

131. Which of the following represents the correct sequence of the development process in a plant cell?
- (1) Cell division → Elongation → Senescence → Maturation
 - (2) Meristematic cell → Maturation → Elongation → Death
 - (3) Cell division → Elongation → Maturation → Plasmatic growth
 - (4) Cell division → Differentiation → Maturation → Senescence
132. In which of the following process, the cell loose their protoplasm to form tracheary element?
- (1) Dedifferentiation
 - (2) Vernalisation
 - (3) Differentiation
 - (4) Plasticity
133. **Assertion (A)** : Auxins help to prevent fruits and leaves drop at early stages
Reason (R) : Auxins promote the abscission of older mature leaves and fruits
- (1) Both (A) and (R) are correct, and (R) is the correct explanation of (A).
 - (2) Both (A) and (R) are correct, and (R) is not the correct explanation of (A).
 - (3) (A) is correct, but (R) is not correct
 - (4) Both (A) and (R) are incorrect.
134. Which of them is not an extrinsic factor for plant growth and development?
- (1) Light, O₂
 - (2) Temperature, CO₂
 - (3) Nutrient , water
 - (4) Growth regulator and genetic factor
135. Select the pair that consists of plant growth promoters only.
- (1) Auxins and cytokinins
 - (2) Gibberellins and ABA
 - (3) Ethylene and ABA
 - (4) All of these

SECTION-B

136. Essential requirement for seed germination is
- (1) O₂ and light
 - (2) H₂O and O₂
 - (3) H₂O and high temperature
 - (4) Scarification and vernalisation
137. **Assertion (A)** : Cytokinins are antisenescent
Reason (R) : Cytokinin help in nutrient mobilisation which helps in the delay of senescence
- (1) Both (A) and (R) are correct, and (R) is the correct explanation of (A).
 - (2) Both (A) and (R) are correct, and (R) is not the correct explanation of (A).
 - (3) (A) is correct, but (R) is not correct
 - (4) Both (A) and (R) are incorrect.
138. Which one of the following acids is a derivative of carotenoids ?
- (1) Indole-3 -acetic acid
 - (2) Gibberellic acid
 - (3) Abscisic acid
 - (4) Indole butyric acid
139. Maximal size in terms of wall thickening and protoplasmic modification are achieved by
- (1) Cells of divisional phase
 - (2) Cells of maturation phase
 - (3) Cells of elongation phase
 - (4) Cells of meristematic tissue.
140. The exponential growth can be expressed as $W_1 = W_0 e^{rt}$. What is 'r' in the expression?
- (1) Relative growth rate and depends on final size
 - (2) Absolute growth rate & depends on initial size
 - (3) Relative growth and also referred to as efficiency index
 - (4) Absolute growth rate & depends on efficiency index