

**5 SEM TDC BOTH (CBCS) C 11**

**2 0 2 2**

( Nov/Dec )

**BOTANY**

( Core )

Paper : C-11

**( Reproductive Biology of Angiosperms )**

Full Marks : 53

Pass Marks : 21

Time : 3 hours

*The figures in the margin indicate full marks  
for the questions*

1. (a) Choose the correct answer from the following : 1×3=3
- (i) The edible part of litchi is pericarp/ endosperm/aril.
  - (ii) The wall layer of microsporangium which provides nourishment to developing microspores is called anther wall/tapetum/exine.
  - (iii) The development of endosperm of arecanut is cellular/nuclear/helobial type.

( 2 )

(b) Fill in the blanks : 1×2=2

(i) The entry of the pollen grain into the ovule through the chalaza is called \_\_\_\_\_.

(ii) When the micropyle, chalaza and funicle of an ovule lie on one straight line, it is called \_\_\_\_\_.

2. Write precise notes on the following (any three) :

4×3=12

- (a) Bisporic embryo sac
- (b) Induction polyembryony
- (c) Helobial endosperm
- (d) Significance of pollination
- (e) Induction of flowering

3. What do you mean by double fertilization? Write in detail about the process of double fertilization. Give diagram where necessary.

3+7+2=12

Or

Write explanatory notes on the following :

6+6=12

- (a) Haustorial structures of endosperms
- (b) Palynology and its significance

( 3 )

4. What do you mean by embryo-endosperm relationships? With illustration, write briefly on unusual development of embryo in *Paeonia*. 2+10=12

Or

Write notes on the following : 4×3=12

- (a) Obturator
- (b) Aril
- (c) Caruncle

5. Write explanatory notes on the following : 6+6=12

- (a) Megagametogenesis
- (b) Methods to overcome self-incompatibility

Or

What is parthenocarpy? Write briefly on the causes and their application. 2+5+5=12

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