PARENT NOTES

Biology

Evolution: Species Extinction

At A Glance:

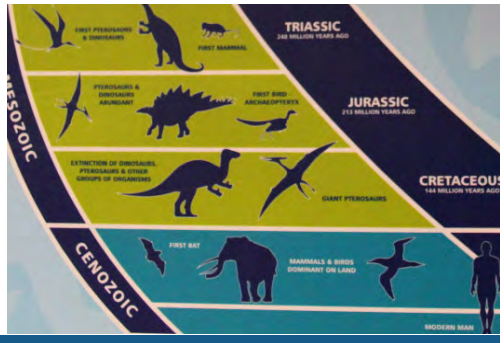
- ✓ Biology - Key Stage 4
- ✓ All exam boards
- ✓ Practises interpretation and research skills
- ✓ On-site activity with follow-up project options

What's Involved?

This resource enables students to engage with the factors that contribute to extinction.

Students will be able to interpret scientists' views and hypotheses regarding how and why the dinosaurs' extinction occurred.

The implications of extinction for both the past and the future are also considered here.



"Biological diversity is messy. It walks, it crawls, it swims, it swoops, it buzzes. But extinction is silent, and it has no voice other than our own."

- Paul Hawken

About this activity

This science resource enables students to engage with the factors that contribute to the extinction of a species. Students will explore the information about the dinosaurs available in the museum before hypothesising as to the reasons for their extinction at the end of the Cretaceous period. The resource is aimed at key stage 4 students of biology.

Questions & Answers

What is the task?

- This is a museum-linked research and observation task that enables students to practise their interpretation and observation skills.

How does this link to my child's learning?

- The task links to specific information present at Dinosaur Isle museum, thus ensuring relevance on the visit for students in key stage 4.
- Questions have been chosen because they link directly with the key curriculum areas regarding species evolution and extinction.

What will they learn?

- Students will learn about the varying views of scientists in terms of causes of the mass extinction that eliminated the dinosaurs and other species.
- Students will be able to explore the issues surrounding extinction, including the potential future extinction of species.
- Students will be able to draw their own conclusions and hypothesise as to the likely cause of the mass extinction in the Cretaceous-Paleogene period.

How does this enrich study undertaken in school?

- When on site, students will be able to use the questions as prompts to engage with the information at the Dinosaur Isle museum in order to find answers to their questions, thus gaining a more enhanced and enriched visit experience.
- They will experience a museum-environment and be able to see potential evidence first-hand, as well as having access to experts in this field.

What do they need to have done in preparation?

- It is suggested to teachers that they introduce the topic of extinction before the visit, so the subject matter is familiar and they have an understanding of the main theories and hypotheses surrounding the End-Cretaceous mass extinction; students could research these areas at home.
- Students would also benefit from looking at other species of animals that have gone extinct, identifying differences in characteristics from the dinosaur species and possible reasons for their extinction.

What skills do they need to demonstrate?

- Observation and identification of extinction causal factors
- Hypothesising as to reasons for extinction at the end of the Cretaceous period
- Summarising skills

Helpful Resources

Encourage your child to research Dinosaur Isle and the dinosaurs **before** their visit

This activity was compiled by **Education Destination** in conjunction with Dinosaur Isle. We help students of all ages and abilities to experience excellent curriculum based learning opportunities at many Island venues and attractions.

edudest.info

Dinosaur Isle will engage, inspire and excite visitors of all ages. This highly regarded museum is visited regularly by school and universities and offers exceptional learning opportunities across the curriculum

www.dinosaurisle.com

For further reading about Dinosaur Isle and dinosaurs, **wikipedia** offers excellent articles, including onward links to a range of related content. This would serve as an ideal introduction for learners prior to their visit, and is suitable for ages 7 upwards.

wikipedia.org

What follow-up tasks are there?

Teachers could engage the students in many follow-up tasks, including:

- Whole class discussion about the responses to the questions
- Groups presenting back their collated responses to the class
- Projects on the extinction of a particular species

Is there any scope for future learning at Dinosaur Isle?

Yes. There are many other subjects and tasks developed for this key stage and for subsequent visits. There is much to be learned here!