

Lesson Summary

Overfishing is emptying the ocean, with 90% of fisheries already overfished. Illegal fishing is having a big impact. This lesson explains the role commercial whaling has played and the current status of whaling.

This lesson will take approx. 45 mins.



Subjects relevant to

English, Geography, History, Math, Science and Social Science.

Learning objectives

From this lesson students will:

- Understand the recent history of commercial whaling.
- Learn about the reasons why whaling continues.
- Explore the IWC moratorium (ban) on commercial whaling and the exemptions available to the rule.

Preparation

- This lesson has been designed to provide a complete lesson, but can be stopped at any time and split over multiple lessons, should you wish to include your own discussion/questions or incorporate the lesson activities.
- Definitions of key terms have been provided at the end of the guide to assist with the learning process.
- Each lesson has case study options showing Sea Shepherd campaigns, including videos to provide students with a firsthand experience of ocean conservation in action.
- Depending on whether students are working in a classroom or remotely, you can choose to discuss questions in the class or use the online learning app.
- This digital lesson has an interactive option called student devices. If you choose this option ask the students to bring their mobile phones or tablets to the lesson.
- Should you choose the interactive option, it will run a quiz during the lesson. Recommendation: only use this interactive option in classes of up to 30 students.
- Students can sign up on their mobile device to the www.LessonUp.app. They will be asked for a PIN code (this will appear automatically on slide 3 and will also show at the bottom of the screen). Students who sign up under a false name may be removed by the teacher.
- Students who do not have a mobile device can join the quiz with another student.
- If student devices is turned ON, you can opt to turn the sound and the share screen ON or OFF. Further on you can choose if you want to 'show ranking after each quiz' question. Doing so will create a competitive element, but it can be distracting. Recommendation: turn the 'show ranking after each quiz' OFF.
- The abovementioned options will also show if you click on the PIN code at the bottom of the screen.

Lesson plan

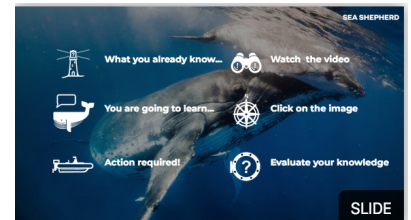
Slide 1 Introduction

This lesson is provided by Sea Shepherd. Sea Shepherd was founded in 1977 and is a marine conservation organisation working to protect the oceans and marine wildlife. Sea Shepherd works globally on a range of issues impacting the oceans, running numerous direct action campaigns each year. Stopping whale poaching is one area Sea Shepherd is working.



Slide 2 Lesson action icons

During the lesson we will use these icons to identify the learning actions.



Slide 3 Lesson Introduction

In this lesson we explain the current status of whaling, the implications of whaling over the 1900's and which countries continue illegal commercial whaling hunts.

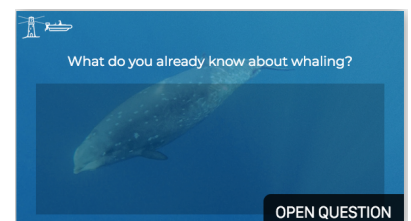
INTERACTIVE JOIN – ask students to go to www.LessonUp.app



Slide 4 What do you already know?

Ask students to answer the following question using www.LessonUp.app or discuss in the classroom.

“What do you already know about whaling?”

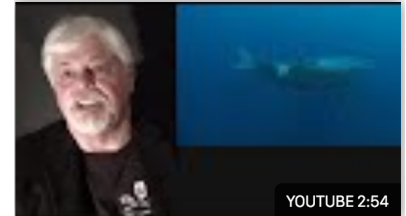


Slide 5 Empty ocean by 2050

Scientists estimate that by 2050 the ocean ecosystem will be on the verge of collapse, empty of fish and marine wildlife, unless urgent action is taken on the issues impacting on the oceans and marine wildlife.

Show this video (2.53min), which explains how important all species are to our planet.

<https://www.youtube.com/watch?v=TLcA31VRIRU>



Discuss the video with the class and what it means.

Slide 6 Whales

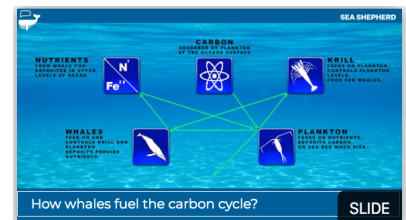
Whales have been around on this planet for 50 million years and they once filled the oceans with millions of them swimming around, but today they count in the thousands.



Slide 7 Carbon cycle

Whales play an important part in the ecosystem; one of the roles they play is in supporting our air supply.

Phytoplankton, are microscopic organisms that live in the ocean, they are so small you can't see them with the naked eye, but they are very important to our air supply. One of their key functions is they draw carbon from the air.



All the air we breathe out, or the fossil fuels we burn, like coal to make electricity, or petrol in our cars, all creates carbon. Without something to take that out of the air it would become toxic.

Phytoplankton are dependent on nutrients and nitrogen in the ocean which they receive from things like whale poo. Whales in turn need phytoplankton as food, as do other creatures like krill, which are another food source for whales.

So we need whales to help the phytoplankton to grow so they can help reduce the carbon in the air.

Slide 8 Threats to Whales

Many whale species are endangered. Why do you think that might be? Whales have to face numerous threats, including:

PLASTIC POLLUTION

One issue that is affecting the whales and all marine wildlife is marine debris. Things like plastic bags, balloons, bottles, fishing nets, all kinds of rubbish that they end up swallowing.



BY-CATCH

By-catch is anything that gets caught in commercial fishing nets that the fishermen don't want or cannot sell. It mostly gets thrown back into the oceans as rubbish, a waste of life effectively. This includes whales, which can become trapped in fishing nets. Around 300,000 whales and dolphins die each year in fishing nets.

ENTANGLEMENT IN NETS

Migrating whales are also becoming entangled in ghost nets, which are nets lost or discarded overboard by commercial fishing vessels.

Slide 9 Whaling

The issue that has had the biggest impact and pushed whales into the endangered category is whale hunts or whaling.

During the 1900's, with the development of new technology, mankind was able to build stronger, faster and bigger boats. This resulted in more and more whales being hunted in the world's oceans.



Research reveals that nearly 3 million whales were killed during whale hunts during the 1900's alone.

Slide 10 Blues whales

Before whaling started in the southern hemisphere there were estimated to be over 200,000 Blue whales, now more than 100 years later the estimate is that there are less than 2,000. This is around only 1% of the pre-whaling population. Globally there are believed to be less than 20,000 left, which puts them in the endangered species category.



Slide 12 Question

Ask students to complete their answers to the following question using the www.LessonUp.app or discuss in classroom.

“Why do you think it takes so long for whale populations to recover?”

Some answers:

- Other issues, such as by-catch, are still killing whales.
- Whales only breed once every 2 -3 years, their reproduction rate is low.
- Whales only reach maturity between 5 - 10 years old.
- Whales only have one calf at a time.



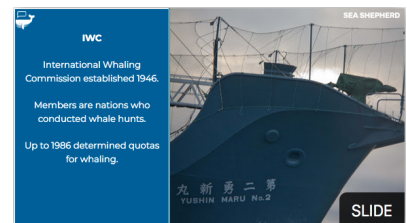
Slide 13 International Whaling Commission (IWC)

In 1946 the International Whaling Commission (IWC) was set up.

The IWC is made up of all the whaling nations and is a body that self regulates whaling. It is voluntary to participate but those countries that do must abide by the IWC regulations. It is important to remember, these are nations that have a history of whaling.

The IWC was set up to provide proper conservation of whale stocks and make possible orderly development of the whaling industry. Which means they recognized that many whale species were being hunted to extinction and unless quotas and controls were put in place on whaling there would be no whales left to hunt.

Quotas were imposed on participating countries and catch numbers were monitored. But not everyone accepted these quotas, there were still countries whaling without limits and there were also pirate whaling countries. This was still widely happening up to the early 1980's.



Slide 14 International ban on whaling

In 1982 the International Whaling Commission (IWC) recognised the desperate state of whale numbers and voted to impose a moratorium on commercial whaling from 1985/86. In order to save the whales from extinction, the signatory countries agreed that no country should continue commercial whaling.



Slide 15 Whaling classifications

Under the ban, whaling has been classified into three types:

- Commercial.
- Indigenous.
- Special permit.

Commercial whaling refers to the killing of whales for the sale of the meat and by-products for profit, usually in substantial numbers. All commercial whaling was banned in 1985/86.



Slide 16 Indigenous exemption

An indigenous exemption was put in place so indigenous communities, that have a subsistence living and rely on whale meat, could continue to survive. The IWC specifies the purpose of this category is to:

- ensure the risks of extinction of whales, are not increased by whaling.
- enables native people to hunt at appropriate levels for their cultural and nutritional requirements.
- move whale populations towards and then maintain them at healthy levels.



Slide 17 Special permit

Special permit allows for the use of lethal research, whales can be killed for research purposes.



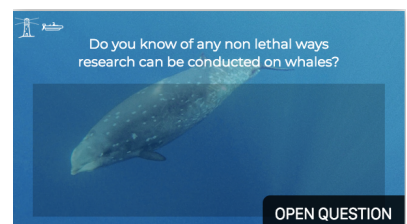
Slide 18 Question

Ask students to complete their answers to the following question using the www.LessonUp.app or discuss in classroom.

“Do you know of any non lethal ways research can be conducted on whales?”

Examples of current methods include:

- Using darts to take small samples.
- Attach tracking systems that follow whales, then detach after a period of time.
- Drones collecting whale ‘breath’ samples when they exhale.



Slide 19 CITES

In addition to the ban on whaling, all whale species were classified as an endangered species to be protected.

All whale species are listed under CITES (Convention on International Trade of Endangered Species).

Countries who have signed up to CITES must prohibit any trade in whale products, especially whale meat.



Slide 20 Whaling nations – Indigenous exemptions

Using this exemption under the IWC moratorium there are a number of nations that still conduct whaling.

RUSSIA

An exemption under the Indigenous or Aboriginal subsistence whaling was granted for the Chukotka people, in Siberia. They live in the eastern most part and very close to Alaska. They have killed around 110 -140 gray whales per year.

Given the number of people living in this area the quota they are allowed to hunt is questionably high. It has been proven in the past that they actually use some of the whale meat for fox fur farms.

Which means they keep animals that they can use for the fur industry in small cages stacked high and they turn the whale meat into feedstock for these animals.

This community is in a remote area but it is accessible by sea and can access other modern materials and foods. They trade the whale meat to other areas. Both of which don't comply with the IWC exemption.

UNITED STATES

The United States supports the ban on commercial whaling but does have an aboriginal subsistence permit for a community in Alaska.

There are a number of communities of Inuit that work together via the Alaska Eskimo Whaling Commission. They are allowed a quota of 75 bowhead whales per year and they have taken between 40-70 a year.

GREENLAND

Greenland, which is part of Denmark, takes around 160-200 Minke and endangered Fin whales per year. Part of their catch is traded with other communities on the island and is also sold to tourists. In fact surveys show that over 70% of restaurants sell whale meat to tourists and the meat can be found for sale in Denmark.



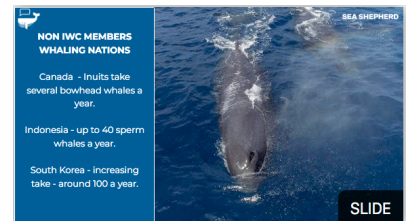
They claim they need to sell the meat to buy other goods, but the exemption is only supposed to provide for their nutritional needs from the meat. They can trade by-products but not meat. Selling it to tourists doesn't meet the subsistence requirement.

WEST INDIES

The West Indies have taken about 35 humpback whales (around 2 a year) under their permit.

Slide 21 Non IWC members

There are other countries that are not members of the IWC that hunt as a cultural practice, examples include Indonesia where up to 40 sperm whales a year are killed and Canada where Inuit's kill several bowhead whales each year. South Korea also kills whales but it is not known how many exactly they kill each year, it is estimated to be around 100 or more.



Slide 22 Research whaling

When the IWC ban on whaling was put in place Japan applied for research permits to continue whaling in the Southern Ocean around Antarctica and within their waters in the North Pacific.

The quotas they set for research in Antarctica were to kill 1,035 whales, being 935 Minke, 50 endangered Fin whales and 50 Humpback whales.

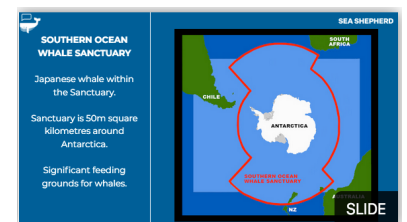


In the North Pacific their permit was for a quota of 500 whales, 340 Minke, 50 Bryde's whales, 100 endangered Sei whales and 10 Sperm whales. Under the permit they are required to sell the whale meat, as nothing must go to waste.

Slide 23 South Ocean Whale Sanctuary

Japan's Antarctic whaling took place in the Southern Ocean Whale Sanctuary, which was established by the International Whaling Commission in 1994.

The Sanctuary is a 50 million km² area surrounding Antarctica. The area is a significant feeding ground for many species of whale. Many migrate there with their new born calves during summer to fatten them up by feeding on krill.



Slide 24 Question

Ask students to complete their answers to the following question using the www.LessonUp.app or discuss in classroom.

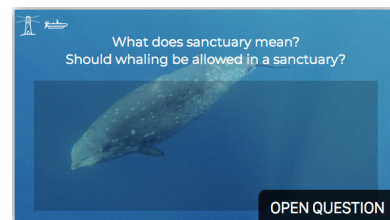
“What does the word sanctuary mean?”

Follow up “Do you think whaling should be allowed in a sanctuary?”

Sanctuary is defined as:

- a refuge, a safe place.
- a place free from harm.
- a place or area where wildlife is protected from predators and from being destroyed or hunted by human beings.

The Sanctuary is recognised by most as a necessity to allow whale populations to recover, which can only be done by allowing them to breed and raise their young. In this Sanctuary they should be free from human exploitation.

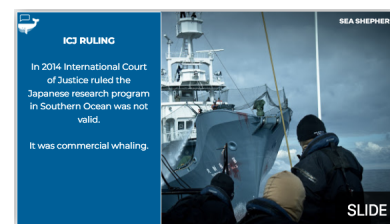


Slide 25 International Court of Justice (ICJ)

In 2010 the Australian Government, with the support of New Zealand, lodged an action with the International Court of Justice against the Japanese whaling program in Antarctica.

They argued that Japanese whaling was a commercial whaling operation in breach of the IWC ban, not a research program. The ICJ finally ruled on the case in March 2014 and their ruling was that the Japn II research program was in fact a commercial operation and therefore in breach of the International Whaling Commission moratorium on whaling.

The ICJ didn't hear evidence about the Japn II program (North Pacific).



Slide 26 Japanese Whaling

Following the ruling the Japanese whalers applied for a new research permit to conduct lethal research on 333 Minke whales, but this was denied by the IWC.

Even though the Japanese research program, including a self-given quota of 333 Minke whales, had not been approved by the IWC, the Japanese whaling fleet returned to the Antarctic waters in 2015 and 2016 to illegally kill whales.

In 2019 Japan announced they would cease whaling in Antarctica. One of the main reasons was their factory whaling ship needed to be replaced and it was too expensive to do so.

They now only continue their commercial whaling activities in their own waters in the North Pacific.



Slide 27 Question

Ask students to complete their answers to the following question using the www.LessonUp.app or discuss in classroom.

“Why do you think a country would continue whaling, even though the targeted species is endangered?”

Answer

Japanese government officials have indicated a strong desire to continue whaling, as they believe that it is their culture and tradition to whale and eat whale meat. In reality only 1 - 2 % of percent of the Japanese population actually eat whale meat.

Whale meat also can contain high levels of mercury, making it toxic and dangerous for human consumption.



Slide 28 Illegal Commercial Whaling - Iceland

There are two other countries that have continued commercial whaling – Iceland and Norway

Iceland refused to accept the ban on commercial whaling and continues to whale and sell whale meat to Japan. Between 2006 and 2016 around 600 whales, including 300 endangered Fin whales, were killed.



Today Iceland has limited markets other than Japan to sell the meat to and an increasing number of people in Iceland now understand and support the ban on whaling. Less than 3% of the population purchase whale meat on a regular basis, but it is still served to tourists in restaurants.

In 2018 around 146 Fin whales and 6 Minke whales were caught. No licenses for whaling were issued in 2019 and 2020.

Slide 29 Illegal Commercial Whaling - Norway

Norway does not believe that the ban on commercial whaling can be imposed on their government. Norway sets their own quota and continue to whale commercially. Their annual quota is over 1,000 whales.

They have not taken the number of the full quota, indicating that either the Minke whale population in the North Atlantic is in trouble or they have no market for the whale meat.

Since the ban in 1985 they have taken over 10,500 Minke whales. Most of the whale meat is sold in the local market but interest in whale meat is declining and there are limited markets to sell it overseas.



Slide 30 Question

Ask students to complete their answers to the following question using the www.LessonUp.app or discuss in classroom.

“Why would Norway have trouble selling the whale meat?”

Answers:

- Firstly there is the CITES ban on the trade and sale of whale meat, so you need a country willing to participate in this illegal trade.
- Secondly no other than Japan wants to buy whale meat – so there is only one country. Norway has found new markets for the whale meat and sells it to the factory fur farm industry.



Slide 31 Question

Ask students to complete their answers to the following question using the www.LessonUp.app or discuss in classroom.

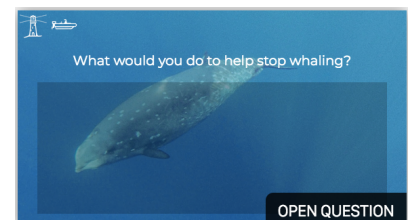
“Name six countries that still continue whaling?”



Slide 32 Question

Ask students to complete their answers to the following question using the www.LessonUp.app or discuss in classroom.

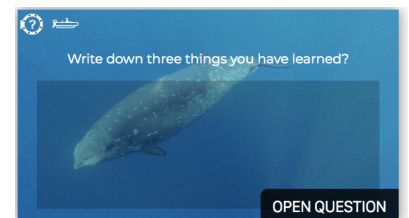
“What would you do to help stop whaling?”



Slide 33 What did you learn?

Ask students to answer the following question using www.LessonUp.app or discuss in the classroom.

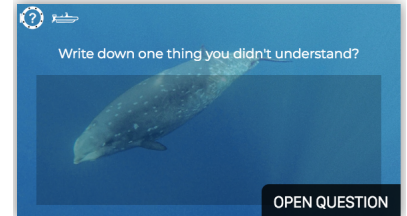
“Write down three things you have learned?”



Slide 34 What don't you understand?

Ask students to answer the following question using www.LessonUp.app or discuss in the classroom.

“Write down one thing you didn't understand?”



Slide 35 Sea Shepherd Case Studies

To enhance learning on this topic take a look at Sea Shepherd's case study, which provide first hand insights into whaling in the Antarctic and the hard battle fought to stop Japanese whaling in the Southern Ocean Whale Sanctuary.



Slide 36 Close



Case Study Options

Case Study – Whale Defense (Antarctica)

Key Definitions

IUU – Illegal Unreported and Unregulated Fishing

Illegal fishing - means that the fishermen enter the territorial waters of a country or regulated marine zone without permission or without a license for the fish they intend to catch.

CITES – Convention for International Trade on Endangered Species.

Commercial whaling - is the capture of whales for the sale of its meat and by-products for profit, usually in substantial numbers.

Ecosystem - a biological community of interacting organisms and their physical environment.

Endangered - the survival of the species is threatened, seriously at risk of extinction.

Extinction - the state or process of being or becoming extinct. No longer existence.

Indigenous – people who originate or are native to that area, also referred to as First Nations people.

Indigenous whaling - *'Aboriginal/subsistence whaling means whaling, for purposes of local aboriginal consumption, carried out by or on behalf of aboriginals, indigenous or native peoples who share strong community, social and cultural ties related to a continuing traditional dependence on whaling and on the use of whales. Local aboriginal consumption means the traditional uses of whale products by local aboriginal, indigenous or native communities in meeting their nutritional, subsistence and cultural requirements. The term includes trade in items which are by-products of subsistence catches'*

ICJ – International Court of Justice.

IWC – International Whaling Commission.

Poaching - illegally hunt or catch (marine mammals or fish) that is not one's own or in contravention of official protection.

Sanctuary - is defined as:

- a refuge, a safe place.
- a place free from harm.
- a place or area where wildlife is protected from predators and from being destroyed or hunted by human beings.

Special permit whaling - to kill, take and treat whales for scientific research.

Subsistence - the action or fact of maintaining or supporting oneself, especially at a minimal level.

YOUR FEEDBACK

We value your feedback and would be pleased to hear your thoughts about this lesson and activities. Any comments, suggestions or requests for further information can be sent to education@seashepherdglobal.org.