

Genes and chromosomes

1. What is a chromosome? Check the correct answer.

- a) Cell organelle that handles cellular respiration.
- b) Element of the nucleus that contains hereditary information.
- c) Membrane surrounding the cell nucleus
- d) Code supplying hereditary information

2. What is a gene? Check the correct answer.

- a) Unit of hereditary information located on a chromosome
- b) An individual's entire genetic code
- c) Organelle containing information about the cell
- d) Complex molecule shaped like a double helix

3. Indicate if each statement refers to genes or chromosomes.

- a) Human beings have tens of thousands of them. Genes
- b) Human beings have 23 pairs of them. Chromosomes
- c) They are responsible for hereditary traits. Genes
- d) They are segments of DNA (deoxyribonucleic acid). Genes

4. What is a hereditary trait?

A characteristic that is transmitted from one generation to another.

5. Give three examples of hereditary traits.

Answers will vary. Examples: Eye colour, shape of the face, height as an adult

6. Rank the following elements from smallest to largest.

Cell	Gene	Chromosome	Nucleus
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Gene, chromosome, nucleus, cell
