**KING SAUD UNIVERSITY, COLLEGE OF DENTISTRY**
**DEPARTMENT OF PREVENTIVE DENTAL SCIENCES**
**DIVISION OF ORTHODONTICS**

# "Sample"
# FINAL EXAMINATION

## 431 PDS
## Introduction to Orthodontics

*** Correct answer is highlighted**

1. Functional appliances are most often used in class II division 1 malocclusion. They are particularly appropriate where the arches are well aligned as they contain no mechanism for aligning irregular teeth:

   a. First statement is correct, second statement is not correct.
   b. First statement is incorrect, second statement is correct.
   c. Both statements are correct.
   d. Both statements are incorrect.

2. Cephalometric radiograph is helpful in detecting:

   a. Skeletal discrepancy
   b. Cross-bite
   c. Growth
   d. Timing of treatment

3. Le Font II is employed to achieve mid-face:

1. Advancement only
2. Advancement and impaction sometimes
3. Retraction
4. Distalization

a. (1) and (2) are correct
b. (3) and (4) are correct
c. (1) and (2) are incorrect
d. Only (4) is incorrect

4. Bilateral cross-bites are more likely to be associated with a skeletal discrepancy, either in the anteroposterior or transverse dimension or in both:

a. First statement is correct, second statement is not correct.
b. First statement is incorrect, second statement is correct.
c. Both statements are correct.
d. Both statements are incorrect.

5. The best growth modification option for a class II skeletal problem due to maxillary prognathism is:

a. Bionator appliance
b. Headgear
c. Face mask
d. Chin cup
e. None of the above

6. A child presented to you with premature loss of upper right primary second molar before the eruption of upper right permanent first molar. The appliance of choice to be prescribed for this patient would be:

a. Band and loop space maintainer
b. Nance holding arch
c. Transpalatal arch
d. Distal shoe space maintainer

7. Ectopic eruption is most common for permanent first molar. Since there is minimal chance of self correction, immediate interference to correct the problem should be practiced.

a. First statement is true and second statement is false.
b. First statement is false and second statement is true.
c. Both statements are true.
d. Both statements are false.

8. During clinical assessment, which of the following is/are suggestive of submerged tooth?

a. Infraocclusion
b. Absence of succedaneous tooth
c. Dull sound upon percussion
d. Ankylosis

1. (a), (b) and (c)
2. (a) and (b) only
3. (a) and (c) only
4. (b), (c) and (d)
5. All of the above

9. In posterior skeletal cross-bite the upper molars are usually normally inclined or palatally inclined, while in dental cross-bite the upper molars are flared buccally:

a. First statement is true and second statement is false.
b. First statement is false and second statement is true.
c. Both statements are true.
d. Both statements are false.

10. The following conditions represent suitable clinical situations to perform serial extraction procedure:

a. Class II Div 1 malocclusion.
b. Normal overbite and overjet.
c. Severe crowding in the maxillary and mandibular arches.
d. Class I skeletal relationship.

1. (a), (b) and (c)
2. (b), (c) and (d)
3. (b) and (d) only
4. All of the above

11. The following appliances are types of functional appliances EXCEPT:

a. Activator appliance
b. Headgear
c. Frankle appliance
d. Edgewise appliance

12. Anchorage in orthodontics is unwanted tooth movements in:

a. The vertical direction
b. The anteroposterior direction
c. The transverse direction
d. All of the above

13. Adult orthodontic treatment may be complicated by:

a. Negligible and reduced cell turnover.
b. Reduced periodontal attachment and reduced tissue blood supply.
c. Missing and heavily restored teeth.
d. Adults are very well adapted to discrepancies in the occlusion.

1. (a), (b) and (c)
2. (a), (b) and (d)
3. (a), (c) and (d)
4. (b), (c) and (d)
5. all of the above

14. Migration of periodontally compromised incisors in adults may be due to any of the following reasons:

a. Reduced bony support of the teeth.
b. Periodontal inflammation leads to extrusion of teeth and thus traumatic occlusion.
c. Lack of posterior dental support.

1. (a) and (b)
2. (a) and (c)
3. (b) and (c)
4. all of the above

15. Default in the normal development and/or fusion of the embryological processes related to the upper lip around the sixth week of intra-uterine life result in clefting of the secondary palate.

a. True
b. False

16. Class II division 2 malocclusion is commonly associated with mild class II skeletal pattern. However, it may also occur in association with class I or even class II dental base relationship.

a. First statement is true and the second statement is false.
b. First statement is false and the second statement is true.
c. Both statements are true.
d. Both statements are false.

17. The inter-incisal angle in class II division 2 malocclusion can be reduced by:

a. Torquing the incisor roots palatally with a fixed appliance
b. Proclination of the lower labial segment
c. Proclination of the upper labial segment

1. (a) and (b)
2. (a) and (c)
3. (b) and (c)
4. all of the above

18. In the majority of class III malocclusions, the soft tissues surrounding the dentition play a major role in increasing the severity of the malocclusion.

a. True
b. False

19. When planning for treatment of class III malocclusion several factors should be considered among them:

a. The severity of the skeletal pattern.
b. The patient's opinion regarding their need in treating the malocclusion.
c. The expected pattern of future growth
d. The degree of crowding.

1. (a), (b) and (c)
2. (a), (b) and (d)
3. (a), (c) and (d)
4. all of the above
5. none of the above

20. The habit of "persistent digit sucking" most likely will cause:

a. Proclination of the upper incisors
b. Retroclination of the lower incisors
c. Complete over bite or deep bite
d. Narrowing of the upper arch

1. (a), (b) and (c)
2. (a), (b) and (d)
3. (a), (c) and (d)
4. (b), (c) and (d)
5. all of the above
6. none of the above

21. In class II division 1 with incompetent lips, the patient will try to achieve an anterior oral seal by:

a. Circumoral muscular activity to achieve lip to lip seal
b. The mandible is postured forward.
c. The lower lip is drawn up and in front the upper incisors
d. The tongue is placed forward.

a. (a), (b), and (c)
b. (a), (b) and (d)
c. (a), (c) and (d)
d. (b), (c) and (d)
e. all of the above

22. Dental factors are the main etiological agent in class I malocclusions. However, tooth / arch size discrepancies are not among the etiological dental factors.

a. First statement is true and the second statement is false.
b. First statement is false and the second statement is true.
c. Both statements are true.
d. Both statements are false.

23. The median diastema may be caused by:

a. Normal physiological state in the early mixed dentition.
b. Abnormal frenal attachement involvement
c. The presence of a supernumerary tooth
d. Severe periodontal bone loss.

1. (a), (b) and (c)
2. (a), (b) and (d)
3. (a), (c) and (d)
4. (b), (c) and (d)
5. all of the above

24. The most important factor/s when considering the etiology of anterior open bite is/are:

a. Tongue thrust swallowing
b. Tongue posture
c. Tongue size
d. (a) and (b)
e. (b) and (c)

25. Congenitally missing teeth are:

a. The most distal of any given type
b. The most mesial of any give type
c. The most anterior of any give type
d. The most superior of any given type

26. Which of the following is true when considering the genetic etiology of malocclusion?

a. Heritability is not an etiological factor of malocclusion.
b. Heritability of dental characteristics is high.
c. Heritability of skeletal and dental characteristics is low.
d. Heritability of skeletal characteristics is high.

27. It is recommended to have the first orthodontic evaluation at age:

a. 7-8 years
b. 5-6 years
c. 10-12 years
d. No specific age

28. Convex soft tissue profile is associated with:

a. Prognathic mandible and/or retrognathic maxilla
b. Retrognathic mandible and/or prognathic maxilla
c. Large size nose
d. Prominent upper and lower lips.

29. Lateral mandibular functional shift is usually associated with:

a. Severe upper and lower spacing
b. Bilateral posterior cross-bite
c. Unilateral posterior cross-bite
d. Bilateral constriction of the mandible

30. A major factor in the re-mineralization of decalcified enamel (White spots) includes the following **except**:

a. Depth of the lesion
b. Size of the lesion
c. Oral hygiene of the patient
d. Thickness of underlying dentin