



ST. LAWRENCE HIGH SCHOOL



A JESUIT CHRISTIAN MINORITY INSTITUTION

Sub: Life Science

Class: X

Date: 19.06.2020

CHAPTER: HEREDITY & COMMON GENETIC DISEASES

TOPIC: TERMS RELATED TO
HEREDITY PART 2

WORKSHEET 41

Choose the correct option:

(1X15=15)

- Which type of genetic constitution does pure line organisms have?
a. Homozygous b. Hemizygous c. Heterozygous d. Both a & b
- Hybrids are formed by the mating between parents who are genetically
a. similar b. Dissimilar c. Both a&b d. None of these
- The genotypic ratio of monohybrid cross performed with the height as one of the characters is?
a. 3:1 b. 1:2:2 c. 1:2:1 d. 1:3:1
- When a pure breed tall pea plant is crossed with that of a dwarf plant, which of the following indicates a tall plant?
a. TT b. Tt c. tt d. Both a&b
- Selfing of hybrid tall (Tt) pea plants leads to generation of
a. 50% tall plant b. 75% dwarf plants c. 75% tall plants d. 50% dwarf plant
- Phenotypic expression changes on
a. variation in protein expression b. Change of a dominant to recessive allele
c. Both a&b d. None of these
- Which of the following denotes the parental generation with respect to the F₂ generation in a cross?
a. P₂ b. P₁ c. P₃ d. Both a&b
- Atleast how many copies of the brown allele is required for a person to have brown eyes?
a. One b. Two c. three d. None of these
- Which of the following copies of recessive allele(s) can produce dominant phenotype?
a. One b. two c. Zero d. Both a&b
- How many Brown eyed offsprings will be produced to a brown eyed (BB) Father & blue eyed mother?
a. One b. Two c. Three d. Four
- Which of the following genotypes will indicate tallness in pea plants?
a. TT b. Tt c. Both a&b d. None of these
- Which of the following is Phenotype related to?
a. Genotype b. environmental factor c. both a&b d. None of these
- Which of the following is true?
a. Genotype leads to phenotype b. Phenotype leads to genotype
c. Phenotype leads to gene d. Both a&c
- A hybrid tall pea plant contains
a. a recessive gene b. a dominant allele c. Two recessive allele d. Two dominant alleles
- What will be the % of formation of Tt progeny when a pure tall & pure dwarf pea plant is crossed?
a. 50% b. 25% c. 100% d. 75%

-Debjani Chakraborty