
Publisher's PDF, also known as Version of record

Link to published version (if available):
10.15694/mep.2016.000144

Link to publication record in Explore Bristol Research
PDF-document

This is the final published version of the article (version of record). It first appeared online via AMEE at http://www.mededpublish.org/manuscripts/704/v1. Please refer to any applicable terms of use of the publisher.

University of Bristol - Explore Bristol Research

General rights

This document is made available in accordance with publisher policies. Please cite only the published version using the reference above. Full terms of use are available: http://www.bristol.ac.uk/pure/about/ebr-terms.html
This article documents the experiences of two dental educators with responsibility for teaching the Social and Behavioural sciences components of an undergraduate dental programme in the United Kingdom (UK). Many dental undergraduates struggle to see the relevance of behavioural and social science components to their training as dentists, similar to the experiences of medical students. This opinion piece will outline some of the key challenges faced by dental students when studying a social and behavioural science curriculum. It will conclude with an outline of a research project designed to learn more about the learning journey of dental students with the social and behavioural sciences that is currently in progress.

The hegemony of the biomedical model in medical curricula (Litva & Peters, 2008) has led many to comment that the social and behavioural sciences have been epistemologically side-lined and methodologically devalued in medical education (e.g. McKendree, 2016; D’Eon, 2016). Relatedly, Albert, Paradis and Kuper (2015) found that social science staff employed in medical schools may struggle for professional acceptance and be challenged in the legitimacy of their non-biomedical/interpretivist perspective by colleagues and faculty members. The authors of this commentary share these feelings of being the ‘poor relations’ (McKendree, 2016) in dental education: we perceive that social and behavioural scientists are under-represented in many UK dental schools and that their teaching and learning issues go largely unreported in dental education. With this in mind, we have utilised this call for papers on ‘Teaching Social and Behavioural Sciences in Medicine’ to share some of the challenges that surround the teaching and learning of social and behavioural sciences in dentistry. These reflections are not exhaustive but have been informed by our reflective practice and
formal and informal student feedback. We suspect many of these experiences will be a similar to those experienced by this publication’s readership. By sharing our teaching issues with those in medical education we hope to contribute to the ‘communities of practice’ (Wenger-Treyer and Wenger-Treyer, 2015) on social and behavioural sciences in medical education. This article will conclude with an outline of a research project which is currently in progress designed to learn more about the learning journey of dental students with social and behavioural sciences.

The starting point

‘I feel that the topics are very important and useful. However, there is often a mushy boxed fog feel to what we’re learning and therefore it becomes quite a panic as to what is needed for the exam.’ (Respondent #1, Year 3 student 2014-15)

The past thirty years has seen the widespread acceptance for the inclusion of behavioural and social sciences into medical and dental curricula (Piko & Kopp, 2004). In the UK the General Dental Council (GDC) has stipulated that the undergraduate dental curriculum must include the teaching of social and behavioural sciences (GDC, 2008). However, there is evidence that many dental undergraduates struggle to see the relevance of social and behavioural sciences components to their training as dentists (Kent & Croucher, 1992; Pine & McGoldrick, 2000). In their cross-sectional study of two UK dental schools Kent and Croucher (1992) found that students preferred the technical aspects of dentistry over its social aspects. Pine and McGoldrick (2000) found that dental students called for a more practical application of the social and psychological theories they were learning. Similar issues have been found with nursing students (e.g. de Vries & Timmins, 2012; Edgley, Timmons, & Crosbie 2009; Mowforth, Harrison, & Morris 2005) and medical undergraduates (e.g. de Visser, 2009; Litva & Peters, 2008).

Since 2008 the dental undergraduate programme at the University of Bristol has developed the behavioural and social science component of its curriculum into a recognisable subject theme that runs across the five years of the programme. The curriculum includes Sociology and Psychology as applied to dentistry, Ethics and law, Professionalism and communication skills and is taught by a core teaching team of a sociologist (PN) and a psychologist (AW). This Personal and Professional Development (PPD) theme is taught through a variety of teaching methods: lectures and small group seminars, communication skills workshops using role-play and student-led teaching (Critical Appraisal Tutorials). Our aim is to foster the skills needed to understand and manage patient behaviours (McGoldrick, Pine, & Mossey, 1988) thus facilitating improved patient adherence and outcomes. In so doing we hope to enable our students to become more holistic and patient-centred practitioners (de Visser, 2009).

Successive student evaluation surveys administered locally as well as informal student feedback report a sense of disquiet and unease among a consistent minority of dental students regarding the social and behavioural science competent of their curriculum. PPD emerges as something ‘different’ to the rest of their studies, and this sense of difference is connoted by three signifiers: PPD is ‘boring’, ‘irrelevant’ or (at best) ‘common sense’.

‘I don’t think lectures were really required as the contents was common sense’ (Respondent #43, Year 1 student 2015-16)

‘Wasn’t so much that I didn’t learn anything new, was just giving jargon to concepts that you’d think obvious in the standard educated student.’” (Respondent #9 Year 3 student 2014-15)

Further to this is the recommendation that PPD can be ‘easily’ condensed into e-tutorials or handouts, with the learning assessed via the completion of a self-assessment form/checklist.
‘There is very little content. I challenge you to summarise all the year’s PPD into 1 hour. It is definitely possible’ (Respondent #5, Year 3 student 2014-15)

Students therefore have a particular idea about the value (or not) of PPD as well as how PPD should be taught and assessed.

‘We should learn PPD but not have a written exam. This doesn’t help you develop as a person, but learning is useful. Should be formative’ (Respondent #39, Year 2 student 2015-16)

Queries over the validity of PPD assessments also tend to coincide with a concern over the legitimacy of non-clinical academics teaching clinical students.

‘PPD lectures should not be compulsory and should be on blackboard. Unless clinical staff are giving the lectures.’(Respondent #21, Year 3 student 2015-16)

Such doubting of the ‘source creditability’(Forsythe & Johnson 2016, p.3) of social and behavioural scientists offers an insight into how some dental students perceive the competency of those who are ‘not dentists’ as well as their readiness to accept their professional skills, experience and feedback.

As dental educators we are concerned by these findings. The persistence of the issue of ‘relevance’ in student feedback implies the existence of a profound educational and pedagogic impasse. We regularly reflect on this feedback and modify our teaching to introduce a more practical and applied focus to our topics. For instance, in 2015/6 we introduced case-based style questions to our end of unit exams. Despite these initiatives student feedback has remained the same.

The perceived ‘otherness’ of the social and behavioural sciences is also something that our students struggle with. Dental and medical courses prioritise students with high performance in A-level science subjects in their recruitment process. Invariably, dental and medical schools select for and perpetuate a positivist epistemological culture. It is therefore not surprising that some dental and medical students struggle when presented with a more interpretivist construction of reality that encourages students to ‘decentre’ their thinking, to move beyond an individual focus and come to appreciate multiple perspectives and possibilities. Signs of this epistemological discomfort are evident in their feedback.

I generally find this course quite difficult. I find it hard to know what to learn and what not to learn and how to expand my ideas and get marks in the exam.’(Respondent #3, Year 3 student 2014-15)

‘Sometimes PPD lectures feel like they’re being delivered in a different language, find it difficult to follow and understand exactly what points are being made.’(Respondent #35, Year 3 student 2015-16)

For these reasons, many dental students approach their PPD assignments with a sense of unease and anxiety.

What next? A research plan

It is clear that the learning journey associated with social and behavioural sciences is more complicated and emotionally charged that the ‘relevance-irrelevance’ discourse suggested by students’ course evaluations. Although student feedback pinpoints some flashpoints for dental students, e.g. their unease with abstract concepts and theorising as well as their fear of failure and anxiety about PPD assessments, a more systematic and robust method of investigation is needed. To this end, the authors are currently...
running a research project (2016-17), funded by a University Development Teaching Grant (University of Bristol), to undertake a qualitative study of the learning journey of dental students studying social and behavioural sciences within the PPD course. Our overall aim is to establish the factors that help or hinder dental students in the teaching and learning of social and behavioural sciences. We want to find out:

- whether dental students consider the social and behavioural sciences an important component of their curriculum
- whether they appreciate that knowledge and application of social and behavioural sciences relates to safe and improved professional practice and transforming patient care?
- what changes and improvements they consider relevant to the curriculum in order to achieve a more meaningful student learning experience?

Focus groups will be held with students to facilitate their viewpoint on these and other teaching and learning related issues. It is hoped that the study will identify the particular challenges of the social and behavioural sciences curriculum for dental students, as well as identify opportunities to support and aid student learning in this aspect of the curriculum. Ultimately, the findings will inform areas for change and improvement in the current PPD curriculum. Interestingly, very little research has been conducted on exploring dental student’s experiences of their curriculum (e.g. Henzi et al., 2005; Cardell, Rowan, & Bay, 2008). However, it is only through researching dental students’ experience will be able to inform change and effect curriculum revision (Henzi et al., 2005). The findings of this research will be of interest to social and behavioural science educators in dental schools and medical schools alike.

**Take Home Messages**

**Notes On Contributors**

Dr Patricia Neville is a sociologist and Lecturer in Social Sciences at the School of Oral and Dental Sciences. She is Theme Lead for Personal and Professional Development (PPD) Theme of the BDS programme. Her research interests include the sociology of oral health, the sociology of professionalism, and dental education.

Dr Andrea Waylen is a psychologist and Senior Lecturer in Social Sciences at the School of Oral and Dental Sciences. She is the Lead for Psychology, Ethics and Law and Communication skills in the BDS programme. Her research interests include dento-facial appearance and quality of life (particularly related to cleft lip and palate and head and neck cancer) and the effects of relationships and communication on health outcomes and health-related behaviour (particularly tobacco and alcohol use and adolescent sexual behaviour).

**Acknowledgements**

None
McGoldrick, P.M., Pine, C.M., & Mossey, P.M. (1988). Teaching dental undergraduates' behaviour...
https://doi.org/10.1111/j.1600-0579.1998.tb00047.x
McKendree, J. (2016). Letters to the Editor: Poor Relations: Social Scientists and Medical Education,
Academic Medicine, 91(4), 451.
https://doi.org/10.1097/ACM.0000000000001123
https://doi.org/10.1016/j.nedt.2004.09.009

**Appendices**

**Declaration of Interest**

*The author has declared that there are no conflicts of interest.*