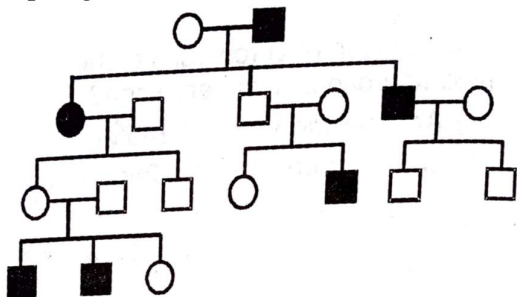


## BIOLOGY

31. In the following human pedigree, the filled symbols represent the affected individuals. Identify the type of given pedigree.



- (1) Autosomal dominant  
(2) Y-linked recessive  
(3) Autosomal recessive  
(4) X-linked dominant
32. Scientist(s) who rediscovered Mendel's principles is/ are  
[NCERT XII Pg. No. 81]
- (1) Hugo de Vries  
(2) Carl Correns  
(3) von Tschermak  
(4) All of the above
33. \_\_\_\_\_ led to discovering the basis for the variation that sexual reproduction produced. [NCERT XII Pg. No. 83]
- (1) Boveri  
(2) Sutton  
(3) Thomas Hunt Morgan  
(4) Both (1) and (2)
34. Mendel worked with tiny fly *Drosophila melanogaster* for the following reason -  
[NCERT XII Pg. No. 83]
- (1) It can be grown on complex medium  
(2) Single mating produces large offsprings  
(3) Sexes cannot be differentiated easily  
(4) They take a long duration to complete their lifecycle.

35. Phenotype of the organism bearing the genotype 'aabbcc' in polygenic inheritance w.r.t. skin tone of man is  
[NCERT XII Pg. No. 85]
- (1) Very Dark (2) Dark  
(3) Very light (4) Light
36. Where a single gene can exhibit multiple phenotypic expressions, such gene is called?  
[NCERT XII Pg. No. 85]
- (1) Multiple allele  
(2) Polygenic  
(3) Pleiotropic  
(4) Incomplete dominance
37. Name the condition exhibited by the organism bearing a genotype 'AAXXXX'  
[NCERT XII Pg. No. 85]
- (1) Allosomal tetrasomy  
(2) Autosomal tetrasomy  
(3) Allosomal trisomy  
(4) Autosomal trisomy
38. Female heterogamety is shown by -  
[NCERT XII Pg. No. 86]
- (1) *Drosophila* (2) Human  
(3) Birds (4) Insects
39. In which of the following organism, males produce gametes by mitosis?  
[NCERT XII Pg. No. 86]
- (1) Human  
(2) *Drosophila*  
(3) Grasshopper  
(4) Honeybee
40. Chemical or physical factors which causes mutations are called  
[NCERT XII Pg. No. 88]
- (1) Oncogens  
(2) Substitution mutations  
(3) Frame shift mutations  
(4) Mutagens