YEAR 10 SCIENCE 2021 – NATURAL SELECTION

Due:

Friday 21ST May 2021 at 9.30 am

Weighting:	25%
Task Nature:	Research booklet
Outcomes assessed: SC5-	-15LW, SC5-3VA, SC5-1VA, SC5-8WS, SC5-9WS
THE TASK	
Research and answer the fol	llowing questions in the spaces provided.
Question 1 - Define the fol	llowing terms (4 marks)
Variation:	
Species:	
Adaptation:	
- Adaptation.	
Evolution:	

Question 2 - Describe an example of a <i>species</i> that shows how a <i>variation</i> can be an <i>idaptation</i> - you may add pictures to help your answer. (4 marks)					

Question 3 - Justify the statement: **A species will evolve, but an individual will not. (6 marks)** (Justify = Support an argument or conclusion) Why is the statement true? What examples, evidence, explanations or elaborations can be used in support?

A better response will clearly indicate

• your point of view on the statement,

• short conclusion linking to the question

• explain how TWO points support your point of view

Question 4 - Identify the main idea about evolution put forward by each of these scientists. **(6 marks)**

Outline the contribution this made to developing our understanding of Evolution

Darwin

Main Idea:
Contribution:
Wallace
Main Idea:
Contribution:
Contribution.
Lamarck
Main Idea:
Contribution:

n 5 - Describe natural selection. (6 marks)

n 6 – Explain what 'survival of the fittest' is. (2 marks)
,
7 – Explain what selection pressure is with a relevant example (2 marks)

Question 8 - There is a lot of natural variation in rabbits, as can be seen by the different breeds.

Identify at least 10 variations that can be seen in the images

of the rabbits shown (10 marks)

1.
2.
3.
4.
5.
6.
7.
8.
9.



Question 9 - Select **FOUR** different variations from above and **outline** whether each of these would suit the rabbit for surviving: (4 marks)

n a desert OR in a rocky environment OR in a grassy area OR where preyvere quite small			
·····			

Question 10 - This collection of rabbits was taken on an amazing journey and ended up in a new environment. It was in a very snowy region for six months of the year, a very dry area in summer. It had very dense plant growth under very tall trees. There were very few natural predators, except for small birds of prey that could swoop between the trees.

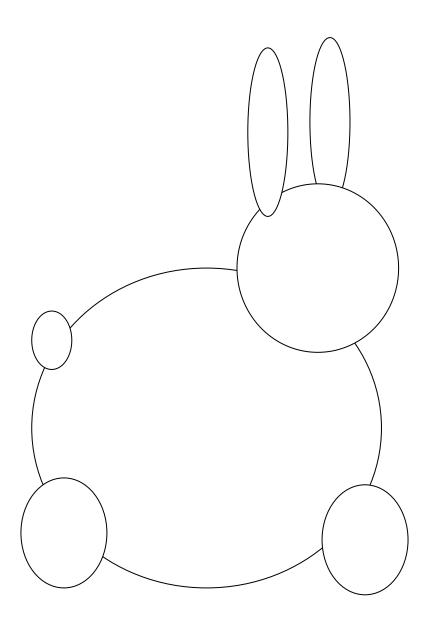


Years into the future, after the rabbits have bred like... rabbits, and natural selection has taken place. A new species of rabbit has arrived - the Frabbit.

Justify what the Frabbit population will be like. (10 marks)

What variations would be passed on from the original rabbits?					

Draw (and especially **label** the key features of) your Frabbit. A very basic Frabbit template has been included for your survivors. (10 marks)



MARKING CRITERIA

- 1. One mark given for each clear and correct definition.
- 2.