



ST. LAWRENCE HIGH SCHOOL

A JESUIT CHRISTIAN MINORITY INSTITUTION



Solutions – 34

Class: XII

Sub: Biological Science

Date: 01.08.2020

Topic: Ch 6 (Part III) Packaging of DNA – Nucleosome Model and Terminologies of Molecular Genetics

F.M. : 15

Choose the correct option:

(1x15=15)

1. The nucleosome concept was introduced by :-
a) Kornberg b) Stahl c) Griffith d) Watson
Answer : Kornberg (a)
2. The separation of DNA strands is called :-
a) Melting b) Denaturation c) Renaturation d) Both (a) and (b)
Answer : Both (a) and (b) (d)
3. The strand of DNA strand which stores the genetic information is called :-
a) Sense strand b) Cistron c) Template strand d) None of these
Answer : Template strand (c)
4. Intervening non-coding sequences are also called :-
a) Exons b) Introns c) Split genes d) None of these
Answer : Introns (b)
5. DNA segments which have identical sequence of nitrogenous bases repeated several times and clustered together is called :-
a) Discontinuous DNA b) Collinear DNA c) Repetitive DNA d) None of these
Answer : Repetitive DNA (c)
6. The highly repetitive DNA sequences which are all clustered together is called :-
a) Unique sequences b) Satellite DNA c) Split gene d) Sense DNA
Answer : Satellite DNA (b)
7. In DNA fingerprinting the characteristic of individual's genome is due to the presence of :-
a) Repetitive DNA b) Split genes c) Cistron d) Codon
Answer : Repetitive DNA (a)
8. In genome mobile DNA segments are called :-
a) Satellite DNA b) Introns c) Sense strand d) Jumping genes
Answer : Jumping genes (d)
9. The concept of jumping genes was introduced by :-
a) Julius Marmur b) Barbara Mc Clintock c) Watson d) Wikins
Answer : Barbara Mc Clintock (c)

10. Compaction occurs by folding and attachment of DNA with basic proteins in prokaryotes is called :-

- a) Histones b) Non-histones c) Polyamines d) All of these

Answer : Polyamines (c)

11. The compacted mass of DNA in prokaryotes is called :-

- a) Nucleoid b) Prochromosome c) Nucleosome d) Both nucleoid and prochromosome

Answer : Both nucleoid and prochromosome (d)

12. Histone octamer does not consists of the following protein :-

- a) H₂A b) H₃ c) H₁ d) H₄

Answer : H₁ (c)

13. Solenoid has _____ nucleosomes per turn.

- a) 7 b) 6 c) 8 d) 11

Answer : 6 (b)

14. The thickness of chromatid after super coiling is :-

- a) 80 nm b) 10 nm c) 700 nm d) 2nm

Answer : 700 nm (c)

15. Chromatin which is densely packed and darkly stained is called :-

- a) Heterochromatin b) Euchromatin c) Nucleosome d) Chromatosome

Answer : Heterochromatin (a)

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