General
Dental
Council

Preparedness for Practice of UK Graduates Report 2020

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Executive Summary

The General Dental Council (GDC) for many years has heard concerns from the profession that new UK trained dentists were not as well prepared as they ought to be to make the transition into practice. This was told to us mainly in the form of anecdote and informal feedback often focusing on clinical skills and resilience. We found that these concerns were not borne out in higher referral rates to us for fitness to practise and there was limited formal evidence that supported what we had been told. Nevertheless, this perception has continued and, given that the GDC was introducing thematic reviews as a way of looking at specific issues within the dental education sector, this was determined to be the subject for the first review.

This review considers the preparedness of recent dental graduates to work in clinical practice and includes the behavioural, emotional, and attitudinal aspects as well as clinical skills and abilities required. By undertaking this review, we wanted to understand if there was any evidence to support or refute the claims around newly qualified dentists' preparedness for practice.

We surveyed new dental graduates undertaking dental foundation training/vocational training (DFT/VT) in 2018 and 2019. We asked them how well undergraduate training had prepared them in a range of areas based on the GDC learning outcomes. We also asked DFT/VT supervisors, through a survey in 2018, how well prepared they thought all those they had trained were for practice. We engaged with key stakeholders and held a conference to discuss findings. To build on our evidence base we commissioned a Rapid Evidence Assessment (REA) which was undertaken by the Association of Dental Education in Europe (ADEE) following competitive tender. We have used the research and engagement activities listed in the methodology to inform this thematic review report.

We have considered the question of whether there is evidence for concerns about newly qualified dentists' preparedness for practice. The evidence we have gathered does not suggest that newly qualified dentists are unsafe, but it does highlight challenges new graduates face on entering the workplace. It also identifies areas in which preparedness of new graduates could be improved or enhanced. These areas include increasing the breadth and depth of clinical experience, clarifying expectations of new dentists at the point of registration, and ensuring that there is adequate support (both clinical and pastoral) during the first year or years of practice. This report also raises the question of whether new graduates are 'independent practitioners' as well as 'safe beginners' and consequently whether the point of registration is correct.

Perceptions of preparedness

Our review found that there was a difference in expectations of new dentists' skills and abilities between supervisors and trainees. Supervisors rated trainees as less prepared than trainees rated themselves across the range of learning outcomes. Trainees were rated by themselves and their supervisors as least prepared in more complex treatments such as multi-rooted endodontics and indirect restorations. The review highlighted that clarity was needed around what a 'safe beginner' looked like to the GDC, dental schools and those involved in foundation/vocational training, and it was felt that this should be addressed.

Clinical experience

In the responses to the qualitative survey, trainees and supervisors frequently stated that there should be more clinical experience at undergraduate level. Clinical experience was seen by many supervisors as having decreased over time. There are barriers to increasing clinical experience at an undergraduate level, including a full curriculum, lack of patients suitable for student treatment, and cost and resource limitations. However, our review has indicated that increasing the breadth and depth of clinical experience would be beneficial.

Non-clinical skills

Our review found that new graduates understood the GDC Standards for the Dental Team and the professional expectations of them, however, supervisors thought they were less prepared for areas such as managing patient complaints and communicating/working with the wider dental team. Dental schools and foundation training providers should continue to focus on helping students and new graduates develop insight into their current level of expertise, their strengths, and their continuing educational, technical, and professional needs.

Course design, monitoring and progression

The research found that integrated patient-centred teaching delivered in a range of settings provided a valuable educational base to help students prepare for practice.

Outreach and preparedness for 'real world' settings

Our review highlighted that some new registrants could lack understanding of the requirements and demands of primary-care NHS dentistry making the transition to practice more difficult. The benefit of outreach is not just to increase clinical experience but also to help students deal with complexity and the different pressures of primary-care. There are, however, challenges for dental schools to find suitable outreach placements and to fund these. Our review suggests that students would benefit from significant time in outreach to help them prepare for life after graduation.

Managing the transition period

Our review found that moving from student life to the increased responsibilities of professional life is challenging and factors such as moving to a new area without a support network can contribute to feeling unprepared. Both dental schools and the Committee of Postgraduate Dental Deans and Directors (COPDEND) have a role in ensuring that students are adequately prepared for this transition step and that there are support services in place for those who need them.

Defensive practice

Our review suggests that new graduates may practise 'defensively' during DFT/VT because they are worried about performing treatments that could go wrong and fear repercussions through litigation and regulation. A better understanding of how to appropriately manage complications and patient complaints could help mitigate this. Having a supportive training environment is important to help new graduates avoid practising defensively.

Patient safety

Our Fitness to Practise (FtP) data showed that new graduates are less likely to be the subject of a concern to the regulator and there are no specific patient safety concerns relating to those at this stage of their career. However, this is at best a proxy measure of patient safety as only those concerns raised with the regulator are investigated. There may be better measures available to assess whether there are concerns related to patient safety for this group.

We recognise that many of the findings will be 'known' and resonate with some stakeholders and some will be felt to be more challenging. This report formalises our recognition of the issues and we call on all responsible parties to take action to address these. We are committed to working with key stakeholders in dental education with the shared aim of improving the preparedness of students and new graduates, and to support them in becoming independent, safe practitioners.

This report is based on research and findings before the COVID-19 pandemic. It is clear that the impact of this pandemic will affect the ability to act to address some of the findings of this review in the medium-term. The implications of COVID-19 on dental education are being considered separately to this report and therefore this report does not address the issues that have arisen in relation to COVID-19.

Part One: Introduction

Background

The role of the General Dental Council (GDC) under the Dentists Act 1984, is:

- to protect, promote and maintain the health, safety, and wellbeing of the public
- to promote and maintain public confidence in regulated dental professions
- to promote and maintain proper professional standards and conduct.

Within this overarching role, we have a statutory responsibility to quality-assure dental education leading to registration and to set the learning outcomes for all categories of dental professionals to enable them to enter our registers.

Our processes and the requirements we set for education and training providers are designed to provide assurance that all those qualifying in the UK and applying to be on the registers are safe to begin working as a dental professional. Equally, providers must ensure their programmes sufficiently prepare students to make the transition to professional practice.

This is a report on the preparedness for practice of new UK-trained dentists and is our first thematic review under our revised education processes. The report and associated research are focus on dentists only and the rationale for this is below.

In dentistry, being prepared for practice relates to the readiness of a new graduate to enter the workplace and to practise dentistry. Preparedness for practice is multifaceted – it does not just include clinical competence but also behavioural, emotional, and attitudinal factors including professionalism and communication skills. This 'theme' was selected as the subject for review following anecdotal concerns raised by some in the dental profession over an extended period. They relate to whether newly qualified dentists are sufficiently prepared to begin work in general dental practice. We considered that, given the implications for patient safety alongside other issues, it was necessary for us to explore these concerns through a comprehensive review.

This report focuses on individuals who are transitioning from dental school to their first job as a registered dentist - normally DFT/VT. While the report focuses on those graduating from UK universities, some of these challenges will also apply to non-UK graduates, however these are not within the scope of this report. Additionally, there may be implications

and learning that can be applied to other registrant groups. In this report, we recognise that while we may refer to new graduates as though they are a homogenous group, we are talking about individuals who are very different people with different experiences from each other, both within and across dental school cohorts and different years.

Dentists who graduate in the UK, register with the GDC following satisfactory completion of undergraduate training delivered by a UK dental authority. For many other professions (including

medicine and law) vocational training in the field is required prior to registration. However, although it is not necessary for registration, nearly all UK dental graduates undertake a year of DFT/VT (circa 99% of UK graduates surveyed in 2019 were undertaking or intended to undertake DFT/VT). During this year, newly registered dentists treat patients in approved NHS practices under the supervision of an experienced dentist based within the practice. They also attend regular study days to further expand their knowledge and experience. Satisfactory completion of this year allows dentists to apply to join the NHS Performers' List and provide work on the NHS. DFT/VT, however, is not compulsory; dentists can work privately, in academia or in secondary care settings without needing to complete this year. The number of UK graduates who chose not to undertake DFT/VT are small – in 2019 only four new registrants out of 948 chose to work in private practice rather than undertake DFT/VT. There are also some UK graduates that never practise in the UK, including those who choose to work overseas.

We understand that obtaining a qualification for registration represents only the first stage in the development of dental professionals. Across professions, education and training providers are not expected to train individuals who are fully confident and able in all aspects of that profession due to various constraints, including duration, logistics and funding, and it would be unreasonable to expect this in dentistry. We understand that an individual's skills and knowledge will develop with experience and that professionals will carry out reflective practice and self-directed learning in areas of personal need throughout their professional careers.

A 2013 review on the 'Transition to Independent Practice'[1] found there was no evidence of an increased risk to patient safety from newly qualified dental professionals. Recent FtP data analysis also supports this finding (Appendix 4). Although this evidence provides some assurance, we continue to receive anecdotal reports and feedback from dental professionals, mainly from those involved in DFT/VT, that there are significant gaps in the knowledge and skills of new graduates.

The idea that graduates 'aren't as good as they used to be' is not new. For example, it was discussed in an opinion paper from 1999 where the authors stated that "today's graduates are different, but not worse"[2]. There have been changes within society and within healthcare which means that working in the dental world today is very different to that even 10 years ago. Changes include an increase in complaints, litigation, and referrals to regulators that new graduates need to be able to manage[3] There have also been changes from 'paternalistic' medical care to one of explaining all the options available (and all the risks, benefits and costs associated with the options) and giving the patient autonomy over decisions about their treatment. Patients are now more informed of their rights as consumers and of the options that should be available to them. There is also now more of a developed 'safety culture' within society which means that what could have been done before can no longer happen without having appropriate risk assessment, policies, protocols, and legal requirements in place. These differences mean that it is challenging and not always very helpful to compare generations of cohorts.

This report has been produced to consider the question of whether there are legitimate grounds for concern about newly qualified dentists' preparedness for practice. The report identifies where there are deficiencies in preparedness and proposes where the transition between undergraduate and foundation/vocational dentist could be enhanced. This has been informed by analysing the evidence and issues facing UK undergraduates, foundation/vocational dentists, their supervisors, and education providers.

What is Preparedness for Practice?

When we talk about 'preparedness for practice' in this report, we mean the readiness of a recent dental graduate to work in clinical practice. In UK dentistry, this may refer to the transition from student to 'safe beginner', or from 'safe beginner' to 'independent practitioner'. The focus of this review is on the readiness of new dental graduates to enter DFT/VT or into practice elsewhere. Due to the overwhelming proportion of new dentists undertaking DFT/VT, this is where much of the focus of this report lies.

'Preparedness' encompasses not only clinical skills but also behavioural, emotional and attitudinal aspects. The purpose of undergraduate education and training is to produce an individual who can demonstrate, on successful completion of the programme, that they have met the learning outcomes required for registration as a dental professional with the GDC. Students should aim, and be supported, to attain the required standards of knowledge, skills (including clinical and technical skills) and professional attributes, in particular putting the interests of patients first at all times[4].

The primary purpose of DFT/VT is to ensure that dentists completing the programme have developed into competent, caring, and reflective practitioners who consistently provide safe and effective care for patients in a primary-care setting[5].

We recognise that the current GDC definitions do not clearly define the difference between a safe beginner and independent practice. A review of these definitions will help bring clarity to what is expected of dentists at the point of registration with the GDC.

Our document, Preparing for Practice, sets out the learning outcomes for dental teams at the point of qualification across four domains: Clinical; Communication; Professionalism; and Management and Leadership[4]. The learning outcomes reflect the knowledge, skills, attitudes, and behaviours a registrant must have to practise safely, effectively, and professionally. The learning outcomes were developed to help ensure consistency across education providers and guarantee that dental professionals are ready for registration. The GDC Standards for the Dental Team highlight our professional expectations of all registered dental professionals, which are common for those who are newly-qualified and those who are very experienced[6].

GDC definitions[4]

Safe beginner – a rounded professional who, in addition to being a competent clinician and/or technician, will have the range of professional skills required to begin working as part of a dental team and be well prepared for independent practice. They will be able to assess their own capabilities and limitations, act within these boundaries and will know when to request support and advice.

Independent practice – working with autonomy within the GDC Scope of Practice, and own competence, once registered. Independent practice does not mean working alone and in isolation, but within the context of the wider dental and healthcare team and may be under supervision if newly qualified.

(Taken from GDC Preparing for Practice[i])

i These definitions are for the whole dental team and are not specific to dentists

Part Two: Methodology

This report has been compiled through the following research and associated activities:

- **Two surveys with Foundation and Vocational Dentists in 2018 and 2019 (Appendices 1a, 1c and 1d).**

  Joint surveys were undertaken by the GDC and the Advisory Board for Foundation Training in Dentistry (ABFTD). The 2018 foundation/vocational dental trainee survey was open for six weeks from 1 June 2018. The 2019 survey (asking the same questions) was open for five and a half weeks from 17 May 2019. The 2018 survey had 995 (89% response rate) responses from foundation/vocational trainees and the 2019 survey had 948 responses (88% response rate). The questions were based on the GDC learning outcomes, as set out in Preparing for Practice, which sets out the requirements for all undergraduate curricula[3]. The surveys also included an open question asking respondents for comments about their pre-registration training.

In this report we will refer to these surveys as the 2018 and 2019 Trainee Surveys.

- **Survey with Educational Supervisors/Trainers in 2018 (Appendices 1b and 1e).**

  This survey was sent to supervisors/trainers through COPDEND. The survey was open for four weeks from 1 November 2018 and received 567 responses (43% response rate) from educational supervisors/trainers. The questions were based on the GDC learning outcomes, with an additional open question for further comments.

In this report we will refer to this survey as the 2018 Supervisor Survey.

- **Workshop and follow up survey with deans, associate deans, training programme directors and educational supervisors/trainers in 2019 (Appendix 2).**

  In May 2019, we conducted a workshop at the DFT Programme Directors' Conference to gather feedback on the four key themes identified in the qualitative data from the 2018 Supervisor Survey: clinical experience; practical knowledge and skill; working in real world settings; and defensive practice. Following on from the workshop, an online survey for deans, associate deans, training programme directors (TPDs), assessors, educational supervisors and trainers was distributed so that further comment could be made with regards to the four themes. The workshop and follow-up survey were designed to provide evidence of agreement and disagreement and to learn about areas of good practice and proposed areas for improvement. 57 (including some who attended and some who had not) provided responses to the follow-up survey, 51 of whom were educational supervisors/trainers.

In the report we will refer to this workshop and survey as the Follow-up Supervisor Workshop and Survey.

- **Three tripartite education and training workshops in 2019.**

  Between February and July 2019, we held three tripartite education and training workshops which included undergraduate and postgraduate deans and the chair of the ABFTD, where we explored some of the findings from the Supervisor and Trainee Survey.

- **Preparedness for Practice of UK graduates Conference in 2019 (Appendix 3).**

  We held a Preparedness for Practice Conference for stakeholders to discuss the findings of the Supervisor and Trainee Surveys and to collect more qualitative data through group workshop sessions.

- **Inspections of all dental schools (2018-2019)[7].**

  Inspections were undertaken of all 16 dental schools awarding Bachelor of Dentistry (BDS) qualifications within the 2018/9 academic year under the risk-based quality assurance approach. Each inspection looked at the thematic area of preparedness for practice.

- **Fitness to Practise (FtP), Newly Qualified Dentist case analysis (2015-2019, Appendix 4).**

  Analysis was undertaken on the likelihood of new graduates (less than two years since qualification) being involved in FtP proceedings between 2015-2019.

- **Rapid Evidence Assessment (REA) on Preparedness for Practice (2020)[3].**

  An REA was undertaken by ADEE. The primary aims for this review of preparedness for practice were twofold:

  1) To explore how well-prepared new dental graduates, trained in the UK, are for practice at the point of graduation, in terms of their clinical experience and competence as well as their broader skills.

  2) To identify what works well in preparing students to be ready for practice as registered dental professionals including the appropriate evidence to demonstrate preparedness. It includes a review of 89 published articles, scoping interviews with subject experts and data from the Preparedness for Practice conference.

- **Professionalism report (mixed method research) undertaken by ADEE (2020)[8].**

  Mixed method research (including a REA) was undertaken by ADEE in conjunction with the Rapid Evidence Assessment on Preparedness for Practice.

In the remainder of this report we will use the term ‘Trainees’ when referring to Foundation/ Vocational dentists and we will use the term ‘Supervisor’ to discuss Educational Supervisors/Vocational Trainers.

Part Three: Themes

Perceptions of preparedness

The 2018 and 2019 Trainee Surveys (Appendix 1a) asked trainees how well undergraduate training prepared them in a range of abilities and skills linked to the GDC learning outcomes. The 2018 Supervisor Survey (Appendix 1b) asked supervisors about how well undergraduate training has prepared trainees across the same range of skills. The supervisors were asked to respond based on all the trainees they had worked with, not just the trainee they currently had. As we did not carry out a survey with supervisors in 2019, we did not have a comparison between the supervisors and trainees for 2019. However, we were able to compare trainee responses for the same measures between 2018 and 2019 and the proportion of trainees who agreed or strongly agreed that their pre-registration education had prepared them to undertake these activities showed no statistically significant[ii] changes. Therefore, we have only used the 2018 Trainee Survey in our analysis in this section.

Before the survey results had been analysed, based on the informal feedback our staff had received, it was hypothesised that some clinical procedures (outlined in Chart 1) would show significant disparity between trainees' perception of preparedness and

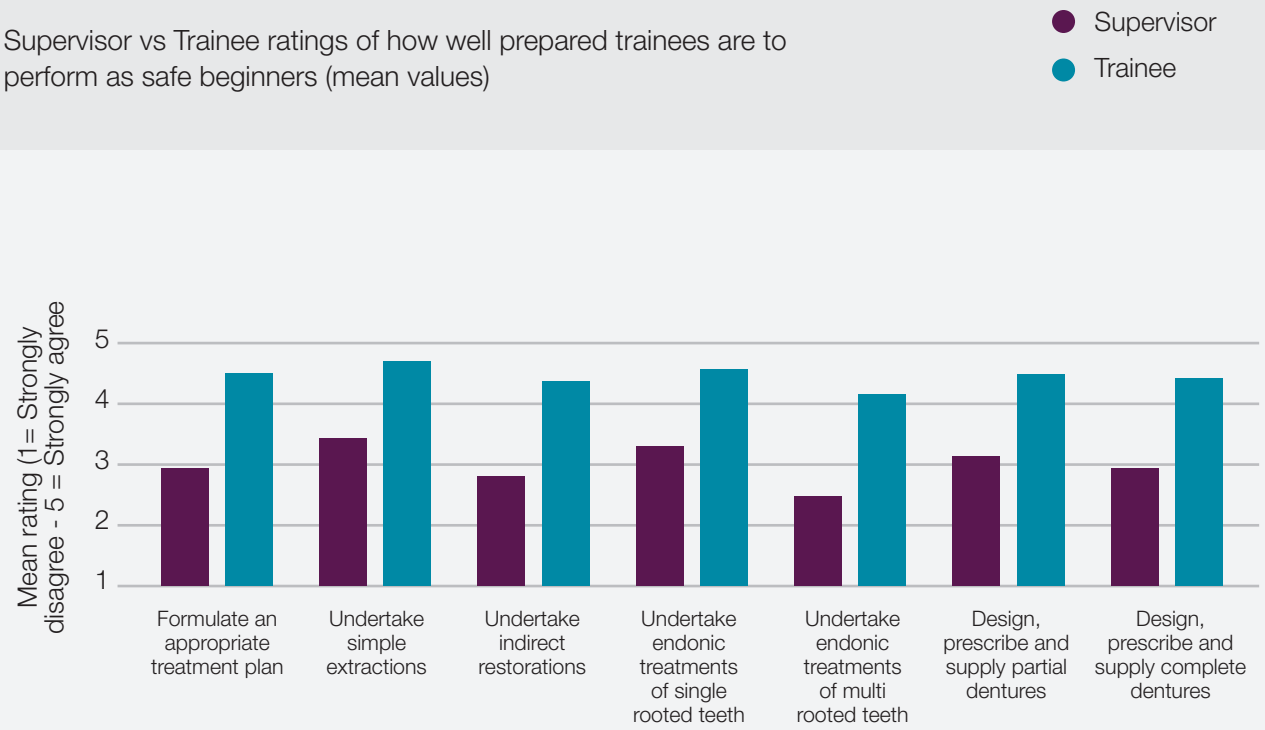
ii Independent samples t-test were run on the seven measures and showed no significant changes.

supervisors' perceptions of trainee preparedness. The analysis showed a statistically significant[iii] difference between the perceptions of supervisors and the perceived preparedness of trainee dentists across these learning outcomes. This indicates that trainees were more confident in their own preparedness (and how their undergraduate degrees have prepared them) than supervisors were about them across this range of learning outcomes. This could be due to supervisors having higher expectations of new graduates than the new graduates had of themselves or that trainees lacked competence in judging their own preparedness. The second of these would be a major concern for us and for patient safety.

On average, trainees felt least confident in undertaking endodontic treatments in multi rooted teeth, which was also the area in which supervisors were, on average, least confident in trainees' abilities. This suggests that more clinical exposure at undergraduate level may be necessary. Supervisors' responses also suggest that trainees are not as well prepared as they ought to be for treatment planning, indirect restorations, and dentures.

Chart 1:

Supervisor vs Trainee ratings of how well prepared trainees are to perform as safe beginners (mean values)



iii Corrected for multiple testing

For some of the other learning outcomes surveyed, both supervisors and trainees reported, on average, far greater confidence in the trainees' ability.

These include:

- Understand the importance of, and keep, accurate patient records.
- Understand and act within the GDC's Standards and within other professionally relevant laws, ethical guidance, and systems.
- Obtain valid consent.

There was also less disparity between trainee and supervisor's preparedness in non-technical skills related to areas such as communication and values. Chart 2 indicates that although there is less disparity in these areas, the number of supervisors that agree that trainees are well prepared in these areas is still lower than the trainees.

Chart 2:

Percentage of Supervisors vs Trainees rating 'Agree' or 'Strongly Agree' to Trainees being well prepared in the following areas

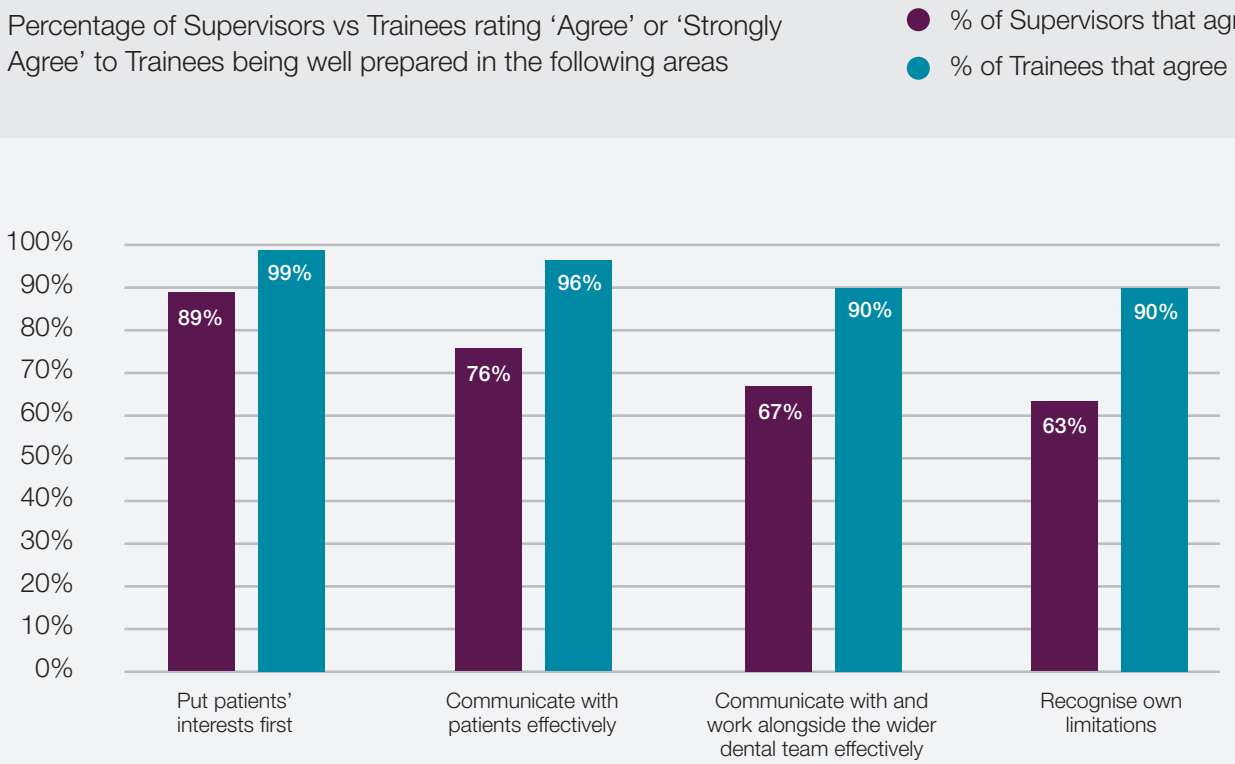


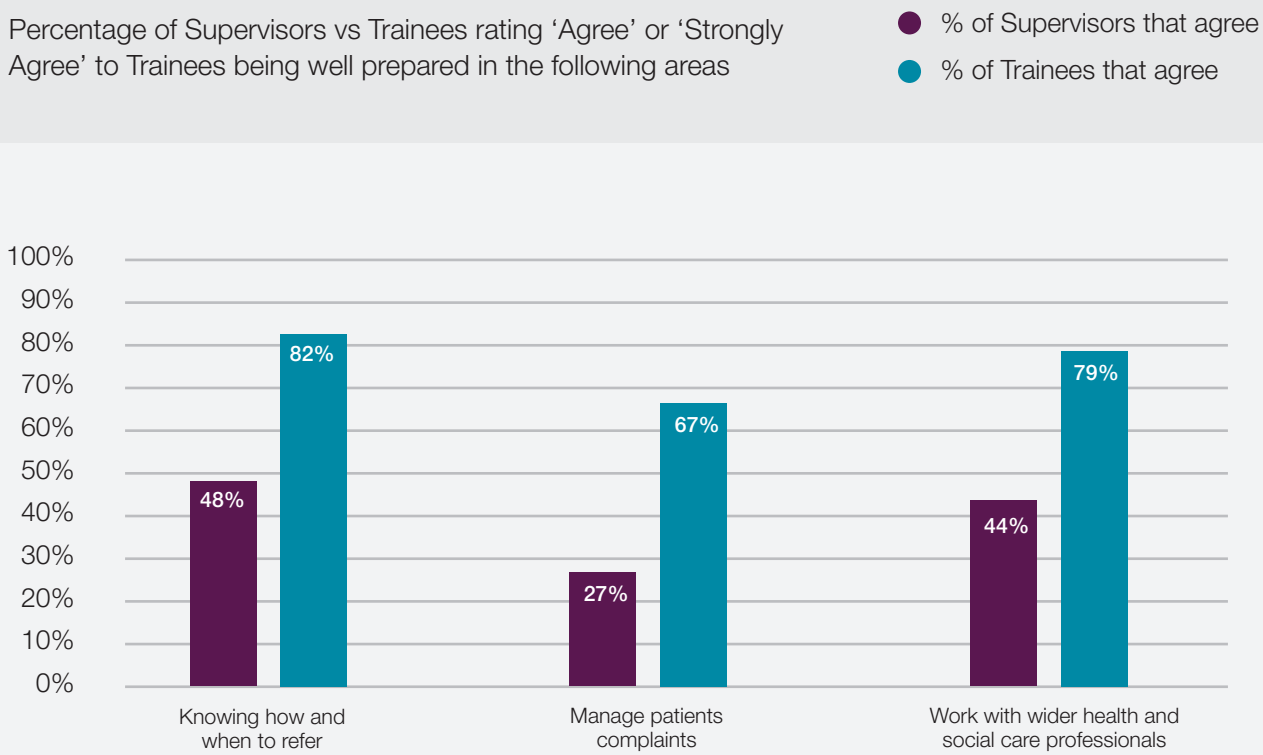
Chart 3 shows the proportion of supervisors and trainees who 'agreed' or 'strongly agreed' that trainees were adequately prepared to know how and when to refer, manage patient complaints, and work with wider health and social care professionals. It shows a large disparity between supervisors and trainees. This may indicate that further teaching may be beneficial in these areas.

A study in the REA found that over 50% of supervisors felt the standards of those entering DFT/VT were unsatisfactory[3]. There were concerns about the variation between dental schools, particularly in new graduates' clinical experience, and there appeared to be a general feeling that because of this, standards had declined in the last few years.

There is evidence in the REA that male trainees tended to self-rate their confidence (and preparedness) more highly than females, and older students (those on four-year graduate-entry courses) also felt more confident for practice[3]. Research included in the REA exploring the perceived confidence of students in different treatments showed a pattern that students were more confident in basic examinations and simpler treatments such as administering local anaesthetic,

Chart 3:

Percentage of Supervisors vs Trainees rating 'Agree' or 'Strongly Agree' to Trainees being well prepared in the following areas



removing caries and providing composite restorations and undertaking simple periodontal care[3]. Trainees were less confident in treatment planning and least confident in orthodontic assessment and treatment, endodontic treatment (especially multi-rooted teeth), surgical extractions and indirect restorations. The REA suggests that confidence and self-perceived competence increased with more experience (especially practical experience, both simulated and clinical)[3].

In our follow-up Supervisor Workshop and Survey, participants believed the lack of trainee confidence in certain areas leads trainees to practise 'defensively'. This does not fit neatly with our survey responses from trainees which showed that they felt prepared across a range of learning outcomes. This could be due, in part, to the timing of the surveys. The trainees received the survey at the end of foundation training – around a year since graduation – and therefore might not have reported correctly how they felt in the first few months of DFT/VT. However, if trainees did feel prepared and confident in most areas, it is interesting that supervisors believed they practised defensively. Again, this disparity is possibly due to differences in expectations between what trainees thought they should be able to do at that stage and what supervisors thought they should be able to do. A part of defensive practice includes avoiding undertaking certain treatment, heavily explaining the risks of the proposed treatment to patients, and taking extensive notes. Suggestions to overcome this included ensuring that students have a greater breadth and depth of experience at dental school so that learning happens under close supervision rather than in DFT/VT and beyond where the support may be limited. This would be intended to equip students to better deal with situations that are not straightforward and provide confidence in treating patients with a variety of needs. This has been a repeated theme and is of great importance to improve students' preparedness for practice.

Discussion

Perceptions of preparedness for practice are linked to feelings of confidence. Those who are capable but do not feel confident may pose a risk to patients, however, there is arguably a greater risk from graduates who are confident but not capable: safe beginners are expected to know their own limitations. The mismatch in confidence of trainees versus supervisors could be explained by trainees having inaccurate perceptions of their own level of skills, or by supervisors' having expectations that are higher than is reasonable of a new graduate, or it might be a mixture of both of these factors. Further research in this area would help us and others understand whether trainees are overconfident, or supervisors are expecting too much. The implications of these reasons are different and would need to be addressed in separate ways.

The outcomes expected at graduation may not be clear to supervisors – some expect an independent practitioner at graduation, others expect a safe beginner ready to further develop skills. Setting clear minimum expectations is an area for dental schools, the GDC and those involved in vocational/foundation training to address. It would be helpful to further define what is expected of students at the end of undergraduate training in order to ensure a shared understanding.

Clinical experience

The 2018 Supervisors' survey asked about the preparedness of newly qualified dentists across the GDC learning outcomes. As described above, supervisors reported a significantly lower level of confidence than trainees in the areas of treatment planning, indirect restorations, endodontics, extractions, and dentures. The analysis of the open questions in all the surveys suggested that there was a need for increased clinical experience in undergraduate training, which the Supervisors' survey respondents suggested had decreased over a period of time. It was also suggested that there were variations between dental schools and trainees. The qualitative responses from the 2018 and 2019 Trainee Survey frequently referred to a lack of clinical exposure in undergraduate training, reporting a difficulty in accessing patients that required more complex treatments such as multi-rooted endodontics during their undergraduate course. Some of the responses from trainees described lack of availability of patients and an element of 'luck' at being allocated patients who needed more complex treatments.

The participants in our Follow-up Supervisor Workshop and Survey told us that they felt that students do not have suitable access to an appropriate range of patients or range of treatments at dental school. Out of 57 respondents who completed the follow-up survey, 88% told us that they considered students have a lack of clinical experience at the point of graduation. Participants in the workshop told us that they felt graduates undertaking DFT lacked confidence and require substantial guidance during the completion of treatment. The follow-up survey further indicated that 67% of supervisors agreed that trainees lacked practical knowledge/skill in undertaking basic procedures. Feedback during the workshop included the importance of schools ensuring that patients are recruited and assessed appropriately so that students have access to patients that fulfil the students' developmental needs.

Some of the solutions suggested in the Supervisor Survey and the Follow-up Supervisor Workshops focused on the need for an increase in clinical experience for students and opportunities to access a suitable breadth of patients in different contexts.

A frequently made suggestion from supervisors was for more time to be spent at outreach placements to improve the students' access to a wider range of patients with a variety of treatment needs in order to improve new graduates' knowledge and skills. Many supervisors told us that undergraduate programmes should seek to include more opportunities to gain practical experience as they perceived that students have excellent theoretical knowledge yet struggle to apply their skills, suggesting that they lacked confidence when transitioning into 'real-world dentistry'.

The REA suggested that as a result of changing demographics and dental disease, students were found to have little experience of complete dentures due to the difficulty in recruiting edentulous patients[3]. Our inspections of BDS programmes highlighted that some dental schools used simulated environments such as 'phantom heads' to increase exposure to a particular treatment where patients were not available. While a simulated environment offers valuable learning, it is predictable whereas people are not. It therefore cannot give the same experience as actually treating a patient and is not an equal substitute. BDS inspections identified that some dental schools had paediatric patient supply issues and noted a variability in students' experience in paediatric dentistry. This was also highlighted in qualitative survey responses by trainees.

Patient representatives at the Preparedness for Practice Conference told us that they expected students to have exposure to different scenarios and to a range of patients with different backgrounds and needs during undergraduate training. They wanted reassurance that a newly qualified dentist would be able to deal with different types of patients, for example young children, nervous patients, and patients with varying medical conditions.

Discussion

Feedback from both trainees and supervisors suggest that there is a lack of clinical experience at undergraduate level. The REA states that although many people suggest the solution to this is to increase undergraduate clinical experience, there are challenges in doing this, including already full curricula and the availability of suitable patients[3].

The REA also found that competency may be independent of time or number of procedures completed, lending weight to a student-centred and outcomes model of education[3]. This reflects the understanding that we have reached with education providers that students should be treated as individuals with specific needs which should to be highlighted by robust monitoring systems. On balance, we believe that dental students would benefit from exposure to a greater breadth of patients and increased practice undertaking more complex treatments, however we appreciate that dental schools will find this hard to implement. There were suggestions in the Trainee Surveys that the allocation of patients to students was not done through a fair process leading to disparities of clinical experience between individuals in the year group. This allocation process will differ significantly by dental school and the way in which they treat patients. Dental schools should ensure that patients are allocated according to the developmental needs of the students, however end-to-end holistic patient care will inevitably lead to students experiencing different types of patients and different treatments. The question is how can you ensure parity of student experience but still promote holistic care?

Changes in disease prevalence and patient preference impacts on the types of procedures undergraduates can experience. This is especially true for amalgam use and complete denture construction, the former due to the drive away from amalgam use for environmental and patient preference reasons and the latter due to people retaining their own teeth for longer and a decreasing proportion of the population being edentulous. Although these treatment modalities are rarer, new graduates are still likely to have to perform these treatments in practice and therefore they still need to have knowledge and clinical experience in these areas, especially if there aren't appropriate referral pathways in place. Implants are an area that many dental students do not get much exposure to but the demand for these is increasing from patients. Consideration is needed on the amount of teaching required at undergraduate level in this modality. Some dental schools struggle to recruit paediatric patients, for example in Scotland, since the introduction of the Childsmile scheme, an initiative to improve oral health of children and reduce inequalities both in dental health and access to services. Birmingham graduates fed back regarding the lack of caries removal experience, attributing this to fluoridated water in the area.

Both these examples show how public health measures, although beneficial to the local population, can make recruitment of different types of patient and opportunity to gain experience in some treatments difficult. We will be reviewing the learning outcomes, with input from stakeholders, to ensure that the learning outcomes are relevant and comprehensive. Our Quality Assurance process and Standards for Education will focus on students getting adequate exposure to the right range of clinical treatments.

Non-clinical skills

The REA highlighted that there is more to preparedness than clinical skills[3]. Professionalism, teamwork, and the ability to communicate were highlighted as important skills needed by dentists. Managing complexity and dealing with uncertainty were also identified as important to being prepared for practice, and which can impact on the profession and patient care. Other evidence from the REA highlighted that in order to be prepared for practice, trainees needed the ability to carry out procedures under challenging circumstances (for instance time pressure, distressed patients, unexpected complications) and to prioritise well[3]. The challenges that new graduates are likely to face, and the management strategies they employ, should be discussed in both undergraduate and DFT/VT to ensure that new graduates are well-prepared for the workplace.

The 2018 Trainee and Supervisor Survey results suggest that trainees seem to recognise their professional responsibilities including understanding the GDC's Standards for the Dental Team. Overall, supervisors agreed that trainees understand this, which suggests that it is well addressed in undergraduate education. Some of the qualitative feedback from trainees and supervisors included feelings that too much emphasis was placed on 'soft skills' at the expense of practical skills, although others commented favourably on students' communication skills and approach to working with patients. There were areas in the 2018 Trainee and Supervisor Surveys in which supervisors were not confident in trainees' non-clinical skills – only 27% of supervisors agreed that trainees were adequately prepared to manage patient complaints. 63% of supervisors agreed that trainees can recognise their own limitations, however, 37% of supervisors either disagreed or neither agreed nor disagreed that trainees understand their limitations. Understanding limitations is fundamental to patient safety, as it ensures that registrants do not embark on treatments that are beyond their skill set.

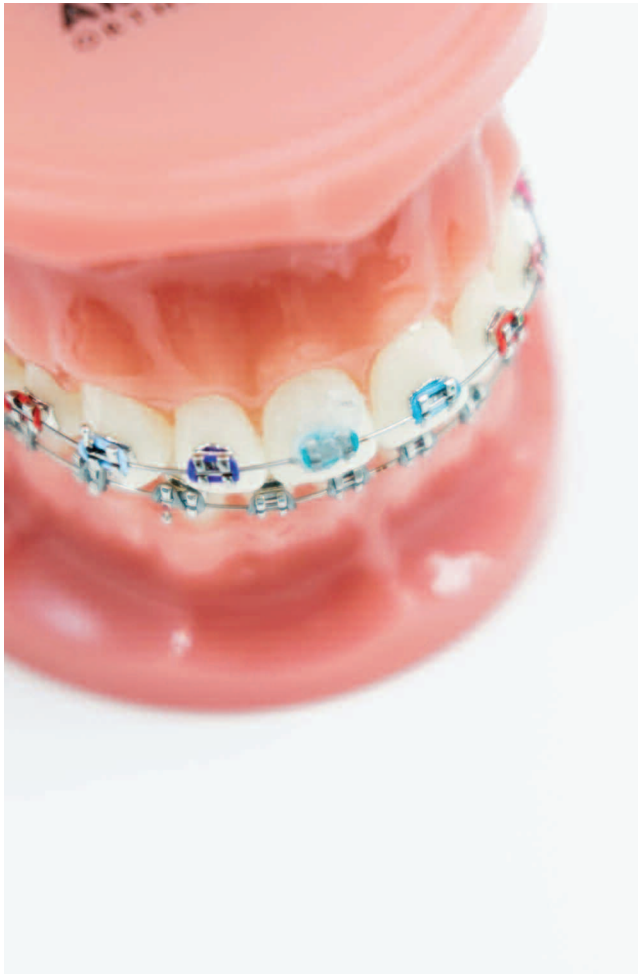
It was mentioned by delegates attending the Preparedness for Practice Conference that some students and trainees were unaccustomed to receiving criticism and were not open to admitting and learning from mistakes. We were told that this may be for multiple reasons including lack of insight, fear of failure and fear of repercussion. To address these issues, dental schools should ensure that dealing with failure, accepting feedback, managing stress and anxiety, work-life balance and conflict resolution have a greater focus within undergraduate training.

The REA research also highlighted that reflective practice is an important skill for trainees[3]. Supported by constructive feedback, reflection can assist preparedness in both clinical and non-clinical areas. Although clinical experience is important, if no feedback is given or it is not reflected on, students/trainees will not learn from the experience.

Discussion

Non-clinical skills including professionalism are just as important to being a dentist as clinical skills. The results of our Trainee and Supervisor Surveys seem to indicate that, although in general trainees understand concepts of professionalism and are good communicators, there are still some areas in which they are less prepared, including managing complaints, recognising their own limitations, working with the wider dental team and working with wider health and social care professionals.

Dental schools and foundation training providers should continue to help students and new graduates develop insight into their current level of expertise, their strengths, and their continuing educational, technical, and professional needs.



Course design, monitoring, and progression

The REA included a review of studies relating to course and curricula design, both within dentistry and across other healthcare professions[3]. Findings included:

- Patient centred teaching may have benefits over specialty-based teaching.
- Problem based learning programmes lead to better preparation in communication, team working and dealing with paperwork.
- Competency may be independent of time or number of procedures completed, lending weight to a student-centred and outcomes model of education.
- Self-perceived preparedness may be improved by teaching which encourages reflective learning with good feedback.
- There are challenges in recruitment of the “ideal” teaching staff, and differences of opinion as to what that looks like (e.g. general practitioners vs specialists).
- Traditional single competency-based assessments, numbers of procedures completed and time-served are inadequate. Instead multiple skills need to be assessed frequently and preparedness understood as the demonstration of consistent performance over many skill domains, in a variety of patient related circumstances.
- There needs to be multiple points of assessment over time, with a range of assessors, to check on developing preparedness. This allows for the understanding that students do not progress at the same rate, nor do they have the same clinical, professional or communication difficulties[3].

Our BDS inspections found that some monitoring systems for student experience and performance did not provide a holistic picture for decisions to be made, while some required further development. One programme did not have the appropriate measures in place to identify in a timely way struggling students or those with ongoing clinical performance issues. The BDS inspections also highlighted differences between dental schools with some having ‘clinical targets’ for a specific number of different clinical procedures, while others had a more holistic approach to student progression and

'sign-off'. Through our stakeholder engagement events, some stated that although it was important to have a holistic approach to progression, it was still important for students to have sufficient experience performing clinical treatments on patients.

In the qualitative responses from the 2018 Supervisor survey some respondents commented that historically students were required to complete a procedure competently multiple times before they were signed off and the shift away from this way of assessment is a cause for concern for them.

Regarding pastoral support as an undergraduate, some trainees reported in the Trainee surveys that they felt a lack of support during dental school. They mentioned various issues including poor quality feedback; high student to teacher ratios; feeling unable to raise concerns; and staff behaving in a way that could be considered inappropriate, aggressive, and disrespectful. These concerns were very small in number. Other trainees mentioned positives examples of good working relationships with staff including well run departments, friendly staff, and constructive feedback given.

The issue of selecting the 'right' students for dentistry programmes arose at the tripartite workshops and the Preparedness for Practice conference. It was suggested that some students were not the best fit for dentistry, and that too great a focus is placed on academic ability rather than dexterity, attitude, and behaviours. In addition, it was proposed that some students did not seem to have a positive attitude towards the course. It was suggested at the conference that there may be a need to assess the effectiveness of the process of dental school admissions. Some within dental schools stated that removing students not suited to dentistry from the course could be very difficult. The REA highlighted issues with centrally located university appeals processes and panels which may allow students to return to a dental course as they may not fully appreciate what is required within dentistry as a profession and are unable to follow the GDC guidance on student fitness to practise[3].

Discussion

From the feedback from supervisors and other stakeholders, it is clear that there is some appetite for greater standardisation across schools in relation to clinical experience volume and range required in order to be a 'safe beginner'. We have previously considered setting undergraduate 'targets' and, although we understand the argument for this, it needs to be considered with caution as the number of times a specific treatment has been performed does not equate to being competent at that treatment. The quality of an interaction, including the process of giving feedback and reflection, is more beneficial than a large quantity of poorer quality interactions. In our quality assurance processes we require dental schools to have a rigorous monitoring and assessment process and to be able to show how they determine competence of students, but we do not expect 'targets' for specific treatments. We are conscious that setting targets could have unintended consequences, including 'trading' patients between students or, potentially, overtreatment. We will continue to observe how universities monitor and assess student progression/competence.

Some of the qualitative feedback received from the trainees' survey related to difficulties with the behaviour of some members of staff. We have to stress that only a few trainees mentioned this was an issue in their undergraduate training, however students should be encouraged to raise legitimate concerns with their dental school. We would like dental schools to have good support systems in place – both for academic support and for pastoral issues.

Outreach and preparedness for ‘real world’ settings

In our Follow-up Supervisor Workshop, the importance of schools offering suitable placements at outreach for students was discussed. The benefit of offering outreach placements was seen to be that students were able to undertake a wide variety of dental treatments and experience a ‘real-world’ environment. We were told about the financial and logistical challenges in arranging suitable placements. There were also suggestions, that if students could not go on outreach, that dental schools should employ more tutors who are clinically active in primary-care. This was seen as a way of providing students with a clearer understanding of the challenges and expectations when working in a primary-care setting. Giving a student the opportunity to spend an extended period of time in a primary-care setting prior to graduation was proposed as something that would improve their confidence and increase competence in practical dentistry.

The REA covered numerous studies relating to outreach, both within dentistry and across other healthcare professions[3]. Findings included:

- There were benefits to having significant outreach teaching, these included: increased student confidence over a range of clinical procedures, development of a sense of belonging from working in a dental team, a better understanding of the role of a primary-care dentist and increased self-awareness of their limits.
- Students reported that the outreach centre provided them with experience of working in a primary-care environment under a current NHS contract which was good preparation for DFT/VT.
- Workplace-based experiences including clinical placements, shadowing and assistantship have been recommended by the GMC[3].

At the Preparedness for Practice Conference the benefits of ‘real-world’ placements were discussed and attendees described what they believed were a number of benefits that outreach placements had for students in preparing them for practice. They stated benefits such as increased clinical experience, dealing with patients from a wider range of backgrounds, understanding more about primary-care and learning to deal with complexity and increased pressure. Attendees also suggested that shadowing schemes could help students understand what would be expected of them in a primary-care environment. One institution's outreach programme highlighted the benefits in producing graduates that are better prepared for practice at graduation.

Respondents to the Supervisor Survey indicated in their free text responses that some graduates lacked preparedness for working in general practice and lacked familiarity with working in the NHS. This was also reflected in the Trainee Surveys. In the Follow-up Supervisor Workshop and Survey there was a consensus that not enough information is provided to students with regards to NHS dentistry and that the restrictions of working as a dentist in an NHS practice including the different equipment and materials available. There were suggestions that it should be mandatory for all students at undergraduate level to have exposure to general

dental practice. In both the Supervisor Survey and the Follow-up Supervisor Workshop there were suggestions that students should be aware of the NHS claiming system so that they can understand the financial aspects of dentistry, including what types of treatment can be carried out under the NHS system. There was no consensus at the Preparedness for Practice Conference on whether some of this information should be taught in undergraduate training but there is an apparent need for more robust preparation to ensure that NHS rules, regulations and funding information are understood prior to patient contact in DFT/VT. At the Preparedness for Practice Conference, attendees also discussed that dental schools normally teach 'Gold Standard' dentistry but that often this cannot be applied well in primary-care settings. Patient representatives at the Preparedness for Practice Conference suggested that students need to develop an understanding of the cost implications of treatment options and how cost can impact and potentially limit patient choice. The recommended option may not be the option that the patient can afford – and dental students and new graduates need to know how to deal with that sensitively.

The REA on Professionalism referenced the changes in expectations of patients, with a shift towards 'consumerism' in healthcare[8]. This may be linked to an increase in litigation, increase in self-diagnosis and knowledge of patients (via access to online searches, social media etc.) and an increase in demand for cosmetic treatments. New graduates need to be prepared to work in a litigious environment, be skilled at managing patient expectations and be confident in the business aspects of dentistry, including discussing costs of treatment with patients. The REA on Professionalism highlighted that the public expect a consumer service from the dental team and therefore financial and transactional elements influence patient experience, access to care and trust[8].

Discussion

The REA on preparedness for practice suggests the benefit of outreach is not just to increase clinical experience but also to help students deal with complexity and pressure[3]. The benefits of outreach were seen to include increased understanding of working in general dental practice and we believe an increased exposure to working in general dental practice will benefit the transition to DFT/VT. We understand that there are challenges for dental schools to find suitable outreach and to fund outreach placements. We do, however, believe that all students would benefit from outreach placements to help them prepare for practising life.

Dentistry taught at undergraduate level does not seem to cover the transactional nature of dentistry which may mean that new graduates struggle when having to discuss payment options with consenting patients. There is a dilemma in dentistry between healthcare and finances, but graduates should be able to discuss payment with their patients and understand that this can limit patients' treatment options. Trainees suggested in the Trainee Surveys that understanding NHS payment and treatment availability would help them when starting DFT/VT.

At present this is taught at DFT/VT rather than at dental school, however, graduates may feel more prepared if some of the basics are addressed at undergraduate level. We encourage dental schools to discuss differences in dental school and primary-care NHS dentistry with their final year students to help them better understand what to expect in their DFT/VT year, however we appreciate that there are time pressures making this difficult. We do expect that dental schools ensure that new graduates have good communication skills, including being able to discuss the risks and benefits (including the costs) of different treatment options and have an awareness about the implications of cost to patients.

Managing the transition period

Differences in expectations of the new graduate can result in misunderstandings and serve to make the transition from student to new practitioner even more difficult. There seems to be a disconnect between expectations of undergraduate teaching providers and the expectations of supervisors which could be bridged by a closer dialogue between the dental schools and those managing postgraduate training of new graduates. One piece of research referenced in the REA found that more than half of supervisors believed that that their trainees, whilst employable, were not adequately prepared[3]. The authors of this research recommended closer collaboration between the organisations involved in undergraduate education and training and those managing early postgraduate training.

There is evidence in the REA of efforts to enhance engagement between stakeholders. Changes included schools providing practices with individual student's skill sets, and two-way discussions between the dental school and local postgraduate training organisations about the 'safe beginner'[3]. The authors the REA felt that these changes had improved information sharing, stakeholder engagement and facilitated initiative developments.

This enhanced engagement, they argued, improved undergraduate and postgraduate training, and helped students to be better prepared for their future career[3].

In the tripartite workshops and Preparedness for Practice Conference methods of sharing information between undergraduate and foundation training were discussed. There was a consensus amongst attendees that all graduates should leave undergraduate training with a Professional Development Plan (PDP) which should be discussed with the individual's supervisor at the start of and throughout the foundation/vocational training year. There were further suggestions of a 'passport-style' competence book with numbers of treatments recorded and making feedback from undergraduate supervisors and trainee reflection available to supervisors. Others proposed that the production of an educational plan for the start of foundation training with input from dental schools, the trainee and the supervisor would be a good solution.

The time between finishing clinical activity (before final examinations) and starting foundation training can be between three and five months. In the tripartite workshops it was suggested that the length of this period may lead to difficulties for trainees, they may 'de-skill' and lose confidence and become nervous when treating patients again. Suggestions to mitigate this included: foundation training starting closer to the end of finals; dental schools running clinics over summer; foundation training running clinical skills sessions pre-patient contact; shadowing schemes over summer. This links with schools ensuring that they are teaching students skills for life and ensuring there is resilience in a student's competence.

There were discussions in the tripartite workshops and in the Preparedness for Practice Conference about how societal changes will have influenced how this generation of dental graduates have been raised and how this may impact preparedness. This is also discussed in the REA[3]. There were also views shared about how new graduates may be less resilient than before (again due to societal changes) and have poorer wellbeing, which may not be helped by having to move location (potentially away from support of friends and family) and into an unfamiliar environment for foundation/vocational training.

Some students may find it especially hard to transition to the workplace due to never having had a job before. This is therefore a double transition for some new graduates - to working life and to a clinical job. As with any major life change there is a 'fear of the unknown', affected by 'leaving the cocoon'.

Some concerns were raised in the tripartite workshops and the Preparedness for Practice conference about whether there were robust support networks in place for trainees. Personal issues can have a knock-on effect on professional performance and can potentially impact safe patient care. Many suggested that pastoral support needs to be independent from supervisors and TPDs. There was discussion about how 'buddying' systems would be beneficial especially in the transition period and that mentoring by an experienced role model can play a role in supporting new graduates.

At the Preparedness for Practice Conference, participants discussed the process of national recruitment to foundation/vocational training. There was discussion that the current process did not recognise the needs of the trainee. There were also pastoral issues raised by trainees, such as trainees being placed far from support of family, friends, university etc. There were reports from trainees that the quality of their training year greatly varied depending on the supervisor and the practice. From the participant discussions, factors that appear to make training more effective are the trainee's relationship with his/her supervisor, and the skills and commitment of the supervisor.

Some of the solutions to address this included identifying the most appropriate supervisor and practice for the trainee's needs, ensuring that the supervisor and trainee have a good rapport and ensuring consistency of quality of supervisor and practice. There was also a suggestion that those who get their last choice of location or practice, by ranking low in the recruitment process, might be the individuals that require the most support and greatest supervision.

Discussion

There is a sudden increase in responsibility and accountability for new dental graduates when they start DFT/VT and therefore it is so important that there are robust and effective support systems in place. There are some trainees that struggle with the transition to practice more than others and to mitigate this we believe COPDEND should consider assessing the process of recruitment to foundation training and whether it is fulfilling the needs of trainees and supervisors. COPDEND should consider whether trainees require addition pastoral support services that are separate from their TPD and supervisor.

The level of support given to a trainee can differ according to the training practice and supervisor, however, there is a difference in the support received on clinics at university and the support available in practice. Towards the end of the final year of university, students should be receiving increasingly less direct supervision in readiness for them to start becoming more independent. By foundation training, a trainee should have insight into their own strengths and weaknesses and know when they may need extra support from their supervisor. Conversely, supervisors should ensure that they understand their trainee's strengths and weaknesses and be able to help when needed.

Learning from mistakes is also an important way of identifying what went wrong, understanding how to do things differently next time and if necessary, sharing the learning with others so that they do not make the same mistake. It is important that individuals know their limits, step back when necessary and seek help. It is therefore important that help and support is available to students/trainees when they require it. A newly qualified practitioner, who is aware of the limitation of his/her skills and knowledge and who is adequately supported by a supervisor or more senior colleagues, represents a much lower level of risk than someone with a similar profile of knowledge and skills but lacks that self-awareness and support.

Information sharing between dental schools and supervisors about the experience and areas for development of a trainee is a good way for a supervisor to understand the needs of a specific trainee. We are aware that some dental schools are already sharing information with supervisors and we would encourage others to start doing the same.

Dental schools could help dental students prepare for the transition period by teaching them how to manage stress and anxiety, the importance of maintaining work-life balance and techniques to deal with uncertainty.

Defensive practice

Collective sources of research highlighted the 'fear' factor in new graduates which, on discussion at the Preparedness for Practice Conference, was attributed to multiple causes including increased litigation, fear of regulation and the fear of failure.

Some supervisors and trainees' responses to the surveys highlighted 'defensive practice' as a theme. In our workshop with postgraduate deans and supervisors, discussions took place to explore the reasons why students/trainees may practise 'defensively'. The consensus was that they follow defensive dentistry techniques due to lack of competence or confidence. Based on this we believe that if there are more opportunities to enhance clinical skills at university, this will result in a reduction of such techniques. In the Follow-up Supervisor Survey 74% of the respondents identified defensive practice amongst their foundation trainees.

It was apparent that the participants in the Preparedness for Practice Conference felt there was a fear of litigation and regulation in the profession and that this fear is transferred to students via tutors or supervisors (both in dental school and in foundation/vocational training). It was agreed that

our student engagement should continue to ensure that there is awareness of the range of work the GDC does and positive relationships are created early. There was also agreement that we should seek to improve our relationship with dental schools and foundation training supervisors.

Discussion

The impact of the 'fear factor' described by some new graduates cannot be underestimated. A lack of confidence and fear of a procedure going wrong can lead to defensive practice and an avoidance of undertaking certain clinical procedures. The fear of making mistakes is compounded by the risk of litigation and referral to fitness to practise. A better understanding of how to appropriately manage complications and patient complaints could help mitigate this and having a supportive training environment is essential to help new graduates avoid practising defensively. We have been told by new registrants that fear of the GDC started at dental school, including through stories from members of staff about FtP investigations and through warnings of how the GDC would react to poor behaviour or work. We hope that registrants involved in education will think about how some of their words will impact student and new graduate behaviours and consider the focus on motivating students through their desire to work in the interests of patients rather than fear of the regulator. We will keep engaging with students to ensure that they understand the role of the GDC and our expectation of professional behaviours.

Patient safety

We explored whether the concerns about new graduates had implications on patient safety by analysing our FtP data from 2015-2019. This showed that newly qualified dentists (less than 2 years on the register) were nearly 4 times less likely to be involved in an FtP case than a registrant who had been on the dental register for more than 3 years (Appendix 4).

The REA suggests that students are aware of definitions of patient safety, including never-events. Some third-year students felt that while they recognised the importance of being aware of their own competence, they also needed more practice in order to be competent. The authors of this study felt that early teaching of patient safety and its definition and requirements, were important[3].

Discussion

It is positive that new graduates are less likely to be involved in an FtP case, however, this is only one fairly blunt measure of patient safety as we only investigate concerns raised to us. The number of FtP cases may be lower for new graduates due to the supervised nature of DFT/VT or because patients sometimes refer years after the actual incident. FtP figures should therefore be treated with caution. We will continue to monitor the FtP figures of newly qualified dentists and we will consider how to obtain other feedback about the performance of new dentists.

Part Four: Conclusion and next steps

This report examined the preparedness of UK dental graduates for practice as registered dentists. Based on the evidence and analysis, it is clear that there are some areas in which the preparedness of new graduates could be improved to better prepare them for providing dental care to patients in the UK, however it does not show that new graduates are unsafe. It is important to highlight that there are quite significant differences in views and expectations between dental schools and those involved in foundation/vocational training about what is a 'safe beginner' which needs to be addressed.

There is a suggestion within the evidence that dental schools do not prepare new graduates for the 'real world' work environment that most will enter, and thus close supervision is needed for new graduates to adjust to NHS dentistry. A possible argument from dental schools is that they are training dentists and not NHS dentists. There are ways that the preparedness of new graduates may be enhanced to better prepare them for practice. These include increasing clinical experience, especially in the more complex modalities, educators/supervisors having a better understanding of the individual needs of students and new graduates, ensuring that dental students understand the demands of primary-care dentistry through increased exposure to 'real world' settings, and ensuring that there is adequate support available through the transition period between student and newly qualified dentist. Some of these suggestions involve changes to the current undergraduate teaching programmes which leads to questions about whether it is possible for dental schools to achieve this over 5-years.

The definitions within Preparing for Practice of a 'Safe beginner' and 'Independent practice' do not explain in detail the differences in competence and experience of a safe beginner or an independent practitioner or clarify whether they are one and the same[4]. It might be argued that one role of DFT/VT is at present to manage the transition from a safe beginner to an independent practitioner. This therefore raises a question about the point at which full registration is given by the GDC – there is only one type of registration and, consequently, at present new graduates should be both safe beginners and be ready for independent practice. Currently our registration system is binary – you are either a registered dentist or you are not – there is no way of capturing that some of these registrants, although safe beginners, are not quite ready to practise independently. A year of supervised practice, such as DFT/VT, may be essential in ensuring registrants safely become ready for

independent practice. The small number of new graduates that don't undertake DFT/VT may have a more abrupt landing from student to independent practitioner – it will be the first time they have full responsibility for their own patients, take payment for services provided, work with a wider team outside a dental school setting and it may even be their first job. We do not know whether these individuals pose a greater risk to patients and at present we do not have assurance of a system that ensures they are supported and safe. There are questions that need further consideration, along with the question around the point of registration. These include whether foundation training is the

right length of time and whether the GDC should be involved in the quality assurance of foundation training. These questions will need to be discussed in detail with all the relevant stakeholder groups.

This report may also have implications for other registrant groups, particularly dental therapists and hygienists who have a similar transition from university to practice and undertake invasive and irreversible dental treatments. Some hygiene therapy graduates undertake Dental Foundation Therapy Training, however the numbers for this training year are limited. This may be an area in which more research is required to determine how well-prepared dental hygiene and therapy graduates are for clinical practice. There are also implications for graduates from the EEA and other international graduates – if UK graduates need an additional year of pre-registration training than there is likely a need for pre-registration training for those who trained outside the UK.

This review highlights that there are several issues to address that could help further prepare students and new graduates and we commit to undertaking further work on this with the key stakeholders involved in undergraduate and post-graduate training.

Impact of Covid-19

The research on which this report is based was undertaken prior to the COVID-19 pandemic. The issues raised and conclusions within the report reflect on pre-COVID times. The dental landscape has now considerably changed for at least the medium-term. For dental students, the cessation of routine dentistry led to clinical practice stopping in mid-March 2020 and students have missed up to three months of patient interactions and treatments. When they return to dental school after the summer there will be limitations to the number of patients they can treat and the procedures they can perform.

The benefit of additional supervised clinical experience, particularly in real world settings, in improving preparedness for practice is clear in the research material. The impact of COVID-19 means that students may struggle to get the same amount of experience as previous cohorts and brings consideration of this matter to the fore.

The GDC, dental schools and those responsible for DFT/VT collaborated to ensure a pragmatic solution for those students qualifying in 2020. This was possible because these students had completed nearly all their clinical training and because any minor gaps could be addressed in the next year of supervised practice. Those due to graduate in 2021 and in the following years will not have the same opportunities as previous cohorts to gain clinical experience with patients during their BDS programme.

The GDC has a statutory duty to ensure that all those who qualify in the UK have the requisite knowledge and skill for the efficient practice of dentistry. At present, we do not know how and whether we can be assured of this for future cohorts, but we do know that dental schools are working hard to ensure that students have the best training possible in these circumstances.

We are discussing the impact of COVID-19 on these cohorts with all the relevant stakeholders to better understand how the outcomes of education and training will be impacted. We recognise the absolute need to work together with our partners to ensure that new graduates are safe and well-prepared for practice.

Appendices

Table of Appendices

The appendices are provided in a seperate document and can be found on our website here.

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