, USA

JAN-KEES HELDERMAN

Associate Professor in Public Administration, Institute for Management Research, Radboud University, Nijmegen, The Netherlands

If the enhancement of human freedom is both the main object and the primary means to development (Sen, 1999), then good individual and population health are both ends and means to development and freedom in all countries, regardless of their current ranking on the Human Development Index or other indexes on wealth, prosperity and well-being. Health contains many challenging issues in this respect. To name but a few: the development of promising, but expensive, medical therapies (technological innovations), rapidly increasing health care budgets (fiscal constraints), population aging and the growth of chronic illness (and the deeper demographic changes and epidemiological transitions) all pose major challenges to societies around the world. There is an increasing awareness among both health academics, coming from many different disciplines, and health policy-makers that health (care) policy is highly related with a wide range of social and economic (policy-) fields and that the causal arrows between ends and means, or cause and effect, point in many different directions. In local, national and transnational policymaking, health is a cross-cutting issue of utmost importance and the field of health harbours a multi-disciplinary assembly of academic and non-academic experts.

To acknowledge these cross-cutting qualities of health is one thing, but to really engage in fruitful exchange and reflections with health-interested companions from other disciplines or with other tasks (e.g. health policy-makers vis-à-vis health academics) is quite another. For, one would first have to be able to meet your health-interested companions and, with so many different disciplines from different countries, there are hardly any venues that bring them together.

The inaugural International Health Policy Conference (IHPC), which was held at the London School of Economics & Political Science (LSE) from 16th to 19th February 2017, aimed to be such a venue by bringing together both academics and

^{*}Correspondence to: Michael K. Gusmano, 683 Hoes Lane West, Room 311, Piscataway Township, NJ 08854 USA. Email: mkg93@sph.rutgers.edu

policy-makers from a wide range of disciplines to explicitly take a multidisciplinary approach to key health and social care issues. In this special issue of Health Economics, Policy and Law we present a small selection of papers that were presented in draft and discussed at length at the IHCP 2017. The conference itself gave ample opportunities to discuss these and other papers from a thematic perspective so that different disciplinary views and perspectives could benefit from each other's insights. We hope that the papers in this special issue, which we consider to be frontiers in health policy research, remind us of the importance of such venues and that they aspire to help policy makers and the public better understand the emerging challenges we face and assess the implications of potential solutions to them.

This special issue on the 'frontiers in health policy research' focuses attention on three distinct areas of inquiry. One set of papers analyses efforts to improve the quality of care and increase the value of care that health systems purchase. A second set of articles focuses on issues of health behaviour and social determinants of health. Finally, the third set of articles presents differing views on how to predict the adequacy of supply of medical professionals. The range of these articles illustrates, not only the exciting breadth of health policy research, but the degree to which scholars within this field are addressing issues of high importance to policy makers around the world. We think it is fair to claim that all of the articles address issues that are on the 'frontier' of health policy in the sense that they attempt to provide answers to questions that policy makers around the world are currently grappling with.

Great value for money in health care: Calls for generating greater 'value' in health care are ubiquitous. Efforts to assess health technology and conduct formal comparative effectiveness research (CER) have a long history. The National Institute for Health and Care Excellence (NICE) in England has long been a leader in this area and is often held up as a model, not just because of its impact on health spending, quality or access to care, but because of the broad acceptance of NICE recommendations. As the articles in this special issue illustrate, however, governments around the world are trying to improve their capacity to conduct this analysis and incorporate it into public policy.

Efforts to make sure that health technologies generate sufficient value to justify public expenditure are always controversial. Inevitably they involve clashes of epistemology, economic interests and political ideology (Maschke and Gusmano, 2018). The legitimacy of the recommendations that CER agencies develop is a key issue. The article by Ozierański and colleagues compares the practices of the Polish Agency for Health Technology Assessment and NICE. The article by Csanádi and colleagues explores the application of CER in Hungary. Both articles on CER highlight the value of developing a transparent process for assessing new technologies. While Ozierański and colleagues document high levels of transparency in Poland, Csanádi and colleagues find that there is far less transparency and stakeholder engagement in Hungary. Despite the fact that 'Hungarian HTA

organisation, fulfilled its formal role envisaged in the legislation' (Csanádi *et al.*, 2018), its failure to operate with sufficient transparency undermines the impact of the agency on policy.

The issue of transparency plays a different, but equally important role in policies designed to improve health system performance through 'benchmarking'. In this context, transparency serves as a mechanism that motivates professionals to improve their performance. Bevan and colleagues (Bevan, 2018) compare attempts to use benchmarking in three different health systems: Italy, England and Zambia. Disappointed with the policies that either rely on self-regulation or market competition among providers to improve the performance of health care systems, all three of these countries have implemented benchmarking policies that draw on the principles of reciprocal altruism (Bevan, 2018). England introduced a star rating system for hospitals that resulted in public reporting of hospital rankings based on about 40 indicators, including waiting times, clinical outcome indicators and patient satisfaction. Zambia published maternal mortality statistics with comparisons to other countries in the region. In Italy, the Tuscan Performance Evaluation System (PES) involves public reporting of district level performance on six dimensions. The system is 'organised at regional level' and the 'results are presented to meetings of the senior managers and clinicians, and heads of departments of the districts and region every six months' (Bevan, 2018). In all three countries, the use of benchmarking resulted in improved performance. Bevan and colleagues argue that all three rely on reputation to motive change, but do so in different ways. Reflecting on their empirical findings and placing them in the context of theoretical work in behavioural economics, they encourage policy makers to develop regulatory regimes that harness different kinds of reputation effects.

Addressing the social determinants of health: Thanks to leaders in social epidemiology, the importance of social and economic determinants of health is well known. In recent years, policy makers and health system leaders have started paying greater attention to these issues. Social and economic factors, including the characteristics of the neighbourhoods in which people live (Diez Roux, 2016), have a profound influence on physical and mental health (Adler et al., 2016; Wilkinson and Marmot, 2003; Yen and Syme, 1999). Although there is a vigorous debate about whether the relationship is causal (Kawachi and Blakely, 2001), community SES measured as median household income is strongly associated with poor health, even controlling for individual income. There is also substantial evidence that social and economic factors not only influence health status, but the use of health services and health care spending. Older people who receive adequate nutrition are less likely than those who do not to be hospitalised and less likely to need institutional long-term care (Samuel et al., 2018; Zielinskie et al., 2017). The recognition that social determinants can have an important effect on the use of health care services has led to calls for hospitals to play a key role in addressing these factors. One proponent argues that the 'time is right' for Academic Medical Centers to address social determinants that effect population health (Gourevitch, 2014). In this issue, two articles provide evidence for strategies that are effective in addressing social determinants.

Smoking has long been a target of policy makers and public health experts. Studies have explored the impact of advertising, taxation and restrictions on smoking in public, among other interventions, on this behaviour. The article by Cannonier and colleagues (2018) investigates whether the existence of antismoking policies has an effect on the behaviour of college students, who have higher rates of smoking than the general public. They find that smoking bans not only reduce rates of smoking, they are correlated with increased academic performance.

The article by Skordis and colleagues (2018) emphasises the role of family networks in health seeking behaviour. Drawing on evidence from Nepal, they find that extended family networks can have a negative impact on women's health behaviour. This work reminds us that policies designed to improve health behaviour must be sensitive to the complex ways in which the social networks of target populations may undermine, subtly, the goals of those policies.

At a more macro level, the article by Baker and colleagues explores the relationship between government expenditures and infant mortality rates (IMR), with a particular focus on within country inequalities in IMR. Using data from 48 low and middle income countries, they find that higher government expenditure as a percentage of gross domestic product is associated with reduced inequalities in IMR. These results are stronger in countries with a democratic form of government. Consistent with the literature on social determinants, non-health spending, rather than health spending, is the factor that seems to drive reductions in inequality in IMR. The authors are unable to disaggregate further to better understand what types of government expenditures are helping to reduce inequalities in IMR, but they speculate that it may be efforts to expand basic incomes (Baker *et al.*, 2018) and call for research with more disaggregated data to help us better understand the causal pathways.

Future needs and workforce planning: Finally, the health care workforce paper and commentaries on it are the most explicitly forward-looking of these papers and illustrate how policy research attempts to identify future challenges and respond to them. Scheffler and Arnold (2018) use per capita income, out-of-pocket health expenditures and population ageing to estimate the demand for health care services – and use this to project the need for physicians and nurses in the countries that make up the Organisation for Economic Cooperation and Development (OECD). They project that there will be a shortage 'of nearly 400,000 doctors across 32 OECD countries and shortage of nearly 2.5 million nurses across 23 OECD countries in 2030' (Scheffler and Arnold, 2018).

In his critique of their work, Birch (2018) argues that, like other models that attempt to predict demand for health care services, Scheffler and Arnold assume a continuation of the status quo (with the exception of demographics) and 'fail to

recognise that public intervention in health care systems arises from market failure in health care and the absence of an independent demand for health care' (Birch, 2018). He argues that projects which assume the continuation of current practice will 'perpetuate inefficiencies in the form of overutilisation of services on the one hand and unmet needs for care on the other' (Birch, 2018). Scheffler and Arnold respond by pointing out that it is important to distinguish between future demand and future need.

This exchange helps to illuminate the importance of untangling assumptions nested, not only within the Scheffler and Arnold projections, but others like it. The thoughtful, interesting and respectful exchange of ideas between Birch and Scheffler and Arnold also reminds us that, at its best, the academy may serve as a model for how to deliberate about ideas.

Given the current state of politics around the world, that alone may be an important contribution of the IHPC 2017 and of this special issue. But we should not stop here, nor is it simply a matter pushing the frontiers of health policy research further. In fact, there is an urgent need to accept that this cross-cutting endeavour becomes part of normal academic work and policy-making. To that end, we invite our health-interested companions to continue to explore the 'boundary objects' (Star and Griesemer, 1989) of our field(s) that enable us to align our knowledge and to learn about the many differences and dependencies across the boundaries of the disciplines, countries and policy sectors we work in, encompassed by our shared concern with health as both an end and a means to prosperity and developmental freedom.

References

- Adler, N.E., Cutler, D.M., Fielding, J.E., Galea, S., Glymour, M.M., Koh, H.K. and Satcher, D. (2016), Addressing social determinants of health and health disparities: a vital direction for health and health care. National Academy of Medicine, September 19. https://nam.edu/wp-content/uploads/2016/09/Addressing-Social-Determinants-of-Health-Disparities.pdf.
- Baker, P., Hone, T., Reeves, A., Avendano, M. and Millett, C. (2018), 'Does government expenditure reduce inequalities in infant mortality rates in low- and middle-income countries?: a time-series, ecological analysis of 48 countries from 1993 to 2013', *Health Economics*, *Policy and Law*. doi:10.1017/S1744133118000269.
- Bevan, G., Evans, A. and Nuti, S. (2018), 'Reputations count: why benchmarking performance is improving health care across the world', *Health Economics*, *Policy and Law*. doi:10.1017/S1744133117000561.
- Cannonier, C., Burke, M.G. and Steward, K. (2018), 'Smoking, health and academic outcomes: evidence from a limited smoking campus policy', *Health Economics, Policy and Law.* doi:10.1017/S1744133118000245.
- Csanádi, M., Löblová, O., Ozierański, P., Harsányi, A., Kaló, Z., McKee, M. and King, L. (2018), 'When health technology assessment is confidential and experts have no power: the case of Hungary', *Health Economics*, *Policy and Law*. doi:10.1017/S1744133118000051.

- Diez Roux, A.V. (2016), 'Neighborhoods and health: what do we know? What should we do?', *Am J Public Health*, **106**(3): 430–431.
- Gourevitch, M.N. (2014), 'Population health and the Academic Medical Center: the time is right', *Academic Medicine*, 89(4): 544–549.
- Kawachi, I. and Blakely, T.A. (2001), 'When economists and epidemiologists disagree', *Journal of Health Politics*, *Policy and Law*, **26**(3): 533–541.
- Maschke, K.J. and Gusmano, M.K. (2018), Debating Modern Medical Care Technologies: The Politics of Safety, Effectiveness, and Patient Access, Santa Barbara, CA: Praeger/ABC-CLIO.
- Ozierański, P., Löblová, O., Nicholls, N., Csanádi, M., Kaló, Z., McKee, M. and King, L. (2018), 'Transparency in practice: evidence from "verification analyses" issued by the Polish Agency for Health Technology Assessment in 2012–2015', *Health Economics, Policy and Law.* doi:10.1017/S1744133117000342.
- Samuel, L.J., Szanton, S.L., Cahill, R., Wolff, J.L., Ong, P., Zielinksie, G. and Betley, C. (2017), 'Does the Supplemental Nutrition Assistance Program affect hospital utilization among older adults? The case of Maryland', *Population Health Management*. doi:10.1089/ pop.2017.0055.
- Sen, A. (1999), Development as Freedom, Oxford: Oxford University Press.
- Skordis, J., Pace, N., Vera-Hernandez, M., Rasul, I., Fitzsimons, E., Osrin, D., Manandhar, D. and Costello, A. (2018), 'Family networks and healthy behaviour: evidence from Nepal', *Health Economics, Policy and Law.* doi:10.1017/S1744133118000130.
- Star, S.L. and Griesemer, J.R. (1989), 'Institutional ecology, translations and boundary objects: amateurs and professionals in Berkeley's Museum of Vertebrate Zoology, 1907-39', *Social Studies of Science*, **19**(3): 387–420.
- Wilkinson, R. and Marmot, M. (eds) (2003), *The Solid Facts*, Second Edition, Denmark: The World Health Organization.
- Yen, I.H. and Syme, S.L. (1999), 'The social environment and health: a discussion of the epidemiologic literature', *Annual Review of Public Health*, **20**: 287–308.
- Zielinskie, G., Samuel, L.J. and Szanton, S. (2017), 'To improve health and reduce costs for low-income seniors, invest upstream' *Health Affairs Blog*. BDOI 10.1377/hblog20171024.786928.