

APRIL - 2001

[KD 654]

Sub. Code : 4188

FIRST B.D.S. DEGREE EXAMINATION.

(Modified Regulations)

Paper III — MATERIALS USED IN DENTISTRY

Time : Three hours Maximum : 100 marks
Two and a half hours Sec. A & Sec. B : 70 marks
for Sec. A and Sec. B Section C : 30 marks

Answer Sections A and B in the same Answer Book.

Answer Section C in the Answer Sheet provided.

SECTION A — (2 × 15 = 30 marks)

1. Classify dental ceramics and write in detail about Metal ceramic restorations.
2. Define casting procedure and write in detail about the steps involved in it.

SECTION B — (8 × 5 = 40 marks)

3. Write short notes on :

- (a) Ring liners
- (b) Acid etching
- (c) Ring less castings
- (d) Phosphate bonded investments

(e) Ferritic stainless steel

(f) Advantages and disadvantages of zinc polycarboxylate cements

(g) Sensitization

(h) Electroformed dies.

[KE 654]

Sub. Code : 4133

NOVEMBER - 2001

FIRST B.D.S. DEGREE EXAMINATION.

(Modified Regulations)

Paper III — MATERIALS USED IN DENTISTRY

Time : Three hours Maximum : 100 marks

Two and a half hours Sec. A & Sec. B : 70 marks

for Sec. A and Sec. B Section C : 30 marks

Answer Sections A and B in the same Answer Book.

Answer Section C in the Answer sheet provided.

SECTION A — (2 × 15 = 30 marks)

1. What are the ideal requirements of denture base materials? Describe the composition, setting reaction and curing cycle of heat cure denture base acrylic resins.

2. Classify the dental casting alloys.

Explain the composition, uses, advantages and disadvantages of chromium cobalt alloys used in dentistry.

SECTION B — (8 × 5 = 40 marks)

3. Write short notes on :

- (a) Aluminous porcelain and its advantages
- (b) Hygroscopic setting expansion of casting investment
- (c) Polycarboxylate cement
- (d) Dental implant materials
- (e) Hybrid composite resins
- (f) Wrought gold alloy
- (g) Casting machines
- (h) Localized shrinkage porosity.