

Human Impacts on the Environment - Teacher's Notes

Who is it for? 11-14 year olds

How long will it take? The presentation and activity are ideal for a 2 hour session, although it could also be used in a shorter session if the activity was finished off as homework.

Learning outcomes: Students will learn about how humans can have a negative impact on the environment and endangered species. They will be asked to consider how human impacts can be measured, and what can be done to help.

What do you need?

- Interactive whiteboard or projector
- Computer to connect to whiteboard or projector
- ARKive's Human Impacts on the Environment classroom presentation (PowerPoint)
- Question sheets (1 per student)
- Activity handouts (1 per student / pair / group)
- A computer or laptop with internet access and PowerPoint for each student, or one between each pair or group if working together.
- Storyboards - if you choose to undertake this extension activity

Summary:

This presentation and activity are designed to teach 11-14 year olds about the concept of human impacts on the environment. The presentation explains how human impacts can directly affect species survival, using plastic waste as an example. Students are then shown a short film on the topic of plastic waste and asked to fill out a question sheet relating to the film.

The class will then go on to consider how the impact of plastic waste could be measured, and think about why measuring our impact on the environment is important. Finally, the class will discuss the power of the film and the ways in which we can help reduce the impact of plastic waste, before conducting their own research into a human impact topic of their choice and producing a PowerPoint presentation.

Preparation guidelines:

1. Read through the instructions to make sure you understand the activity.
2. Download the Human Impact on the Environment PowerPoint presentation.
3. Print out copies of the question sheets and handouts.

4. Check that the video plays and that the sound is working - <http://www.arkive.org/laysan-albatross/phoebastria-immutabilis/video-99a.html>

How to run the session:

1. Begin by introducing the concept of human impacts on the environment by working through the Human Impact on the Environment PowerPoint presentation. Using plastic waste as an example, explain how human impacts can directly affect species survival. See slide notes on the PowerPoint presentation for further guidance and information.
2. Introduce the video and give each student a question sheet to fill out. The first three questions can be answered when watching the video, but it may be a good idea to give the students a couple of minutes after the video to answer the final three questions. The video can be found on the Laysan albatross species profile on ARKive: <http://www.arkive.org/laysan-albatross/phoebastria-immutabilis/video-99a.html>
3. Returning to the PowerPoint presentation, discuss with the class why measuring our impact on the environment is important, and ask for suggestions of how we could measure the impact of plastics on the Laysan albatross. Finish the PowerPoint presentation by discussing the power of the film, and ways in which we can reduce the impact of plastics on the environment.
4. Introduce the students to the activity, and distribute the handout sheets. The activity involves researching a different human impact and producing a PowerPoint presentation. You can decide whether the students should work individually or in pairs or groups. Students will need access to computers or laptops with internet access for their research. Depending on the time you have available, you may wish to ask the students to finish their PowerPoint presentations as homework.
5. Once the students have completed their PowerPoint presentations they can present their work to the rest of the class.

Suggestions for extension activities:

- You could ask the students to come up with a storyboard for their own wildlife film, based on the species and issue they chose to research. Ask them to use the information from their PowerPoint presentations, and suggest that they also think back to why the Laysan albatross film clip was so effective. This can be supported using the Storyboard document in the activity pack.
- Get the students to collect all of the different kinds of plastic waste they come across on their commute to and from school. Classify the plastics into different types and discuss what can and cannot be recycled. Look at the different types of packaging and get students to research and suggest whether alternative packaging options could be available for each product. The plastic waste should then be recycled, or could be made into a display or art installation to illustrate the impact of plastics on the environment.