

Dental Pain – How to Recognise and Treat it

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Dental pain - we've all either personally experienced it or know someone who has. The frustration, inconvenience and suffering it causes makes people want to visit the dentist immediately to try and relieve it. As pain is one of the most common presenting complaints it's important that as aspiring competent dentists, we are able to distinguish between the different causes of the pain and how to treat them. Here are some key characteristics of common causes of pain that may have:

Condition	Explanation	Description	Clinical Findings				Treatment Options
			On examination	TTP?	Result of Vitality Test	Radiographic findings	
Reversible Pulpitis	Acute inflammation of pulpal tissues	Sharp pain in response to hold/cold/sweet stimulus. Pain doesn't last long. Poorly localised as PDL not involved (2)	Active carious lesions near the pulp, including secondary caries near restorations	No (2)	+ve	Radiolucencies near the pulpal region (Fig. 1).	Remove carious lesion(s) and place new restoration to eliminate source of infection (2).
Irreversible Pulpitis	Chronic inflammation of pulpal tissues	Dull, intermittent pain that is unprovoked but can be worsened by stimuli (2). Pain can last up to few hours after stimuli is removed.	Active carious lesions near the pulp, including secondary caries near the restorations	Not TTP, except in late stages of disease (2)	+ve	Radiolucency near pulpal region (Figure 1)	RCT if tooth has good periodontal support. XLA if hopeless prognosis (4)
Apical Periodontitis	Inflammation of tissue around root apex, usually presents after untreated tooth decay.	Sharp pain when biting tooth. Pain is localised as PDL are involved (2)		Tender to percussion and palpation	+ve in early stages but no response in late stages as pulp becomes necrotic and dies (2)	Radiolucencies in peri-apical region (Fig. 2)	RCT if tooth has good periodontal support. XLA if hopeless prognosis.
Dentine Hypersensitivity	Exposed dentine due to gum recession or root caries which destroys the cementum	Short lasting but sharp pain in response to hot/cold/sweet stimuli. Can be stimulated by cold air (2). Poorly localised as PDL not involved.	Gum recession / root caries which has led to exposed dentine.	No	+ve	May show bone loss (2).	Apply dentine bonding agent to cover exposed dentine (2). Treat root caries. Use potassium nitrate to block pain sensation (2). Encourage use of sensitivity toothpastes and give OHI to prevent further recession.

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Figure 1: Radiolucency indicating carious lesion near pulp (1)

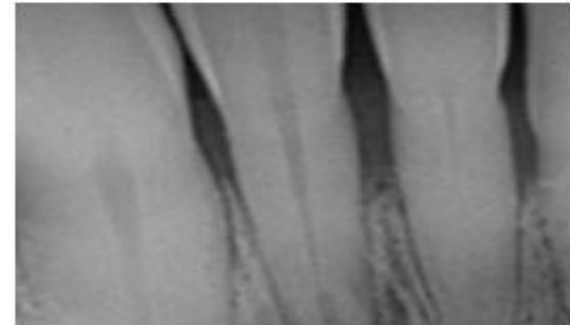


Figure 2: Radiolucency at Tooth Apex (3)

Key:

PDL = Periodontal Ligament

RCT= Root Canal Treatment

TTP = Tender to Percussion

XLA = Extraction

+ve = Positive

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