

DNA technology/genetic engineering

Name Class Date Which process is least likely to add to the What is the relationship between these three variety of traits in a population? structures? A DNA is made up of A deletion of bases from DNA proteins that are **B** genetic engineering synthesized in the cell. c accurate replication of DNA Protein is composed Protein of DNA that is stored in the cell. D exchange of segments between DNA controls the production of protein chromosomes in the cell. The cell is composed only of DNA and protein. To produce large tomatoes that are resistant to 3 The genetic code of a DNA molecule is determined by a specific sequence of cracking and splitting, some seed companies use the pollen from one variety of tomato plant A ATP molecules to fertilize a different variety of tomato plant. This process is an example of B sugar molecules 5 **PREVIEW** Please Sign In or Sign Up to download the printable version of this worksheet chromosome number sequence of DNA bases → appearance of D shape and size appearance of characteristic → joining amino acids in



- sequence → a change in the sequence of DNA bases
- D a change in the sequence of DNA bases → appearance of characteristic → joining amino acids in sequence



Arrange the following structures from largest to smallest.

- A chromosome, nucleus, gene
- B nucleus, chromosome, gene
- c gene, nucleus, chromosome
- D nucleus, gene, chromosome



The nucleus is removed from a body cell of one organism and is placed in an egg cell that has had its nucleus removed. This process, which results in the production of organisms that are genetically alike, is known as

- A cloning
- **B** fertilization
- C biological adaptation
- DNA production



DNA technology/genetic engineering - Answer Key



Name	CI	ass	Date	
1	Which process is least likely to add to the variety of traits in a population? A deletion of bases from DNA B genetic engineering C accurate replication of DNA D exchange of segments between chromosomes	2	What is the relationship between these three structures? A DNA is made up of proteins that are synthesized in the cell. B Protein is composed of DNA that is stored in the cell. C DNA controls the production of protein in the cell. The cell is composed only of DNA and protein.	<u>C</u>
3	The genetic code of a DNA molecule is determined by a specific sequence of A ATP molecules B sugar molecules	4 AB	To produce large tomatoes that are resistant to cracking and splitting, some seed companies use the pollen from one variety of tomato plant to fertilize a different variety of tomato plant. This process is an example of	A
5	PREV			B
7	Please Sign In or Sign In or Sign In the printable version shape and size	_		A
9	Arrange the following structures from largest to smallest. A chromosome, nucleus, gene B nucleus, chromosome, gene C gene, nucleus, chromosome D nucleus, gene, chromosome	10	The nucleus is removed from a body cell of one organism and is placed in an egg cell that has had its nucleus removed. This process, which results in the production of organisms that are genetically alike, is known as A cloning B fertilization C biological adaptation D DNA production	A