NHS

Commissioning Standard for Restorative Dentistry

NHS England and NHS Improvement

Equality and health inequalities statement

Promoting equality and addressing health inequalities are at the heart of NHS England's values. Throughout the development of the policies and processes cited in this document, we have:

- Given due regard to the need to eliminate discrimination, harassment and victimisation, to advance equality of opportunity, and to foster good relations between people who share a relevant protected characteristic (as cited under the Equality Act 2010) and those who do not share it; and

- Given regard to the need to reduce inequalities between patients in access to, and outcomes from healthcare services and to ensure services are provided in an integrated way where this might reduce health inequalities.

Commissioning Standard for Restorative Dentistry

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1 Foreword

Since the beginning of the NHS, General Dental Practitioners (GDPs) have delivered the majority of NHS dental care provision and contributed hugely to the improvement in the oral health of the nation. Despite significant improvements in oral health, there remains a considerable level of dental disease in some communities and demographic groups. In addressing these enduring health inequalities, and with a focus on the oral health of children and older people, a re-orientation of NHS England's commissioned dental services is underway.

A clear focus on prevention was emphasised in the Five Year Forward View and remains the dominant feature of planning and delivery of NHS England dental services. This is reinforced with the publication of the NHS long Term Plan. GDPs will continue to be the mainstay for the provision of NHS dental care with the general dental practice team being complemented by dental professionals in the community, hospital, academic, research and public health arenas. There are new challenges, critically in managing the oral health in an ageing population with existing co-morbidities as well as an increasing demand for more complex dental procedures. In delivering the best place-based patient journey possible, access to enhanced dental care services and specialist care pathways remains a key consideration for those commissioning care for their local populations. The resulting commissioning intent must also ensure integration of dental care across the various healthcare boundaries in order to achieve a seamless patient pathway.

Concurrent with the re-orientation of commissioning, the challenges of complex dental care in an aging population is driving research and technology with the advent of new dental materials and endorsed clinical techniques. Together these innovations provide opportunity for a more holistic approach to the design and delivery of enhanced and specialist dental care services. Thus, with a shared ambition for timely access to the right skills in the most appropriate setting, patients, clinicians and commissioners have all contributed to setting a national benchmark for quality with the aim of ensuring all providers can work together to focus on patients and their needs.

The resulting transformation is addressing the artificial divide between primary dental care and hospital specialists, freeing specialist expertise from historic service delivery and training models. Moreover, in optimising access to a broader range of dental care clinicians, with the appropriate and assured clinical competencies and clinical infrastructure, NHS England can offer patients a more timely and flexible service, a service with capacity and choice.

This broader intent is captured in the series of dental commissioning standards produced to support the transformation of NHS dental services in England. Each standard sets out a framework for local work and should be read in conjunction with the Introductory Guide for Commissioning Dental Specialties. With the adherence to the standardised framework for place-based commissioning, we can ensure that local NHS dental care pathways are developed and commissioned with consistency and excellence, across the whole spectrum of dental service provision.

The pace of transformation will inevitably vary across England with the requirement to conform to national quality standards applicable to all aspects of dental service

provision and all regions. In continuing with the legacy of effective collaboration between local commissioners, their local patient populations, the local Dental Managed Clinical Networks (MCN), Consultants in Dental Public Health and Local Dental Networks (LDN)[1], achieving the nationally expected standards will not be a significant challenge. The focus for commissioners is an assurance for local populations of timely access to high quality, evidence-based care; confidence in a service designed at local level to meet local needs aligned with national standards.

Sara Hurley
Chief Dental Officer for NHS England

2 Executive summary

The aim of this guide is to offer a standardised framework for the local commissioning of specialist and specialised restorative dentistry services. It is intended to be used by commissioners to ensure that they are improving access to care, based on needs, with demonstrable high value health outcomes experienced by patients.

It is expected that local commissioners work closely with the local restorative dentistry Managed Clinical Networks (MCN), the Consultants in Dental Public Health and Local Dental Networks (LDN) or dental system leadership teams. These may change as the role of Sustainability and Transformation Partnerships (STPs) and Integrated Care Systems (ICSs) becomes clear. Together they will be responsible for delivering the best place-based patient journey possible, supported by specialist advice and/or access to care, that meets the needs of diverse local patient population groups and works towards reducing inequalities in access to treatment and outcomes whilst achieving the nationally expected standards of care provision.

3 Introduction

This document defines the NHS specialist restorative dentistry care pathway in England and sets out the minimum standards commissioners must adopt for any provider that offers these dental services. The expectation is that it should be achieved. If commissioners are unable to implement or apply the standards they should ensure there is an audit trail of the reasons for this and the risk mitigation they have applied, which they can reference if requested.

3.1 Requirements to conform

The requirements to conform are also relevant for any dentistry services which already include specialist restorative dental care services as part of their delivery.

[1] These may change as the role of Sustainability and Transformation Partnerships (STPs) and Integrated Care Systems (ICSs) becomes clear.

Commissioners should work with existing providers and agree a timetable for adoption of these requirements. Commissioners should try to achieve a compliance date as soon as possible, given constraints in workforce and capacity.

4 What is restorative dentistry?

4.1 Definition

Specialist Restorative Dentistry is for patients who have complex dental problems, requiring multidisciplinary, specialist dental care. It involves replacing missing teeth, repairing damaged teeth and extends to rehabilitation of the whole mouth. It is based on specialist skills and knowledge from the three mono-specialties: prosthodontics, periodontics and endodontics. Specialist Restorative Dentistry services are predominantly consultant-delivered, usually in a hospital setting. Appendix 1 provides detailed descriptors for each of the mono-specialties.

These services will involve specialist dental care for patients requiring management of developmental conditions such as hypodontia, cleft lip and palate and amelogenesis imperfecta, and other conditions such as head and neck cancer, complex dental trauma and Grade C periodontitis.

It is recognised that a broader range of specialist dental care can be delivered in a university teaching hospital and include management of patients requiring prosthodontic, periodontal and endodontic treatment.

Separately, in a general dental practice setting, the routine care provided by the dental team will also involve replacing missing teeth, repairing damaged teeth and treating dental conditions such as periodontal (gum) disease and endodontic (root canal) infections. These patients do not need consultant-delivered specialist restorative dentistry.

A number of patients seen in general dental practices may have dental conditions that are more challenging to manage. The diagnosis, planning and treatment of these conditions require a consultant-led, Managed Clinical Network (MCN). The patients would then receive dental treatment from clinicians with training and experience, as appropriate for their dental condition.

It is recognised that few functioning Managed Clinical Networks for restorative dentistry currently exist. However, the on-going development of these will help to determine where and from whom patients can receive dental care, whether as specialist restorative dentistry or as an enhanced level of routine dental care.

4.2 Levels of care

The Department of Health and Social Care Advanced Care Pathway Working Group defined procedures and modifying patient factors that describe the complexity of a case. The levels of complexity do not describe contracts, or practitioners or settings. Levels 1, 2 and 3 care descriptors outline the complexity of the clinical care required, including planning, technical procedures and any modifying patient factors. They reflect the competence of clinician and setting (equipment) required to deliver care of that level of complexity and may change depending upon one or more of the following patient factors:

- Medical
- Psychosocial
- Patient anxiety
- Other patient-associated modifiers

4.2.1 Level 1 care

Level 1 care complexity requires the skill set and competencies a dentist gains on completion of undergraduate and dental foundation training. Therefore commissioners would expect this level of competence as a '*minimum'* standard for performers on the NHS performer list and delivered within a primary care NHS mandatory contract. Practitioners develop interests, skills, speed and competence with experience and additional training and many GDPs legitimately operate above this level of care complexity in of restorative dentistry and this is expected to continue.

4.2.2 Level 2 care

Level 2 care complexity is defined by procedural and/or patient complexity requiring a clinician with enhanced skills and experience who may or may not be on a specialist register. This care may require additional equipment or environment standards but could be provided within a primary care contract as part of the continuing care of a patient or may require onward referral. Many practitioners in primary care who are not on the specialist list can legitimately deliver care at Level 2 complexity. Providers of Level 2 care on referral will need a formal link to a consultant-led MCN to quality assure the outcome of pathway delivery.

4.2.3 Level 3 care

Procedures to be performed or conditions to be managed by a clinician recognised as a specialist and on a GDC specialist list **OR** by a consultant.

This section seeks to assign the wide range of procedures in Restorative Dentistry, divided up by mono-speciality, into levels of complexity to allow care to be assigned and commissioned within an MCN model.

Level 1 and 2 procedures would usually be performed within primary care contracts. This may include primary care type clinics in hospital. Some Level 1, 2 and 3 procedures may **need** to be performed in a secondary care setting if modifying patient factors or local circumstances require this e.g. requirement for skill mix and/or multidisciplinary team and/or general anaesthetic.

Many practitioners in primary care who are not on the specialist list can legitimately deliver care at Level 2 complexity. Commissioners expect the same standards of quality and outcome regardless of the provider or setting. However, any practitioner delivering care on referral will be expected to have a formal link with a consultant-led MCN and to complete a defined number of cases per annum as a minimum requirement to maintain skills and competence.

The role of diagnosis and advice from a consultant is an important concept. There may be cases which are of level 3 complexity to diagnose and plan but aspects of delivery of the technical treatment may be at level 1 or 2 complexity. The complexity is often not about undertaking technical procedures but is about taking difficult decisions on how to approach the technical solution so that the needs of a patient can be met, and then identifying who has the skills to do each part. This gives the consultant the flexibility to arrange care that he or she oversees and quality assures but does not have to provide.

In all cases the levels of case complexity are not determined simply by the technical difficulty but by a range of factors:

- Patient related factors as described above
- Clinically related factors that complicate provision of treatment (such as anatomical or technical challenges in the delivery)
- Integrated treatment needs (an example would be Multi-Disciplinary Teams (MDTs) providing care for oncology or cleft patients)

The following complexity assessments in sections 4.3, 4.4 and 4.5 give a clear indication of the **case complexity** at the three different levels and detailed data about the conditions and circumstances where this standards document should be used (for example the prior conditions that need to be met, the importance of tooth type in endodontics and so on). Clinicians and commissioners are urged to apply the appropriate information and philosophy described within these diagrams for guidance around individual cases.

4.3 Complexity assessment: levels of periodontal care

ASSESSMENT
Comprehensive interpretation of medical, social, behavioural factors relevant to periodontal health

- Patients with Grade C Periodontitis should be referred after initial preventive advice on risk factor management and oral hygiene instruction.
- All cases of periodontitis should have initial care (including treatment) and if unsuccessful referral may then be indicated.
- Patients with modifying factors may require movement to the next level of care, including those where behaviour change is challenging. Evidence for the latter will be required to accompany referral letters.

All Patients

Diagnosis and management of patients with uncomplicated periodontal diseases including but not limited to:

- Evaluation of periodontal risk, diagnosis of periodontal condition & design of initial care plan within the context of overall oral health needs.
- Measurement & accurate recording of periodontal indices (see the care pathway in the appendix)
- Communication of nature of condition, clinical findings, risks & outcomes.
- Designing care plan and providing treatment.
- Assessment of patient understanding, willingness & capacity to adhere to advice & care plan.
- Evaluation of outcome of periodontal care and provision of supportive periodontal care programme.
- On-going motivation & risk factor management including plaque biofilm control.
- Avoidance of antibiotic use except in specific conditions (necrotising periodontal diseases or acute abscess with systemic complications) unless recommended by specialist as part of comprehensive care plan.
- Preventive & supportive care for patients with implants.
- Palliative periodontal care and periodontal maintenance.

Any other treatment not covered by level 2 or 3 complexity

Referral to the RMS ad triaged by the MCN

Level 2 Complexity

Management of patients:

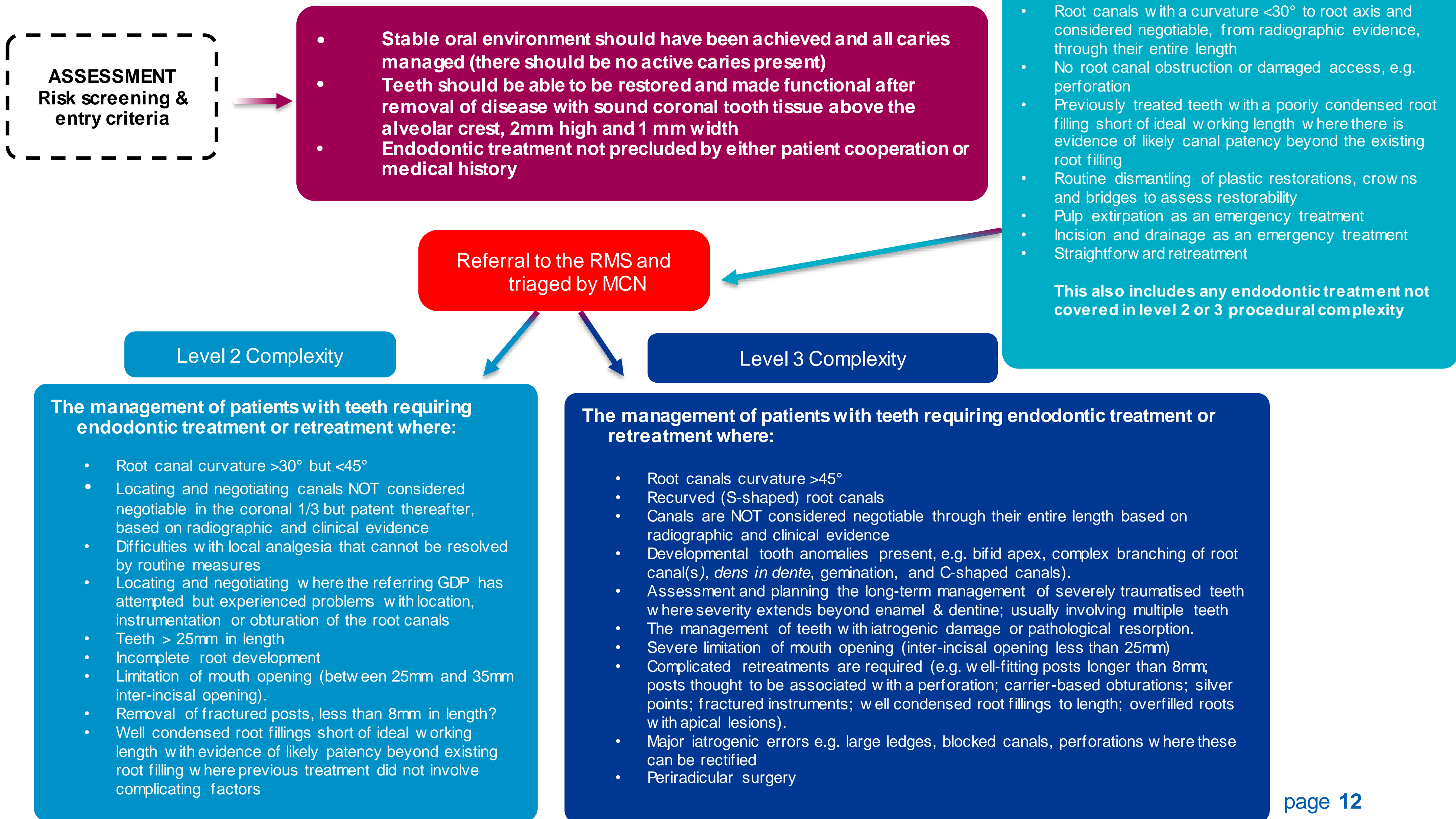
- Who **following primary care periodontal therapy** have stage II, III or VI periodontitis (>30% bone loss) periodontitis and residual true pocketing of 6mm and above.
- With certain non-plaque-induced periodontal diseases e.g. virally induced diseases, auto-immune diseases, abnormal pigmentation, vesiculo-bullous disease, periodontal manifestations of gastrointestinal & other systemic diseases and syndromes, under specialist guidance.
- With Grade C periodontitis as determined by a specialist at referral.
- With furcation defects and other complex root morphologies when strategically important and, realistic and delegated by a specialist.
- With gingival enlargement non-surgically, in collaboration with medical colleagues.
- Who require pocket reduction surgery when delegated by a specialist.
- With peri-implant mucositis where implants have been placed under NHS contract.

Level 3 Complexity

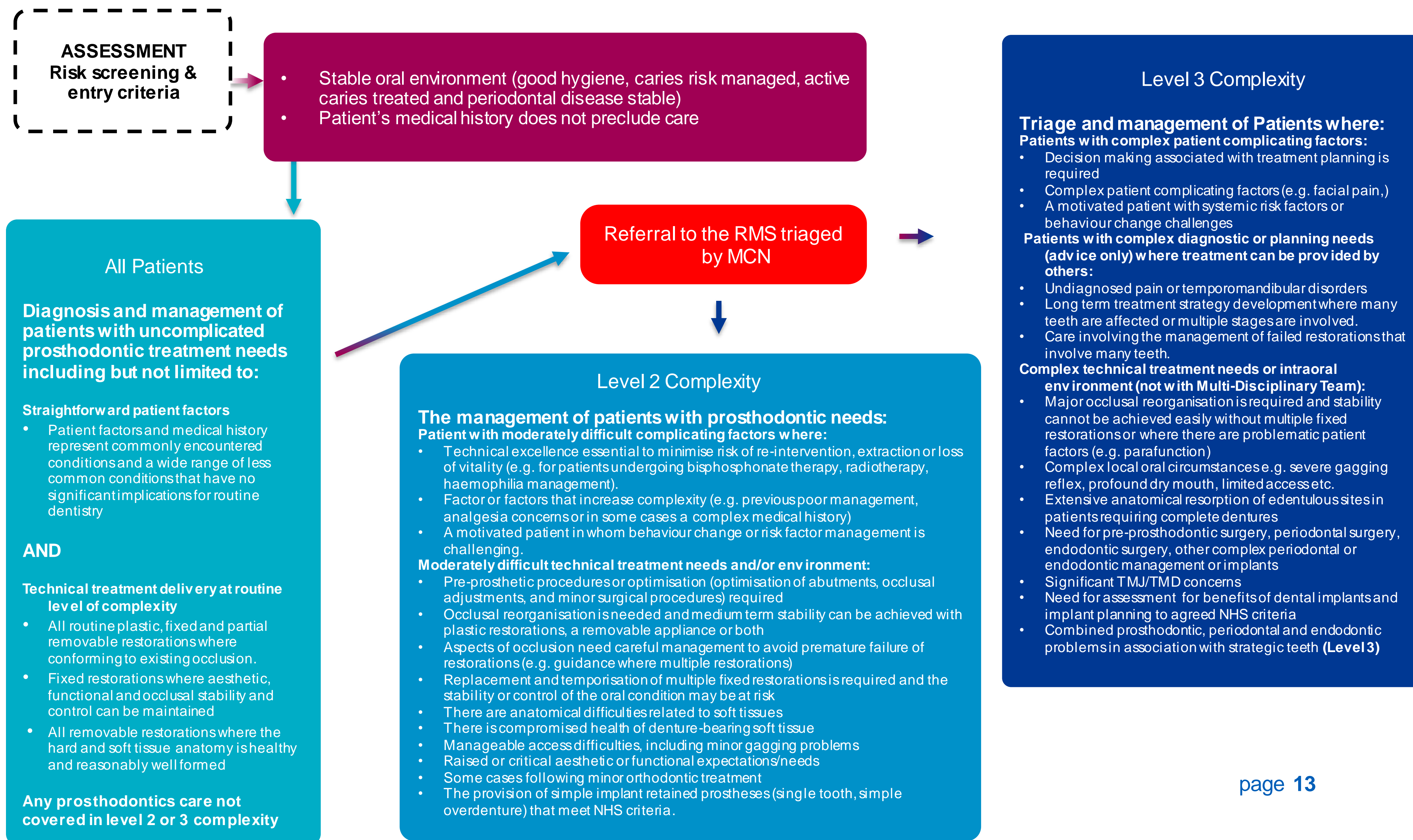
Triage & Management of patients:

- With Grade C or Stage IV periodontitis (bone loss > 1/3 root length) & true pocketing of 6mm or more
- Requiring periodontal surgery
- Furcation defects and other complex root morphologies not suitable for delegation
- With non-plaque induced periodontal diseases not suitable for delegation to a practitioner with enhanced skills.
- Peri-implantitis where it is the responsibility of the NHS to manage the disease when implants have been placed under an NHS Contract
- Patients who require multi-disciplinary specialist care (Level 3).
- Where patients of level 2 complexity do not respond to treatment
- Non-plaque induced periodontal diseases including periodontal manifestations of systemic diseases, to establish a differential diagnosis, joint care pathways with relevant medical colleagues & where necessary, manage conditions collaboratively with practitioners with enhanced skills if appropriate & provide advice and treatment planning to colleagues.

4.4 Complexity assessment: levels of endodontic care



4.5 Complexity assessment: levels of Prosthodontic care



5 Assessing need

5.1 Population

The need for restorative dentistry arises predominantly from diseases of the teeth and soft tissues and to a lesser extent from trauma and congenital conditions. Assessing clinical need for an individual patient is a basic part of a clinician's role but assessing the overall need for a population of patients is a challenge for commissioners. The need for complex treatments that are required may occur many years after the damage caused by these diseases.

The sort of work that can be easily provided in primary care can be predicted by epidemiological data. The Adult Dental Health Survey has detailed data on decay (caries) and periodontal (gum) disease. The presence of decayed lesions implies the need for simple restorations and periodontal disease at certain thresholds implies the need for periodontal care. There are good quality epidemiological data in these areas that underpin much of our understanding and some local modelling of the data may give some useful information.

The challenge for commissioners is that at the more complex end of the primary care spectrum through to specialist care there is little available that is helpful in determining the level and impact of service. There are a number of reasons for this and the context is complex. These include:

- The difference between need and demand which lies at the heart of the commissioning challenge. Many patients will express a strong demand for treatment from which they feel they will derive a benefit (functional, comfort, aesthetic) but which in a pure medical sense may not constitute "need"
- The nature of the NHS "offer" means that there is no clear guidance for patients, dentists or commissioners about reasonable expectations.
- The variation in interpretation of need in different clinical practices or units.
- The large private sector that many patients use electively for aspects of care (particularly where the treating clinician considers a procedure is not essential to ensure satisfactory oral health and function.
- The subjective judgement about what is clinically satisfactory and what is not.
- That whilst epidemiological data is very strong on describing disease, it is more difficult to capture, and outline treatment need and predictions for future service and workforce requirements.

The main diseases are as follows:

- Dental Caries (tooth decay) either as a new cavity in a tooth or as a recurring cavity beyond an existing restoration
- Tooth surface loss (Abrasion/Attrition/Erosion)
- Periodontal Disease (gum disease)
- Dental trauma
- Oral malignancy (cancer)

5.2 What can be done at local level?

The commissioning intention is that any dentist delivering restorative dentistry care on referral will have a formal link to consultant-led restorative dentistry MCN. The MCN footprint will depend on local referral patterns but should take account of the wider healthcare system including Sustainability and Transformation Partnerships (STPs) and emergent Integrated Care Systems (ICSs). This will enable planning of services and development of care pathways that take account of the patients' general health as well as oral health and vice versa.

It is expected that comprehensive primary dental care services will continue to be commissioned as they are now. However, there is scope for improvement in the commissioning expectations of primary dental care to improve quality and parity of outcome.

Using population needs assessment data to match capacity to need should be the starting point of any commissioning cycle. Commissioners will also need to understand the demand and the number of referrals being made that meet criteria for specialist treatment planning and/or delivery. Commissioners should be establishing referral management processes (if not already in place) to measure the quantity and quality of referrals and to understand demand and need for advanced restorative dentistry care. This should include the collection of a consistent and agreed data set across the local MCN and potentially with other MCNs in the same region or nationally.

Commissioners will need to work with local specialists and consultants to establish MCNs. The MCNs require embedding within local NHS England structures with clear accountability and reporting lines. The MCN outcomes and benefits require regular reporting to the LDN or system leaderships groups that exist. The MCN should receive anonymised data on need, referral patterns, and in time outcomes to support evidence informed clinical advice in to service redesign and future commissioning intentions and plans.

Before transformation of restorative dentistry care pathways can be implemented there is a need to build foundations which would allow a proper commissioning cycle to take place rather than just monitoring UDA delivery in existing contracts and capturing not just attendance at hospital but greater detail on procedures taking place. These foundations must include capturing the need of individual patients, agreeing a core data set for all referrals, agreeing criteria for specialist care and or planning, ensuring that comprehensive primary dental care is being delivered using robust need and outcome measures that can be peer reviewed and comparisons made.

Establishing an MCN to begin to design the systems and processes to make this happen locally is a requirement. In time MCNs could share and pool knowledge and these commissioning standards reviewed to include a national consensus on data sets and indicators that could be used to inform change. Other specialties have developed such need and outcome measures and restorative dentistry specialties would benefit from devoting some time to this.

MCNs could be the mechanism and networks to begin this process and support clinical decision making and development of need and outcome measures.

6 Assessing current service provision

At the same time as carrying out a needs assessment, commissioners need to understand their current service provision position, so that gaps, inequity and duplication can be identified. This will aid the prioritisation of resource which is important.

Appendix 3 contains a toolkit to aid identification of what is currently being provided, its value and quality. This toolkit may be useful for services provided in hospital and specialist units or for services that have been specifically commissioned to provide care at level 2 or 3 care complexities. It can be replicated for each provider.

Information available from NHS BSA for primary care may help commissioners to identify the amount of care that is delivered within primary care. The FP17 form completed by dentists on the completion

of a course of treatment collects information on endodontic treatment and crowns, bridges and dentures.

7 Local office approach to commissioning intentions

7.1 Understanding current provision

Section 6 of this guide outlines assessing need and current service provision. With the advice of the consultant in dental public health it should be possible to determine what services will be needed to address the needs of the population. The managed clinical network will also be able to significantly inform any considerations. Through this approach it may be that unmet need is identified, which will present challenges of investment and prioritisation to commissioners.

Within the contracting round dental commissioners need to ensure that they share their future commissioning intentions with providers, signalling their future service needs and therefore required service developments.

7.2 Investment planning

Dental commissioners need to understand current levels of expenditure and delivery across their health economy taking account of not only services on referral but also provision in primary care. This will help to inform the opportunity of responding to the heath need assessment and understanding the risk of resource management (workforce and financial) to meet patient need.

Having this level of understanding will help to inform any change programme which may involve both investment and potential disinvestment of some services according to identified priorities. It will also aid action planning for workforce development and service change and mobilisation.

7.3 Contracting Mechanisms

Commissioners should consider which contracting mechanism is most suited to the service being commissioned. Those available are:

- NHS Standard contracts
- Personal Dental Services Contract (PDS)

Where restorative dentistry treatment is being provided as part of continuing care of a patient this would be appropriately delivered under GDS.

Commissioning of level 2 or 3 specialist restorative dentistry care on referral from primary care providers requires contracting mechanisms other than the GDS contract.

7.4 Procurement - Regulatory Landscape

Procurement in the NHS is governed by 3 key pieces of legislation the provisions of which need to be taken into account when commissioners seek to secure appropriate services and let contracts:

- EU Public Contract Regulations 2015 (PCR 2015) – these are embodied in English law via statutory Instrument 2015 No. 102
- Public Services (Social Value) Act 2012

- National Health Service (Procurement, Patient Choice & Competition) Regulations (No 2) April 2013

EU Public Contract Regulations 2015 - There is a need in any procurement to satisfy EU Treaty obligations of; Transparency, Equal Treatment, Non-discrimination and Proportionality.

The thresholds under PCR 2015, over which contracts need to comply with the requirements of those regulations, are listed below and are updated every two years (last updated 1 January 2018). To calculate if the regulations apply the whole life contract spend should be taken into consideration:

Public supply and public services contracts (e.g. goods and services)	£181,302
Public works contracts and works concessions (e.g. building a new hospital wing)	£4,551,413
Light Touch Regime contracts for social and other specific services (e.g. healthcare services)	£615,278

Procedures under PCR 2015

The following are the procedures set out under PCR 2015 – commissioners may choose a procedure which best fits the procurement. For goods, services and works the procedure timescales are prescribed however the Light Touch Regime (LTR) offers some flexibility for healthcare services:

Open Procedure

This is a single stage process which is best used in a smaller market where provider numbers are relatively low. All providers whom express interest can submit a bid. The advantage of this procedure is that it is often the shortest route for standard procurements. The disadvantage is that it can become unmanageable in larger markets where a large number of bids can be received.

Restricted Procedure

This is a two-stage process which is best used in a larger market where a shortlist of capable providers needs to be achieved. The advantage is that it allows for initial shortlisting based upon capability and capacity. The disadvantages are that it can be more challenging where many providers meet the criteria and it is a longer process than the open procedure.

Competitive dialogue

Best used where a solution is unclear. The advantages of this procedure are that it can allow for innovative solutions and utilises the experience and expertise of the market. The disadvantage is that it can be a lengthy and complicated process

Negotiated Procedure/s

Can only be used in extreme circumstances as set out under section 32 of the PCR 2015 – e.g. no suitable tenders received, absence of competition for technical reasons, extreme urgency from unforeseeable events

Light Touch Regime

The LTR can be used for healthcare contracts and allows for some deviation from the standard procedures above it allows for a bespoke procedure to be designed to meet the needs of the procurement project so long as the treaty principles (listed above) are met. It would be wise to discuss and develop processes under this regime with the help of your CSU/Procurement Professionals and seek legal guidance if in doubt.

Where a provider believes these regulations have not been applied appropriately a dual regime exists for escalation.

The English Courts – where a legal challenge to the process can be presented within certain time limits or a Judicial Review may be sought for example where there are perceived issues n consultation and or equality;

NHS Improvement – who would consider matters and complaints brought in relation to Procurements and have an authority to request a course of action for correction

Public Services (Social Value) Act 2012 - The Contracting Authority must consider:

How the proposed service to be procured may improve the economic, social and environmental well-being of the area (area is the geographic area for which the procurement is taking place); and

How, in conducting the process of procurement, it might act with a view to securing the improvement.

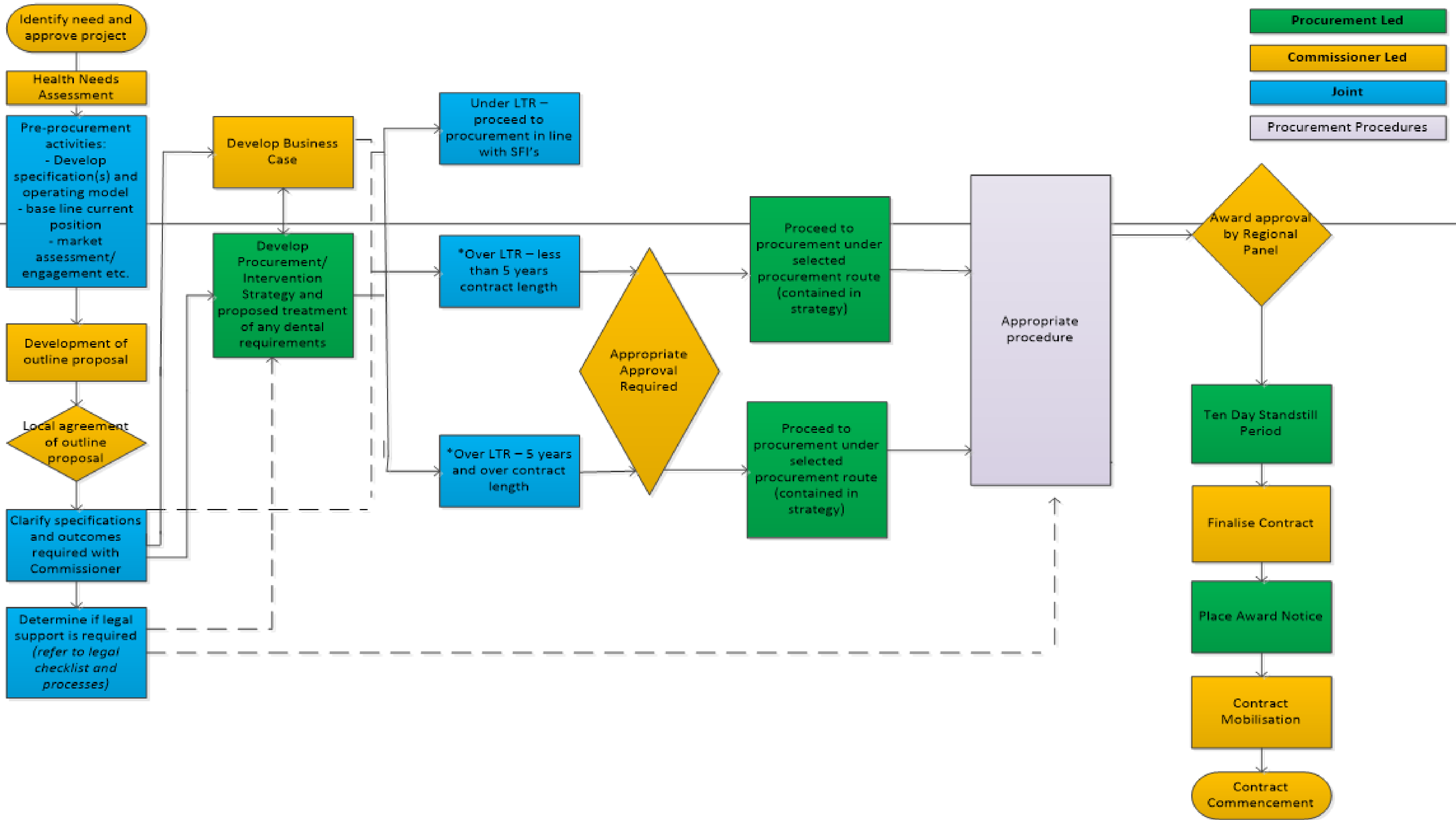
National Health Service (Procurement, Patient Choice & Competition) Regulations (No 2) April 2013 – Commissioners must ensure that services are delivered which:

Regulation 2 (a): securing the needs of the people who use the services;

Regulation 2 (b): improving the quality of the services;

Regulation 2 (c): improving efficiency in the provision of the services.

A typical Procurement process is depicted in the flow chart on the following page.


Procurement
NB - *local market requirements and assessments should determine an appropriate contract length which may be 7 + 3 or 5+ 5 etc.
Procurement Led
Commissioner Led
Joint
Procurement Procedures
Identify need and approve project
Health Needs Assessment
Pre-procurement activities:
- Develop specification(s) and operating model
- base line current position
- market assessment/ engagement etc.
Development of outline proposal
Local agreement of outline proposal
Clarify specifications and outcomes required with Commissioner
Determine if legal support is required (refer to legal checklist and processes)
Develop Business Case
Develop Procurement/ Intervention Strategy and proposed treatment of any dental requirements
Under LTR – proceed to procurement in line with SFI's
*Over LTR – less than 5 years contract length
*Over LTR – 5 years and over contract length
Appropriate Approval Required
Proceed to procurement under selected procurement route (contained in strategy)
Proceed to procurement under selected procurement route (contained in strategy)
Appropriate procedure
Award approval by Regional Panel
Ten Day Standstill Period
Finalise Contract
Place Award Notice
Contract Mobilisation
Contract Commencement

7.5 Sustainability

Commissioning considerations must recognise the potential for adverse impact of any service changes. Modelling new services prior to any change and market engagement should help to identify any potential adverse impact and aid the management of those risks.

Delivery models will need to consider the long-term viability of specialist units, should activity in these be varied. Specialist services by their nature may require investment in additional specialist equipment and service environment and therefore this should be taken account of in any planned changes.

Mobilisation of a new service is dependent on the availability of appropriate workforce. Training and development of the workforce can impose time constraints to any planned development. For example, the development of specialist primary care based endodontic services might require a number of years to fully mobilise if insufficient trained dentists are available or wish to take up the opportunities to deliver this care. Therefore, in such circumstance an incremental approach to change may be required.

8 Standards for delivery

Commissioners should ensure that all patients have access to an appropriate restorative dentistry service which as a minimum:

- provides optimum patient care based on local health needs
- provides a positive patient experience through increased access to the service and increase patient perceived quality of life following effective treatment
- provide cost effective practice

In addition, commissioners supported by the restorative dentistry MCN should ensure that primary care referrers:

- Make timely valid referrals which adhere to restorative dentistry referral guidance and include:
    - Consistent and accurate data set of referrer details
    - Consistent and accurate data set of patient demographics and contact details
    - Specific relevant medical history communicated

- Provide effective primary care advice and management with regard to plaque control, frequency and amount of sugar in diet and use of tobacco.

- Ensure that patients referred for treatments are suitable for advanced restorative dentistry care and can demonstrate commitment to behavioural change to reduce risk of decay, erosion or periodontal disease.

Commissioners will ensure that all providers delivering specialist or specialised care on referral will:

- Have access to appropriate premises and equipment such as radiographic facilities e.g. DPT, microscopes and any drugs and equipment for sedation made available as recommended by RD UK and the relevant specialist societies
- Ensure all providers are working through a managed clinical network and not working in isolation
- Ensure timely management of problems during treatment
- Ensure patients able to contact the specialist providers during surgery hours throughout the course of treatment and maintenance period
- Ensure inter-visit length i.e. length between appointments should be appropriate to meet optimal clinical standards
- Ensure valid consent for treatment is obtained throughout the course of treatment
- Ensure agreed PRoMs and PreMs are collected and reported
- Ensure that at the end of specialist treatment that the patient, the referring practitioner and specialist need to be aware of their responsibilities and who the patient has to contact if there is a problem.

Working with the chair of the MCN, commissioners will ensure that formal appraisal, peer review and outcome measures (e.g. audits) are in place for all clinicians through the consultant led managed clinical network for Restorative Dentistry.

Commissioners should work with patients and service providers to identify optimum service operating hours. This is likely to include that there should be an appropriate number of appointments available where the need is identified, outside of the normal working day. Commissioners and clinicians should also consider what out of hours arrangements might be needed for patients who are undergoing multiple appointment treatment.

The location of service provision should be as close to patient's populations as possible. Commissioner and the MCN working together should ensure that where practicable, services be redesigned to support this. This may mean services being provided through a hub and spoke type model or through examples of any of the schemes identified at appendix 5.

8.1 Performance Indicators

When establishing or commissioning services, commissioners should ensure that the reporting of appropriate performance indicators are included in every service specification including the frequency of reporting.

Below are those performance indicators that should be collected as standard so that benchmarking can be carried out across service providers:

- PREMs/PROMs as described in the introductory guide to commissioning dental specialties
- Waiting list information

    - Waiting times for initial appointment
    - Waiting times from assessment to treatment
- Numbers of failed attendances (FTA/DNA)
- Written care plans in place
- Details of treatment provided
- Serious Untoward Incidents (SUI) reported
- Planned and unplanned follow up appointments
- Plaudits and complaints
- Results of user and service audits and improvements

9 Workforce

There are eight categories of clinical practitioners who provide NHS restorative dentistry in the current system:

- Primary care dentists working under GDS contracts/PDS agreements will provide the vast majority of routine restorative care.
- Primary care dentists with validated enhanced skills providing some specific services, often around specific procedures as part of a single item or course of treatment. This is currently a very small proportion of provision.
- Dental Care Professionals (DCPs – hygienists, hygiene/therapists and clinical dental technicians) make a major contribution to primary care, including in more advanced and specialist services
- NHS consultants in various settings
- Specialists working under NHS contracts (who are few in number)
- Trained specialist dentists working under NHS consultant supervision
- Trainees who are already qualified dentists at various points in their careers, including those training to be specialists and consultants. Trainees make a significant contribution to the workforce treating level 3 (and level 2). Specialty trainees in restorative dentistry or mono-specialties funded by HEE or by the Universities that make a significant contribution to the specialty service. Complexity, but contribute only in larger institutions.
- Undergraduate and postgraduate students. They are an important part of the workforce in areas where there is a teaching hospital. They work under close supervision, often by specialists or consultants. Even at undergraduate level, exposure to cases that are beyond level 1 care complexity is an important part of training.

There is a large private sector in the mono-specialties particularly in London but also in other areas of the country.

In areas without such teaching institutions, particularly rural areas organisation can struggle with workforce recruitment and retention. This will impact patients who may currently need to travel to be treated appropriately at specialist level.

For some services, delivery of aspects of care at all levels is provided by hygienists, therapists and others. The scope for skill mix to make a cost-effective contribution

across restorative dentistry services is considerable, important and currently underutilised.

9.1 The role of the MCN in developing the workforce

9.1.1 Develop its education and training potential

The educational and training potential for managed clinical networks should be used to the full, through exchanges between those working in primary care including specialist practices and those working in dental hospitals or secondary care settings. Networks' potential to contribute to the development of clinicians with enhanced skills and experience concept should also be kept in mind, and networks should develop appropriate affiliations to universities, the Royal Colleges and HEE.

9.1.2 Have a CPD programme in place for all staff and ensure that staff are able to move within the network in ways to improve patient access and maintain professional skills

All networks must include arrangements for the effective delivery of training ensuring that those on specialist training pathways have sufficient experience and supervision with cases of clinical and patient complexity. The networks can also take an influential role in transforming undergraduate, post graduate, remedial and training for clinicians with enhanced skills and experience, so that training opportunities follow patients receiving care rather than patients following established training arrangements. This will need to be influenced, implemented and monitored locally in an environment which supports ambitions and innovation.

9.1.3 Explore the potential

There must be evidence that networks allow professionals to come together to explore the potential to generate better value for money, service improvement and more interesting career opportunities for clinicians.

10 Establishing a Managed Clinical Network

Commissioners must familiarise themselves with the National NHS England current core MCN job description and MCN terms of reference and liaise with the local dental network (LDN) to establish one

The MCN is a managed network established to link clinicians providing care on referral to improve communication and care of patients. The full role of the MCN is set out in the introductory guide.

MCNs will also link with LPN colleagues to ensure that the clinical voice of primary care is heard, and that primary care is linked to specialist care providers giving a connection across historic boundaries to improve patient care. The group will interact with and be governed within the commissioning system and all providers of care on referral will require a formal link at least to submit and receive data but more importantly to contribute to the improving quality and service delivery agenda.

10.1 Who will make sure the MCN is doing its job and hold it to account?

Ultimately, the commissioners will be responsible for establishing the MCN and will be responsible for ensuring that it does what it is supposed to do, and that it has what it needs. The MCN will provide reports to the LPN or dental system leadership team. Commissioners and MCNs will together ensure that the correct level of competence, quality (including equipment) and outcomes are being achieved for patients, regardless of the setting.

There will need to be fair access to all aspects of specialist restorative dentistry care and as is the case now, patient choice and awareness of all options available to them will be key features of the service.

10.2 Improving referral pathways for MCN effectiveness and improved patient care

There should be a robust referral management process that recognises the needs of the patient, the referring practitioner and the accepting dentist/specialist. The Commissioners will also have requirements to ensure that referrals are appropriate and that the care is being provided by those contracted to deliver that care.

A move towards an electronic referral management system (RMS) is advised with a minimum core data set and patients having a unique reference number (i.e. NHS Number) to track referrals and allow accurate data collection. This will help commissioners understand the complexities of referred cases to support needs assessment.

The referral should be made within 1 week of a decision to refer a patient and these should be triaged, and a decision made.

At the point of making the decision to refer, the patient needs to know why they are being referred and what is likely to happen at the first appointment. The referral ideally needs to be as local as possible to the patient, however patient choice should be considered. The patient needs to know how long they may have to wait for an appointment following referral, how they will be contacted and how they can change any given appointment. If possible, patients should be given a choice of specialist provider, however this may not always be possible particularly in the shorter term. The benefits and risks of treatment together with information on the time needed and the number of appointments.

An RMS should assist the referring practitioner to know who to refer to and how. The system should also have clear acceptance criteria. The RMS needs to acknowledge receipt of the referral and the referrer ideally needs to be informed of the patient's appointment. Once the patient has been assessed should this just be for advice and

support then there needs to be prompt reply / treatment plan to the referrer with a clear treatment pathway for the patient.

The receiving practitioner/specialist needs clear and concise referral data that meets the agreed acceptance criteria and contains all the information required. Standardised pro-formas will assist in this. There needs to be a means of safe transmission of all relevant information, including x-rays.

The referral data needs to be auditable and available to the MCN. This will help to improve the referral process, to better understand the needs of the patient base and will help commissioners plan for future service delivery.

Appendix 4 contains greater details on how any informatics system can assist everyone in the MCN to communicate better and improve patient referral processes.

10.3 Supporting the profession

The MCN can provide an effective role in being able to support those professionals undertaking care. There may be some tell-tale signs that practitioners are experiencing problems or difficulties through the referrals that are being received. An above average number of referrals or a continued number of referrals not meeting acceptance criteria could be such triggers. A complete absence of any referrals from a practice may also be a trigger. The MCN along with commissioners and HEE consider how they can best support these individuals and how services might offer opportunities to ensure continued sustainability of care to patients.

11 Standards

All providers treating patients on referral must be compliant with the prevailing policy, general legislation and guidance.

11.1 General legislation and guidance

General legislation and guidance will cover elements such as:

- Health Technical Memorandum 01-05: Decontamination in primary care dental practices
- Ionising Radiation (Medical Exposure) Regulations (IRMER),
- HIV-infected health care workers: Guidance on management and patient notification
- Equality Act
- Dental Practitioners' Formulary
- GDC Scope of Practice guidance
- GDC Fitness to Practice advice
- GDC Standards for the Dental Team guidance
- General Data Protection Regulations

- Compliance with Health and Safety at Work etc. Act,
- Compliance with Employers' Liability (Compulsory Insurance) Act,
- Compliance with Electrical safety at work regulations
- Compliance with safety requirements for autoclaves
- Compliance with Control of Substances Hazardous to Health (COSHH)
- Compliance with Reporting of Injuries, Diseases and Dangerous Occurrences Regulations
- Compliance with Water Supply (Water Fittings) Regulations, 1999
- Disability access requirements
- CQC registration

In addition, it will be necessary for commissioners to ensure that those practices in primary care are also able to demonstrate that they have policies and or procedures to cover the following areas:

- Risk management policy
- Business continuity plan
- Whistle blowing policy
- Confidentiality
- Complaints
- Booking system
- Staffing
- Staff indemnity insurance
- Staff appraisal
- Staff personal development plans

Commissioners can ask providers/performers to complete the self-certification checklist provided in appendix 3.

11.2 Information Governance

During the commissioning process it is important to have in mind whether the service being commissioned is a continuation of existing services with slight variations to contracted services, or whether the service being commissioned makes significant changes to the patient pathway. If significant or wholesale changes are envisioned in the planning stages, it will be beneficial to carry out a Privacy Impact Assessment (PIA, found in the 'New Processes Procedure') in conjunction with your local Information Governance representative. This process will help highlight any Information Governance risks associated with the service being commissioned and these risks can be addressed appropriately at an early stage. You can find the PIA procedure and documents here.

The NHS Standard contract states that the provider must complete and publish an annual information governance assessment and must demonstrate satisfactory compliance as defined in the NHS Information Governance Toolkit (or any successor framework), as applicable to the Services and the Provider's organisation type.

The Information Governance (IG) toolkit has been replaced with the Data Security and Protection Toolkit (DSPT). All organisations that process health and care data are still required to complete the DSPT and to provide evidence for this through an annual submission. The equivalent of 'Satisfactory' compliance in the previous IG toolkit is the publication of the 'Standards Met' level in the DSPT.

(Please note –organisations not reaching 'Standards Met' in the DSPT can still tender for a service. In particular, allowances have been made for smaller organisations, including social care providers, as it is understood that for many this will be a new process. So, a new 'Entry level' has been made available as an acceptable stepping stone to eventually achieving the 'Standards met' level. It is recognised that each contract will have a local context of proportionality in terms of an organisations data security and protection maturity. Please contact your local IG representative for further information).

There must be a legal basis for NHS England and commissioning organisations to receive any flows of data directly or indirectly from service providers that contain identifiable personal, and or sensitive information. Although data sets within Dentistry received by commissioners are usually anonymised, if a new programme or situation arises where there is any need for non-anonymised data please refer to the ICO's data sharing code of practice.

Accurate and comprehensive record keeping is essential in order to deliver the best patient care possible. Dental records should be managed and retained in accordance with the NHS Records Management Code of Practice. The current version can be found here.

In terms of records retention, this best practice guidance notes that:

- dental records for children must be kept until their 25th birthday (or if the patient was 17 at the conclusion of the treatment, until their 26th birthday)

- dental records for adults must be kept for 10 years after the patient has de-registered or 10 years after the last treatment date

When a dental office closes, arrangements must be made for the records to be stored securely, in accordance with the Code of Practice referenced above. Failure to protect patient records may result in a breach of the Data Protection Act 2018 and the EU's General Data Protection Regulation and could potentially lead to a fine from the Information Commissioner's Office.

12 Acknowledgments

NHS England would like to thank all those who contributed to the development of this document and in particular to the late Professor Jimmy Steele, chair of the early restorative dentistry guide working group.

In addition, many thanks go to those public and patient representatives who attended the various engagement events that were held to seek their views with regard to future commissioning and provision of NHS dental services.

13 Appendix 1

13.1 Periodontal care

Periodontal therapy is concerned with the management of disease affecting tooth supporting structures, in layman's terms it is about the management of gum disease. There are general health conditions that affect the periodontal ("gum") tissues, and which require specialist care, but these are rare. The majority of periodontal disease is induced by the accumulation of dental plaque in susceptible patients (plaque bacteria interacts with the body's immune system) and is termed "periodontitis". Teeth can become loose or be lost, the gums can recede or there may be halitosis or discomfort, so periodontitis impacts on patients in many ways compromising nutrition, speech, social confidence, self-esteem and quality of life. It is also abundant; the World Health Organisation (WHO) sponsored "Global Burden of Disease 2010 Study" analysis demonstrates that periodontitis is the most prevalent inflammatory disease of humans.

Motivated patients who change behaviour (improved oral hygiene and/or stopping smoking) can benefit from treatment, experiencing a low risk of progression and an improvement in quality of life. Following treatment, continued daily effort by the patient and supportive therapy is a lifelong requirement due to the chronic nature of the condition. Successful management leads to tooth retention. Periodontitis also has systemic consequences and is an independent risk factor for several chronic systemic diseases most notably type 2 diabetes[2].

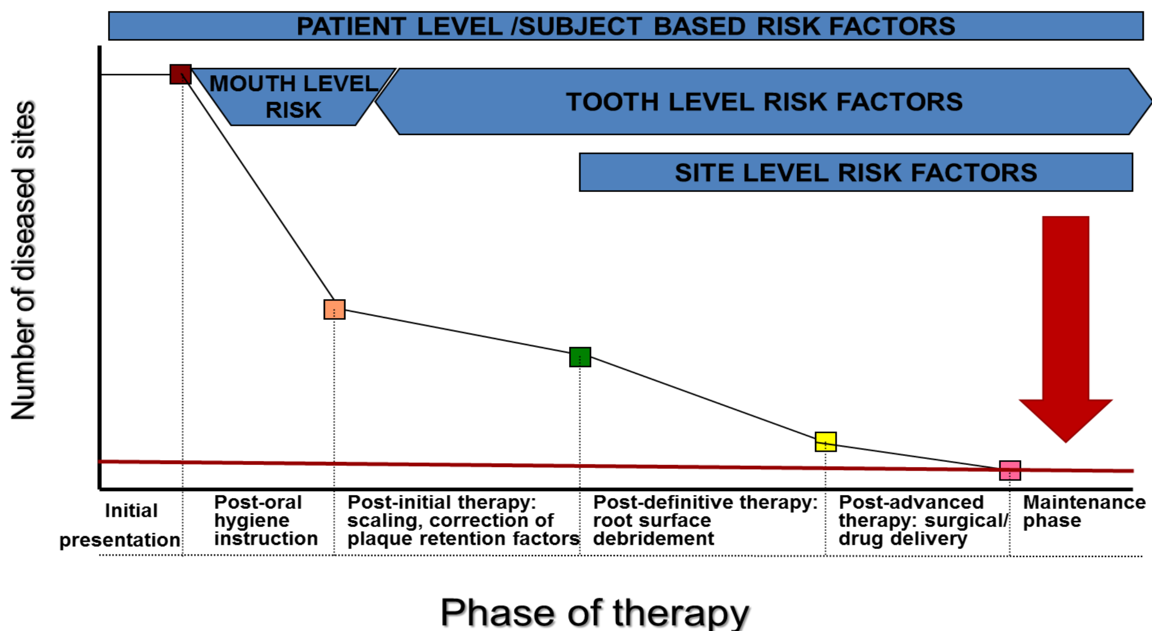
[2] Simpson, T.C. et al., 2015. Treatment of periodontal disease for glycaemic control in people with diabetes mellitus. *Cochrane Database of Systematic Reviews*, (11).

Heredity is a major risk factor we can do nothing about, however the other risk factors are modifiable and include poor oral hygiene, smoking and poor glycaemic control in diabetes. Periodontal health is also vital before any other advanced or specialist restorative dentistry is considered.

The disease is not complex to treat if diagnosed early and all mild and some moderate disease in patients with no medical or behavioural complications can and should be managed in primary care. Successful outcomes depend on the education and motivation of patients towards behaviour change. Successfully motivating patients to change can be a difficult and time-consuming process that many practitioners perceive the existing dental contract has not encouraged. Responsibility for periodontal care can be delegated to dental hygienists but sometimes this delegation is not prescribed and reviewed and so is effectively abdication of responsibility. Patients often receive treatment from a dental hygienist on a private, rather than NHS basis.

Efficient use of specialist periodontal resource will require effective responsive primary dental care. Figure 1 is a schematic representation of the relative importance of the stages of periodontal care, illustrating the importance of self-performed oral hygiene following professional instruction.

Efficacy of different stages of therapy & associated multi-level risk assessment



[3]

Patients with significant disease who have good self-care but are not responding to therapy or who have complicating factors (e.g. uncontrolled diabetes) are best

[3] Schematic representation of relative efficacies of different stages of periodontal care, and associated levels of risk assessment. *Adapted with permission from Chapple & Gilbert "Understanding Periodontal Diseases: Assessment and Diagnostic Procedures in Practice. Quintessence Publishing Co Ltd. IBSN: 1-85097-053-X pp54.*

managed by dentists with enhanced training, skills and competency but only after initial management in primary care. Many primary dental care practitioners already provide periodontal care for patients with more complex needs.

Patients with the most severe or complicated disease require management of care by a specialist periodontologist or consultant. Again, patients should usually have initial preventive advice, risk factor management and routine periodontal therapy, prior to referral.

Complex integrated care requiring cross-specialty planning, should be seen by consultants in Restorative Dentistry. Similarly, there are a range of medical conditions (e.g. autoimmune conditions, various syndromes) with associated periodontal problems where joint medical and dental management is required.

There is a need to recognise that some patients are best served by "periodontal palliative care" programs where patient engagement is incompatible with achieving optimal periodontal health. Defining patient engagement and palliative care are challenging decisions and the current view in this area is defined in 22.1. This is the closest guidance we can provide at present and will likely change with time.

13.1.1 Defining patient engagement

The standards of plaque control (daily oral hygiene) necessary to attain and maintain periodontal health and stability for those with periodontitis, vary according to individual patient risk/susceptibility. These are demanding standards in terms of daily time commitment for many patients to achieve, given the other demands on their time. Furthermore, social and cultural influences may act as barriers to effective behaviour change. Consequently, behaviour change interventions to achieve such outcomes can be difficult in some patients and may be beyond primary care dentistry. Similarly, certain systemic risk factors like glycaemic control in diabetes and smoking cessation can be challenging for patients to achieve and may not be fully under their control at one point in time. However, the fact is that patients who fail to achieve these lifestyle changes will experience poorer periodontal outcomes and are more likely to lose teeth. It is important to differentiate between patients that may not have had the benefit of behaviour change interventions appropriate to their needs and those who do not desire to make change and work towards health. This is one of the greatest challenges and it should be recognised that patient engagement can be dynamic and change with time. Whilst optimal treatment outcomes (periodontal stability long term) may not be achievable for all patients, teeth can be retained for longer with regular professional scaling and reinforcement of oral hygiene guidance. These two aspects of care do not require specialist skills and should be provided in primary care. The door should always be kept open to referral, should patients change their health preferences. However, there is a need to develop models for defining "behaviour change" as a modifying factor, that demonstrate to the MCN a commitment has been made by both primary care practitioners and the patient, but despite that 2-way commitment, achieving behaviour change requires training beyond primary care. This may for example involve a signed periodontal health contract between the primary care provider and the patient, documenting the responsibilities of each. Such a contract could be sent with the referral letter as evidence that behaviour change is a genuine modifying factor that justifies care

beyond primary care. It could be accompanied by evidence such as confirmation that a patient attended a stop smoking service.

The key to defining patient engagement in the primary care setting should reflect the change in plaque score rather than a specific threshold and therefore the thresholds below are “indicative”, and the focus should be the change achieved by the stage of referral. The figure of a 50% improvement may need to be modified in the light of experience gained from the implementation of such a system, to ensure secondary care will be a worthwhile investment for all stakeholders engaged in the patient’s care

The plaque score should be performed on “Ramfjord’s teeth” (16, 12, 24, 36, 32, 44) at six sites per tooth (mesio-buccal, mid-buccal, mesio-buccal, mesio-lingual, mid-lingual, disto-lingual) using a periodontal probe. A +ve score is recorded where a continuous line of plaque is evident on a surface as detected by probing without disclosing.

<u>Non-Engaging Patient</u>:
Unfavourable response to self-care advice & insufficient improvement in oral hygiene as indicated by less than a 50% improvement in plaque and marginal bleeding scores, OR:

- Indicative Plaque Levels >20%,
- Indicative Bleeding Levels >30%
- OR a stated preference to palliative approach (below):

<u>Engaging Patient</u>:
Favourable response to self-care advice and sufficient improvement in oral hygiene as indicated a 50% or greater improvement in plaque and marginal bleeding scores, OR:

- Indicative Plaque Levels <20%,
- Indicative Bleeding Levels <30%
- AND a stated preference to achieving periodontal health

Non-engaging patients should be reviewed in accordance with national guidelines for simple supportive care, including re-motivation towards local and systemic risk factor correction and for calculus removal. If they start to engage, but clinical outcomes do not improve, then referral may then become indicated.

For patients with medical or physical complications to achieving optimal risk factor control, then referral may be indicated earlier (see Levels of care flow chart)

13.1.2 Palliative Periodontal care

Palliative periodontal care (PPC) refers to a simple and cost-effective maintenance protocol that involves regular removal of calculus and re-motivation of patients. Such brief intervention protocols may be performed by DCPs and have been shown to improve the length of tooth retention; however, they are far less effective than a full treatment protocol involving root surface debridement with adjunctive pharmacological or surgical care as necessary. This is a pragmatic approach but one that involves long-term re-evaluation and support thereby allowing patients to change

from a non-engaging to an engaging patient at some point in the future. Advanced restorative care is normally inappropriate in a non-engaging patient.

It is important that patients are fully briefed on what PPC means, as some experience this as a "wake up call" and such a conversation may act as a key driver of behaviour change, whilst others are happy to accept the most likely outcome as a delay in tooth loss rather than preventing tooth loss longer term. The decision to adopt a PPC approach should be made by practitioners after demonstrable and documented attempts to achieve behaviour change, following which it is clear that no progress is being made. Non-engaging patients should not be referred until they demonstrate "engagement", unless it can be demonstrated that behaviour change represents a genuine modifying factor. It is vitally important that a non-judgemental approach is adopted for non-engaging patients during this process. The nature of the counselling should be factual and accepting that the challenge faced by some patients is substantial, indeed greater than the effort required by the dentist or hygienist themselves in order to maintain their own periodontal health. It is therefore acceptable if some patients cannot achieve the necessary standards of oral hygiene that equate to periodontal stability in their mouths, however they still require a supportive management approach, and they need to understand that advanced restorative care may be inappropriate.

The diagram below shows the complexity levels by stage & grade of periodontitis using British Society of Periodontology Implementation of the 2017 Classification of Periodontal Diseases & Conditions. [1] These stages and grades have been mapped to demonstrate the complexity level at which treatment should be managed.

		Stage			
		I	II	III	IV
Grade	A	Level 1	Level 1	Level 2	Level 3
	B	Level 1	Level 2	Level 2	Level 3
	C	Level 2	Level 3	Level 3	Level 3

[1] Dietrich, Ower P, Tank M, West N, Walter C, Needleman I, Hughes FJ, Wadia R, Milward MR, Hodge P, Chapple ILC. Periodontal diagnosis in the context of the 2017 classification system of periodontal diseases and conditions – Implementation in Clinical Practice. BDJ, 2019: (in press)

13.2 Endodontic care

Endodontic treatment is, in layman's terms, "root treatment". It can be technically demanding and is directed towards the prevention or treatment of apical periodontitis (in its most obvious form this is a dental "abscess"), which is caused by infection inside the tooth and if left untreated would lead to tooth loss. Typically, the infection in the tooth arises from decay or dental treatment to manage decay but endodontic problems can arise many years after the initial problem. A significant proportion of cases on anterior teeth also result from trauma, particularly in children and young adults. Endodontic procedures are designed to maintain the root and the remaining tooth

tissue. This is usually carried out by root canal treatment, occasionally in combination with surgical endodontics.

The successful outcome of endodontic treatment requires thorough disinfection of the root canals followed by the precise placement of a well compacted root filling to within 2 mm of the apex of the tooth, and a well- sealed definitive restoration to prevent further infection or fracture. It is a complex technical process.

Specialist endodontic care is required for the most complex of tooth anatomy and complicated retreatments as well as some surgery. Specialists and consultants also have an important role in assessing the suitability of a tooth for complex intervention and managing scarce resources to best clinical effect.

13.3 Prosthodontic care

The majority of prosthodontic procedures are provided by primary dental care practitioners whilst some aspects of this care can also be provided by other appropriately trained and skilled dental care professionals (clinical dental technicians and therapists). This type of treatment accounts for a significant proportion of the overall volume of all dentistry delivered to patients in England.

The clinical “mono-specialty” of Prosthodontics includes diagnosis, treatment planning, and provision of clinical treatment across a broad range of care (crowns, bridges and dentures) as well as providing and maintaining restorations retained by implants. The complexity in this area of work relates both to the highly technical considerations of tooth preparation and fabrication as well as to the planning of restorations where there are several different prostheses required or where, for example the bite needs to be altered. Prosthodontics generally requires the involvement of a dental laboratory to make the prostheses outside the mouth or to set up models for planning.

More complex prosthodontics relates to cases where the technical delivery requires specific additional skills and experience. Failed restorations are costly and damaging so delivering such treatment to a high technical standard is best provided by dental practitioners with enhanced experience, competency and additional skills. However, there is a range of different skill sets involved across the discipline. The provision of more complex complete dentures requires a set of skills and experience that is quite different from those required for complex crown and bridgework, though there are overlaps. To provide this case complexity in prosthodontics does not necessarily require the dentist to have all these skill sets. The dentist who provides difficult complete dentures cases may not have to be skilled in complex crown and bridgework; this needs to be managed by the provider of advanced care.

Particularly complex prosthodontics requires the full suite of skills and experience usually provided or overseen by a specialist Prosthodontist or consultant in Restorative Dentistry. Maxillo-Facial Prosthodontics (reconstruction after surgery) is usually provided by consultants in Restorative Dentistry (or specialists working under their supervision) who work within multi-disciplinary / professional teams. Such care is generally delivered within a hospital setting.

In addition to treatment provision, specialists and consultants in Prosthodontics (and the wider specialty of Restorative Dentistry, see below) are often required to provide

advice, treatment plans and second opinions regarding treatment for patients who can then be treated in primary care. This occurs where the delivery is relatively straightforward, but the planning is very complex

14 Appendix 2 Service analysis toolkit

Restorative Dentistry: Provider Number details		
Name:	Contract type: PDS NHS Standard contract	Service specification available? Y/N
Main contact address:	Contract value:	What other services does the provider deliver as well as restorative Dentistry?
	Contract currency (UDAs unique patients etc) and numbers	
Locations from where services are provided:		
Location 1	Number of surgeries	Facilities/Treatment modalities available:
Location 2	Number of surgeries	Facilities/Treatment modalities available:
Acceptance and waiting time information		
What are the patient acceptance criteria? (Including treatment planning advice only)	What are the waiting times for treatment for:	What are the discharge criteria?
	Routine care: Day care: Admitted care: Urgent care:	What is the referral pathway?
Number of patients on waiting lists for: Assessment Treatment Recall		Number of referrals per month (average) Number of patients added to list per month (average)
Staffing information		
Number of qualified dentists:	Number of dentists of the specialist list:	Number of consultants:
Number of dental therapists:	Number of dental hygienists:	Number of dental nurses:

Numbers of specialist trainees etc that contribute to care on the specialist pathway	Number of postgraduate trainees that contribute to care on the pathway	
Operational Information		
Opening hours	What are the arrangements for urgent/unscheduled care?	What are the arrangements for public holidays?
Quality Information		
Are CQC inspection reports available? Y/N	Does the contract include quality KPIs? Y/N	Are patient experience measures collected? Y/N
	If yes what are these?	If yes what are these?
	Is there a managed clinical network for restorative Dentistry? Y/N Name of chair:	Do all staff have a formal link to the MCN (if available) Y/N

15 Appendix 4 Informatics requirements for a MCN

A Managed Clinical Network requires a secure, reliable, fully functional and easy to use, two-way communication system for the rapid transfer of patient information across existing organisational boundaries. The system must be able to assist all four groups involved in patient care:

- General Dental Practitioners
- Consultants and specialists in teaching hospitals and within Managed Clinical Networks
- Patients
- Commissioners.

Such a system will put practitioners and consultants in closer contact. By doing so, it will improve the quality, efficiency and safety of patient care.

The system will primarily enable clinical information sharing about patients and services, on local, regional and national scales. It will allow information sharing about availability of hospital services, waiting times, referral guidelines and a university hospital's need for patients for teaching and training. It will give patients access to their referral process. The data collected will be used to inform commissioners of referral

patterns, clinical needs and referral management performances. The system will be fully adapted to respond to local needs and preferences, for use within both practice and hospital settings, alongside modern digital systems as well as traditional systems, to facilitate referral, clinical advice and discharge processes.

The system will also allow users to provide information related to their experience of the clinical services they receive and of using the system.

The system will be developed and managed from within the NHS, to ensure the financial resources required to support the system remain focussed on and dedicated to developing high quality NHS patient care.

What is needed to utilise an MCN informatics system?

Practitioner: Access to the Internet. Ideally a practice Electronic Patient Record, scanner, digital radiography.

Hospital / Consultant / Specialist / MCN: Internet access, list of each staff member, rota for triage, internal system to take information from the system for accepted referrals and to deliver information back to the system, both admin (appointments, availability of services, local information) and clinical (discharge information, shared clinical information)

Patient: An e-mail address, access to the internet and an invitation from their practitioner.
Commissioner: a list of practices, practitioners and consultant / specialists within the region and within each MCN. Provide access for users within the local commissioning group.

Practitioners will

1. Use the Advice function: a question is responded to by a consultant, in an advisory capacity. The method leads to an improvement in patient care that can be delivered by the practitioner and an improvement in the quality and some control of the quantity of referrals made from practitioners.
2. Make a formal referral to specialist services: this is a modern and efficient version of the traditional referral method.

The system will be adaptable to allow practitioners to choose to:

- Refer within a Managed Clinical Network
- Refer to an individual clinician
- Refer to a department
- Refer either to a selected group of or to all departments of that speciality, within a geographical region.
- Share radiographs, images, documents and other information with consultants.

Consultants will

1. Use the system within a Managed Clinical Network
2. Be involved in the referral process by
   - Working within a response and triage rota, as part of their local team
   - Responding to requests for Advice and to Referrals
3. Respond to referrals: Accept, Return, Request more information or Redirect to a colleague.
4. Correspond with practitioners after a consultation appointment and throughout a treatment process.
5. Share radiographs, images, documents and other information with practitioners.

Hospitals will

1. Accurately monitor and control the referral and discharge periods
2. Improve quality of care and service efficiency and remove reliance on paper correspondence.

Patients will

1. Choose their preferred centre for provision of specialist care.
2. Choose to receive information electronically, paper-based or in both ways.
3. Receive information about their appointment time / day.
4. Search for information about the service and consultant they are referred to.
5. Receive a copy of formal correspondence sent to and from their GDP referrer.
6. Receive information about their condition, pre-operative information to assist in consent processes and post-operative instructions.
7. Receive requests for user experience surveys.

Commissioners will

1. Receive information about referral trends and rates, at a regional, speciality, department, practice and individual level.
2. Receive information about referral response rates and waiting times.
3. Receive information about user – experience of the service.

16 Appendix 5 Examples of Innovation

Greater Manchester Periodontal Care

Brief overview of scheme The Healthy Gums DO Matter project was developed to improve the standards and quality of periodontal care provided in NHS general practice. A sub-group of the Greater Manchester Local Dental Network (GM LDN) has developed a primary care led "Practitioner's Toolkit" which encompasses a preventive "care pathway" approach for the holistic management of periodontal disease in NHS general dental practice. The toolkit is being piloted in GM across ten dental practices and data collected on clinical outcomes and treatment need. The LDN is also working with the commissioning team to try and assess the periodontal need in GM and to develop an appropriate managed clinical network to oversee referrals into secondary care for patients of level 2 and three complexities.
`Benefits to patients • Personalised preventive care at a primary care level for patients with a lifelong disease with the aim of retaining teeth for life, an outcome associated with multiple wellness benefits. • Improving rates of appropriate specialist referrals, enhancing the use of limited specialist resource in GM and demonstrating better patient outcomes. • Patients get information on their "periodontal contract" with more time allocated to patient self-care, the most cost-effective way to stabilise periodontal disease • Toolkit includes patient agreements and consent forms to inform patients about their condition as well as the support, education and prevention they can expect from the dental team. The resource also highlights the link with diabetes.
Lessons Learned • Supporting and nurturing clinical leadership is essential to service redesign and improving the effectiveness of care • Clinicians value the division of responsibility for home care and clinical care and the medico-legal protection offered by clearly recording advice and diagnoses. • Clinical scores used to communicate oral hygiene for patient engagement highlighted the importance of structural and social determinants of health, and the impact of improving periodontal health on conditions like diabetes.

Local Managed Clinical Network in Endodontics as based in South West London since 2010

Brief overview of scheme The scheme aimed to increase treatment capacity for patients referred by their dentists for endodontic therapy in South West London. It aimed to utilise primary care expertise and infrastructure and to better 'police' inappropriate referrals. Two dentists with enhanced skills were trained to provide level 2 work. As part of this work, inappropriate referrals for routine treatment were returned to the referrer and appropriate referrals clinically assessed as a new patient in secondary care.

Benefits to patients • Timely assessment of patient by hospital specialist within nationally agreed time frame • Formal triage and advice offered on both the endodontic and restorative implication of treatment needs. • Secondary care assessment allows for broad assessment of the 'bigger clinical dental picture,' balancing the implications of other dental problems and treatment needs the patient may require and how these fit with the request for endodontic treatment. • Patient has a clear understanding of who will undertake the endodontic treatment (Specialist /DwES /GDP) and who will provide post-endodontic restorative treatment • Patient has a clear understanding that the network is provided under the NHS and that the UDA model applies in both primary care environments (DwES & GDP)
Lessons Learned • The need to include a core 'build-up' fee for difficult level 2 teeth for the enhanced practitioners • DwES practitioners have been used successfully to teach and train DFs, DCTs and GDPs • Close connection of the Consultant Specialist with both the enhanced practitioner and referring practitioner, leading to high-quality communication between all members of the team and making 'shared care' patient flow arrangements very straightforward.

Dental Restorative pathway – Thames Valley

Brief overview of scheme The dental Restorative Pathway is for treatments that fall outside the expertise of primary care but do not require referral to hospital. The pathway is underpinned by policy statements confirming eligibility for funding of Endodontic, Prosthodontic and Periodontal treatment and by a consultant-led triage and treatment planning service. The triage and treatment planning service ensure compliance with the policy statements and the writing of treatment plans to deliver treatment in line with patient needs. The triage service also provides an advisory service to GDPs to support delivery of Restorative treatments in primary care. Treatments are delivered by Any Qualified Providers and Dentists with Special Interest in Endodontics across the Thames Valley.
Benefits to patients • Access to more complex Restorative treatments on the NHS • Local access to these services • Allows for teeth to be restored rather than extracted
Lesson Learned • There should be similar levels of capacity in each county

- The pathway needs to be integrated with secondary care to ensure consultant input to treatment as appropriate and also to ensure referrals are made locally rather than to out of area teaching hospitals
- The pathway should be integrated with Oral Surgery as a single Advanced Mandatory pathway to allow ease of process for referrers and to allow joint working between Restorative and Oral Surgery Specialists
- The pathway should be underpinned by modern referral arrangements, which also provide advice on criteria as referrals are submitted
- GDPs should be able to seek feedback and advice to support delivery of treatment in primary care
- The pathway should provide feedback about use of the services by GDPs to highlight any training or development needs

Local Managed Clinical Network in Endodontics and Periodontics in Bradford and Airedale

Brief overview of scheme

In 2010 Bradford and Airedale and the LDC commissioned a survey of local GDPs on the perceived need and availability of restorative dentistry. The results identified a significant gap between what was available versus what was required. As a result, commissioners and clinicians set up a local commissioning group to design a specification for the referral of patients requiring advanced periodontal and endodontic care.

A rolling audit is in place to monitor treatment outcome, quality and patient experience. Quarterly meetings take place between members of the network, and an annual appraisal system is in place. The service has been operational since June 2011.

Benefits to patients

- Access to advanced restorative care locally, where no service had existed previously
- Waiting times that fall well within national guidelines
- Quality of treatment and outcomes have been demonstrated to be extremely high and reduced the need for repeated costly treatment interventions or the loss of teeth

Lessons Learned

- Buy-in by those referring into the scheme key to early success, achieved in part by two mandatory learning events, held at service initiation.
- Practices had to sign a ‘code of conduct’ stating that they understood the parameters of the service and would endeavour to refer within the specification, resulting in initial low rates of ‘inappropriate’ referrals.

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Endodontic Service in South Cumbria

Brief overview of scheme

The strategy was set up in Cumbria to improve access through establishing new services "closer to home". Local discussions with the profession identified that there were no NHS services for endodontics above level 1 complexity. Patients needed to be referred to Manchester or Liverpool where there were NHS endodontic services in Dental Hospitals. The only other option was to refer to non-NHS private providers.

After an initial pilot, a Dentist with Special Interests (DwSI) in endodontics was established. Guidelines for referral to the new service were agreed using the AEE guidelines for level 2 and the DwSI guide. Initially, all referrals were sent via the Consultant in Restorative Dentistry to ensure treatment of appropriate cases and the monitoring of outcomes. Following continual monitoring and evaluation through the Clinical Network, the system has evolved with GDPs now referring directly using a referral pathway.

Benefits to patients

Patients are routinely sent a follow up questionnaire by the provider 4 weeks after completion of the DwSI intervention. Data from this source was analysed for the period August 2013 and January 2014. Fifty-five patients responded to the survey, the questions covering waiting times; patient experience and overall satisfaction with the service. The questionnaire has been modified over time and now includes the Friends and Family Test (FFT) question.

In summary the survey showed:

- waiting time from referral to treatment had significantly reduced
- high levels of satisfaction in relation to the clinical care provided
- high levels of satisfaction with the clinical outcome achieved
- high levels of satisfaction with the overall patient experience

A further analysis of all patient questioners (183) returned between June 2013 and December 2014 and where clinical treatment had taken place was undertaken to get a bigger sample in relation to patients experience of the clinical intervention and its outcomes.

Lessons Learned

Consultant view point

- The service has improved over time as we have adjusted and reviewed clinical pathway.
- Regular audit has reviewed quality, which has been consistently good. It has also identified inappropriate referrals and practices/GDPs that have over referred. However, this has now appeared to have settled.

- Considerable support and help to the hospital service within all specialities enabled patients who would otherwise have to have private treatment access to NHS treatment.

DWSI Provider view point

- Initial triage through the Consultant, time consuming and unnecessary once criteria set
- Initial appointment set to allow enough time to start treatment as well as Consultation
- Allocate time monthly for pain and trauma referrals4 sessions per week struggles to cope with patient demand. Further restrictions on referrals (above level 2) or expansion of the service would resolve this. However, restrictions on an already rigorously set referral criteria have proven difficult to make.
- Standardisation of data collection to be developed and recorded

Commissioner view point

- Introduction of paper triage on receipt of referral ensures that the patients treated are of level 2 complexity or above Continual evaluation and evolution by MCN under governance of Consultant in Restorative Dentistry is important
- A more robust electronic data collection template is needed to analyse service effectiveness