Clinical governance reviews

Illuminating the dark corners: using research to facilitate sustainable health care

Introduction

In the classification of evidence informing clinical practice, quantitative research and more specifically the randomized control trial (RCT), had often been considered the research design that carried the most influence (Sullivan, 2011). Cases such as the thalidomide disaster of the 1960s strengthened the safety argument for rigorous independent trials of new drugs before they were unleashed on the public (Bothwell *et al.*, 2016). RCT is the design least subject to bias and confounding, but because compliance to protocols is enforced, the RCT measures efficacy (outcomes under ideal compliance) rather than effectiveness (outcomes under real-life conditions). However, the only way of determining how patients or clients feel about a treatment is through the use of qualitative methods. Because of the importance of the client voice, there is a growing trend for combining quantitative and qualitative methods in clinical research (Hansen *et al.*, 2016).

The qualitative connection

In some situations, such as public health initiatives, the only way certain types of information can be gained is through a qualitative research. Questions such as why do interventions designed to help people change behaviour (e.g. smoking cessation, weight loss, increasing exercise levels) initiate a change in some people's behaviour but not in others and can only be answered by collecting data about people's attitudes, values, lifestyle choices and emotions. Other public health questions, particularly those relating to knowledge and understanding can be answered through quantitative methods such as a randomized closed question survey. This was the data collection tool used by Rosales *et al.* (2017) to investigate knowledge about the Zika virus in Honduras.

Three of the articles in this issue of *IJHG* have a common theme of investigation into some of the pressing issues around sustainability faced by health care providers today. These range from how to increase the acceptability of digital health technology, through gaining an understanding of the public's knowledge about a current international health crisis, to understanding the barriers blocking implementation of evidence-based health care management in the English-speaking Caribbean. Two of these studies employ a qualitative research approach while the third uses a cross-sectional closed survey technique. While this research design was selected in order to collect statistics concerning a population's knowledge about a current health crisis, the fact that the survey was collected by face-to-face interviews allowing for clarification and expanded responses means that it shares some characteristics with more qualitative techniques.

The outlier in this group is a discussion paper about restructuring the American health service from an illness model to a wellness model by using a team approach to interactions between the service user and their primary care provider. The fact that an increased number of Americans were able to access health care with the implementation of the Affordable Care Act (ACA or "Obamacare") improved the potential sustainability of this model of care. Some objective observers, while applauding the increased access to health care that the ACA provided to many Americans, would suggest that the initiative did not go far enough towards the provision of universal health care. There are certain American physicians who have recognised the inherent inequalities in the US medical system for some time and have

proposed that the only way to ensure medical coverage for all Americans would be by the introduction of a single payer system similar to the one enjoyed by Canadians (Lasser *et al.*, 2006). However, this enhanced access to health care may be substantially impaired by the new Republican administration as they attempt to repeal the act that established the ACA and replace it with an alternative which meets their political agenda without breaking campaign promises to millions of people concerned about their coverage.

Sustaining digital health innovations
Sustainability is undoubtedly a growing concern in today's health care industry (Pencheon, 2016). With rising costs, staff shortages and more technically aware service users, any innovation in care that cannot demonstrate sustainability is unlikely to get off the ground. One area of health care that has high potential sustainability is digital health. This has the ability to deliver interventions without costly GP or hospital visits and can be accessible at any time in a 24-hour cycle. Consumers of health care are becoming increasingly technology literate and this is particularly true for younger service users so it could be argued that health care provision to young people should make more extensive use of digital technology. This was one of the drivers behind the Breaking Free Group's launch of Breaking Free Online (BFO), which is a computer-assisted therapy (CAT), designed for substance misusers. The Breaking Free Group was established as an independent enterprise following two years of work to develop the BFO CAT and is currently commissioned by the prison service, the NHS, charities, local authorities and the third sector providers to deliver their evidence-based intervention, which is compliant with current NICE guidelines. While CAT bypasses the long waiting list of other psychosocial therapies, such as CBT, there have been issues with compliance. Elison *et al.*'s (2017) article reports on the findings of a qualitative research project carried out in conjunction with the charity Change, Grow, Live that explored this and other challenges such as a continuing preference for face-to-face interaction. The analysis of data from interviews with 18 stakeholders will be used to help make the BFO CAT a more sustainable therapy.

Sustainability in a public health campaign
Public health is another area where sustainability is a key attribute of a successful campaign. In order to spread a public health alert, members of the target population must accept ownership of the message and disseminate it among their own social groups. Rosales *et al.* (2017) conducted a cross-sectional survey in Honduras to find out how much the public knew about the current Zika virus outbreak. Honduras currently has the highest Zika virus status in Central America. This study found that although 80 per cent of people knew about the Zika virus and understood that it was transmitted by mosquito bite, only 20 per cent were aware of sexual or vertical transmission. A sizeable minority of people questioned knew about one condition with which the Zika virus is associated (microcephaly) but fewer people were aware of its association with Guillain-Barré syndrome, an auto-immune disease which attacks peripheral nerves causing neuromuscular weakness or paralysis.

The WHO recommendations to reduce the transmission of the Zika virus focusses on dissemination of comprehensive information about the virus, including symptoms of infection and steps that can be taken to reduce transmission such as clearing away standing water, using mosquito nets, use of condoms to prevent sexual transmission and the use of repellents and insecticide.

Overall, this survey indicated that about 50 per cent of respondents felt that they did not have enough information about the Zika virus. Men and adolescents, who indicated radio and television as their primary information sources, were the least well informed and in need

of information specifically targeted to their needs. Women reported local health clinics as a source of their information and tended to have better levels of knowledge.

Sustainability of equal-access health care

How a population accesses information about health care, and then puts it into practice is highly influenced by the structure of health care in any particular setting. A universal model of health care that is free at the point of delivery could be presumed to have a higher rate of success in public health initiatives. In recent years, the USA moved from a model of health care dominated by the private health insurance industry to one which began to open up health insurance to people who had been unable to obtain insurance at affordable rates due to pre-existing health conditions. This initiative did not go far enough according to some experts but it was a start in addressing the dichotomy that the USA, one of the world's richest and most developed countries, has some of the poorest health outcomes. This enhanced access to health care is very likely to be substantially impaired by the new Republican administration as they repeal the act that established the ACA and replace it with an alternative that meets their political agenda of less government intervention.

Regardless of how health care is financed, improvements can be made through developing a better understanding of a community's primary care needs, then meeting those needs more effectively by restructuring care, using a wellness model which employs a multidisciplinary team (MDT) approach to care. McGough et al. (2017) report on a new model of primary care that, if widely implemented, could provide a cost-effective tool to improve the health of Americans. This model uses a LEAN methodology, first identified by Toyota to improve their production systems (Persoon et al., 2006), which helps to identify and eliminate non-essential activities at each point in the patient journey. It relies on the MDT approach, which encourages all team members to practise at the top of their professional responsibility. Sustaining this model of health care gives the patient an active role in their own health as they work in partnership with the MDT. This is a role that requires active learning on the part of the patient as traditional health care models have placed the health provider (usually a doctor) in the role of expert while the patient has adopted the role of passive recipient. The enhanced roles of non-medical staff are also highlighted within this model, as everyone in the MDT is aware of how vital they are to the patient care journey. Nurses, paramedics or other members of professions allied to medicine may take on roles or tasks that were previously assigned only to doctors, while receptionists and other administrative staff can take responsibility for tasks such as ensuring patients receive reminders about appointments or are encouraged to close gaps in their care when they arrive for other appointments. For instance, if a receptionist, checking patient's medical notes in preparation for a scheduled appointment, identified that she had not had an influenza vaccination, the patient could be asked if she wishes to have the inoculation during the current visit.

Increasing sustainability through evidence-based management

The final article under review is concerned with health care management across the English-speaking Caribbean region. In management, as in all aspects of health care, adopting an evidence-based approach has become increasingly important. Greaves (2017) conducted a Grounded Theory study with 20 senior health care managers from across the English-speaking Caribbean. The study found that although managers were aware of the importance of using evidence to inform management practice, they continued to take an approach to management that was largely based on anecdotal evidence and intuition. Citing lack of technical expertise or political will for change, managers expressed an interest in evidence-based management but doubted their ability to implement it. Clearly, this is not sustainable in a modern health care culture and requires changes in infrastructure to

support the introduction of an evidence-based approach to management. Some suggestions from the findings were the need for more trust between public and private health care providers so that they can share information and resources and also the provision of appropriate technical support and training for managers. In order to use evidence, managers need to know how to find, evaluate and disseminate information informing their practice.

There are some good indicators that health care and health care management in the region are on track to develop increasing sustainability. These include the establishment of the Caribbean Public Health Agency (CARPHA) in 2011 which was operationalized in 2013, and the Evidence informed decision making network of the Caribbean (EvIDeNCe) which was launched by CARPHA in 2015. These agencies are helping to improve communication and dissemination of information including evidence to inform both health care practice and management.

Conclusion

Sustainable health care involves a number of factors, all working together to create a culture where evidence, innovation, team work and empowering service users become the norm. The articles in this issue of *IJHG* varied but they all contributed important pieces of information to the jigsaw puzzle that, when all the pieces are in place, reveals a picture of effective and sustainable health care for all.

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