Continuing professional development

Healthcare professionals use of the term continuing professional development has evolved over the past decades from the narrower terms of continuing dental education (CDE); continuing medical education (CME), and continuing education (CE). Although these terms are still used interchangeably, the broader CPD, acknowledges the inclusion of topics that extend beyond the traditional scope of health care subjects such as managerial, personal and social skills, and recognises the multidisciplinary context of practice and the wide range of competences required to provide high quality patient care. It is the process by which healthcare professionals update themselves through the continuous acquisition of new knowledge, skills and attitudes that enable them to remain competent, current and able to meet the needs of their patients (Peck, McCall, McLaren and Rotem, 2000) and, their statutory obligations via their regulatory body (Mathewson and Rudkin, 2008). The underlying philosophy of CPD is to encourage lifelong learning (Griscti and Jacono, 2006). It is essentially ‘ lifelong learning in practice’ (Peck et al, 2000) that, post qualification and registration, now forms ‘ a continuum of cradle-to-grave quality assurance’ throughout a professionals working life (Mathewson and Rudkin, 2008).

The aim of this literature research is to support the author’s dissertation which is an investigation into the possible impact and effectiveness of mandatory CPD on the professional competence of dental care professionals (DCP’S), specifically, dental hygienists. The author is a qualified dental hygienist of 27 years and is included in the cohort of PCDs who complete their first five year cycle of CPD in July 2013.

A literature search found very few studies relating to dental hygienists and CPD – therefore a vast majority of information has been abstracted from literature pertaining to dentists and aligned healthcare professionals such as, doctors who also undertake mandatory CPD. This assignment will refer to the applicable, generic outcomes from the literature unless the results are specific to a healthcare group

“ CPD…a career long process required [by dentists] to maintain, update and broaden [their] attitudes, knowledge and skills in a way that will bring the greatest benefit to [their] patients”

European Commission 1996 cited in Tseveenjav, 2003; Bailey, 2012.

As a professional healthcare worker, CPD is important in that the quality of practice is dependent on the possession and proper use of high level skills, which, if not maintained may have a serious impact or consequence for the patient (Collin, Van der Heijden and Lewis, 2012). Therefore, it is regarded as an ethical obligation and professional responsibility that practitioners engage in CPD (Murtomaa, 1984 cited in Tseveenjav, 2003) as it is an important value of professionalism (Donen, 1998). Following a literature review, Hilton (2004) identifies six domains incorporated within (medical) professionalism, three of which are the ‘ personal or intrinsic attributes’. These are: ethical practice; reflection and self-awareness; responsibility and accountability for ones actions including a commitment to excellence, lifelong learning and critical reasoning. Cosgrove (cited in Hilton, 2004) describes professionalism as “ a state not trait” which must be maintained once acquired. The General Dental Council (GDC) concur and add that CPD, as part of professionalism,

also promotes confidence in the practitioner and dental team (GDC – Preparing for practice: 6). This is, however, applicable to all professionals who have a moral and social responsibility to remain competent and current in their subject specialism whether this is through legal compulsion or not.

Mandatory participation in CPD

As a response to environmental pressures (Johnson, 2008) such as advances in technology which have led to the erosion of traditional (medical) boundaries (Pendleton, 1995); health sector reforms with a focus on prevention (Johnson, 2008); and partly as a result of paradigm shifts in societal expectations – demanding increased accountability (Tulinius and Holge-Hazleton, 2010; Mathewson and Rudkin, 2008; Tseveenjav, M, and Muttomaa, 2003) mandatory CPD was introduced as a quality assurance system to " reassure the public that dental professionals are fit to practice and meet the standards required to stay registered with the GDC…without which they cannot practice" (Mathewson and Rudkin, 2008).

In July 2008 the GDC, the dental regulatory body, introduced compulsory registration and mandatory continued professional development for all DCPs. The GDC specified that, within a five year cycle, each DCP should provide evidence of compliance with the mandate and complete a legal minimum of 150 hours of CPD; 50 hours of which must be verifiable by certification and include the ' core' subjects of medical emergencies, disinfection and contamination, and radiography (GDC – Continuing Professional Development for dental care professionals, 2012). The rationale, specific to healthcare professionals is that " effective regulation maximises positive

health outcomes” (Johnson, 2008). The purpose of professional regulation and mandatory CPD is twofold: firstly to ensure the patients’ health, welfare and safety and, secondly to protect the public from harm (Johnson, 2008).

Many authors argue against mandatory CPD. Carpinto (1991, cited in Joyce and Cowman, 2007) felt that “ mandatory continuing education is at odds with the values and beliefs on which lifelong learning is based”, cynically noting that it is targeted at those who least need it – those who are already competent! Donen (1998) observed that only attendance, not learning can be mandated and that CME needs will differ for individuals depending on what stage they have reached in their careers. Mandatory CE was considered ineffective and outdated in so much as the ‘ system’ only requires proof of CPD attendance but is not required to demonstrate application to practice or competence and that it does not improve the quality of practice (Bilawka and Craig, 2003: 2). Additionally, mandatory CPD may, potentially devalue learning by affecting an individual’s approach (Friedman and Phillips, 2004 cited in Sturrock and Lennie, 2009). The anaesthetists surveyed by Heath and Jones’s (1998) agree, commenting that it is often thought of as ‘ bums on seats’ and ‘ ticking the box’. Despite the evidence, regulatory bodies continue to use mandatory CPD as a means of quality assurance.

Prior to the introduction of mandatory CPD in the UK, Oosterbeek (cited in Belfield, Morris, Bullock and Frame 2001) offered an explanation in favour of mandatory CPD, which although not stated, may prove to be the overriding factor as to the enforcement of the mandatory model: “ there is some evidence that current provision of CPD may exacerbate disparities in service standards: the highly skilled appear to volunteer for more CPD”. Therefore “

Compulsory or prescribed CPD may compress these differentials and hence have a positive equity effect in ensuring uniform patient care". Furthermore, Hibbs (1989, cited in Sturrock and Lennie, 2009) suggest that, in the nursing profession, a small minority would not update their professional knowledge, either informally or formally, if CPD was not a mandatory requirement. Evidence suggests this minority exists across the professions (Firmstone et al, 2004, Schostak et al, 2010). It cannot, however, be assumed that non participation equates to practitioners not being competent or motivated (Griscti and Jacono, 2006).

Another dimension may, perhaps, be found in competency and litigation. The GDC prescribes three ' core' subjects: medical emergencies; radiography, and disinfection and contamination. Shanley et al (cited in Barnes et al 2012) claim that most dental mistakes are made in these areas of competency. The author could find no further references or evidence in the GDC literature but from personal experience finds this an understandable and reasonable claim, and that a wider literature search will reveal more. Furthermore, in addition to specialist, update courses, these areas are included in the list of most requested CPD topics at meetings (Barnes et al, 2012), suggesting that practitioners are aware that current practices in these areas are constantly changing and of their impact and consequences for all concerned. Therefore, it is understandable that the GDC reinforces these topics within the CPD cycle. Although, Cervero (2000) noted with caution that the ' trend' across the professions in America, was the increasing use of CE as the foundation for re-licensure when regulating professional practice; with all state medical boards' requiring annual accreditation of continuing education for

recertification. The GDC will soon introduce this system, called Revalidation, for dentists and is currently in consultation over its introduction for DCPs.

“ Scientific knowledge in dentistry is currently doubling every 5 years”

Florida Academy of General Dentistry cited in Mattheos et al 2010

Some studies show that after ten years, there is a steady decline in the current, applicable knowledge of a practitioner (van Leeuwen etal, 1995; Day et al, 1988; Ramsay et al, 1991 cited in Donen, 1998). Several authors noted that practitioners tend to take CPD in topics of personal interest rather than areas of deficiency or what might be deemed ‘ essential’ (Heath and Jones, 1998; Sibley et al cited in Norman, Shannon, and Marrin, 2004; Sturrock and Lennie, 2009; Barnes et al, 2012). In a rapidly changing healthcare environment, this emphasises the importance of healthcare workers remaining current as relevant knowledge and skills have a ‘ shelf life’. Eagle (cited in Heath and Jones, 1998) defines the educational process as one which results in an alteration in behaviour that is persistent, predetermined and that has been gained through the learners acquisition of new psychomotor skills, knowledge or attitudes. Whilst Davis (cited in Cantillon and Jones, 1999) defines CME as “ any and all the ways by which [doctors] learn after formal completion of their training”.

Continuing Professional Development Intervention Effectiveness

Several studies explored the various methods of obtaining CPD and their effectiveness in changing clinical practice, post event. Most were database and literature reviews, others used both qualitative and quantitative

research data. All work is peer reviewed with the majority referencing and drawing from the authoritative work of Davis et al 1995, Changing Physician Performance – A Systematic Review of the Effect of Continuing Medical Education Strategies. Much of their work confirms and complements Davis et al's main findings – that many CME interventions may alter physician performance and also, but to a lesser degree, healthcare outcomes. Concluding that " these alterations are most often small, less often moderate and rarely large", adding, that CME interventions should be understood in the context of the delivery methods, nature and quality of the interaction and consideration be given to the complex, individual variables such as needs assessment and barriers to change (Davis et al 1995).

CPD activities range from the increasing use of the internet; journals and study clubs; ' lunch and learn' events sponsored by commercial companies to regional and national conferences. Research, however, has shown that attendance at these events is usually due to personal interest rather than identification or a ' needs analysis' of a weakness in a particular area, and that some professionals may not even perceive any deficit in their knowledge or practice (Hopcraft et al, 2010).

The majority of papers reviewed are critical of the didactic, ' single event' lecture. British consultant anaesthetists, surveyed by questionnaire, found that overall single event interventions such as didactic lectures were the least effective at eliciting change (Heath and Jones, 1998). Lectures were often criticised for their passive dissemination of information (Bilawka and Craig, 2003) with lecturers trying to impart too much information; not leaving enough time for questions and some attendees felt that they had not

learnt anything new (Heath and Jones, 1998). Davis et al (1999) stated that “ didactic modality has little or no role to play”. Contrary to Heath and Jones findings, Harrison and Hogg (2003) conducted a qualitative study which evaluated the reasons why doctors attend traditional CME programmes. They carried out in-depth interviews, before and after a course, and found resistance to the statement that ‘ traditional CME (lecture) does not change doctor’s behaviour’, disagreeing, stating, they always learnt something new and were able to give concrete examples of their claims. The value of lectures may be that the information is broadly presented, thus enabling individuals to sift the information for that ‘ pearl of wisdom’ relevant to their practice (Harrison and Hogg, 2003). This may explain the on-going popularity of the traditional lecture in that individuals attend because it does enable some form of up-date; specialists or experts in their field of interest appears to be a draw, and possibly reassurance that their own practice is within current guidelines and thinking (Wiskott et al, 2000). Another dimension to the ‘ lecture’ is the informal interaction with colleagues, where collegial learning takes place as experiences are compared. There is also a perceived relative cost benefit (Brown, Belfield and Field, 2002).

Workshops and hands-on courses, learning through participation, have shown to be catalysts for change amongst dentists although they have a greater associated cost they achieve a longer term impact on practice (Mercer et al cited in Bullock et al, 1999), which is sustainable (Mattheos et al, 2010). Interactive interventions such as journal clubs and small focused group discussions produced a greater effect than a single intervention (Mansouri and Lockyer, 2007).

If used alone many CPD interventions have minor or negligible effect but when combined with other methods such as peer review, audit and feedback – multifaceted interventions, may have a “ cumulative and significant effect” (Oxman et al, 1995).

“ there are ‘ no magic’ bullets for improving the quality of healthcare, but there are a wide range of interventions available that, if used appropriately, could lead to important improvements in professional practice and patient outcomes”.

Oxman et al, 1995

The majority of studies concentrated on formal, planned structured programme, there was little evidence of research into the effectiveness of informal CPD and its application to practice, presumably due to difficulties in assessing impact and relying on self-reporting.

“…responsibility for the effectiveness of CPD lies with the learner”

Eraut, 2001

The effectiveness of CPD has been described, ideally, as the practitioner gaining improvements in practice through knowledge and skill and this improvement translates in to better health outcomes for patients respectively. Although Belfield, et al (2001) state that “ it is very difficult to conduct controlled studies to demonstrate improvements in practice, or patient outcomes after educational activities” and most benefits and changes to practice are self-reported with no independent verification (Eaton et al, 2011).

The literature review shows that effective CPD has many so many potential aspects to be studied, but the majority of studies reviewed focused on the effectiveness of formal modes of CPD, confirming Davies et al's (1995) findings and mostly drawing the same conclusions. These conclusions, however, will be scrutinised further as tighter restrictions on CPD come into force through the introduction of Revalidation which will only accept validated certification. This would seem to discard the value or impact of informal learning which seems at odds with the much referenced Davies et al (1995) definition of CME as ' any and all the ways by which [doctors] learn after formal completion of their training". The systematic reviews have not drawn any firm conclusions on which intervention is the most effective stating that " there is no single strategy effective in all settings" (Donen 1998) due to the very many variables that impact of on the effectiveness of CPD. These areas be will be explored further in the authors research project. The last study relating specifically to Dental Hygienists was by Ross et al in 2005, who conducted a study of Scottish dental hygienists, briefly touching on CPD. As yet there have been no studies into the effects of mandatory CPD and dental hygienists. The literature thus far has helped to formulate the research question: What impact does mandatory Continuing Professional Development have an on the effectiveness of dental hygienists professional competency?

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