

Coral explorer



Age 7-11



60 minutes

Curriculum links

- Study the ocean as a comparative habitat
- Learn how professional scientists work

Resources



Slideshow 1:
Coral explorer



Student Sheet 1a:
Video reflection

Student Sheet 1b:
Dive signs

Student Sheet 1c:
Dive log



Activity:
Dive signs

Activity:
Animal dive signs



Video:
Setting Sail



Gallery:
Dive signs



Map:
Agincourt Reef Google Maps



Subject Update:
Learn more: How many oceans are there?

Subject Update:
About: XL Catlin Seaview Survey

Subject Update:
How to: Use Google Street View Oceans

Lesson overview

This lesson introduces students to the wonders of the coral reef and the adventures of the XL Catlin Seaview Survey. In this first lesson, students will embark on their journey to become coral explorers, finding out where coral reefs can be found, and learning from the experiences of scientists and the expedition team. They will then take part in their first virtual dive. This lesson provides the platform for further scientific discovery through the rest of the unit.

Lesson steps

- 1. Setting Sail (10 minutes)**
Students watch the Setting Sail video and reflect on what it might be like to explore the coral reef.
- 2. Our amazing ocean (10 minutes)**
Students take an ocean quiz to see how much they know about the world's ocean and build an understanding of its importance.
- 3. Dive signs dance (20 minutes)**
Students learn the common dive signs used by scientists to communicate underwater and combine these into a memorable dance (and song).
- 4. Virtual dive (10mins)**
Students apply their knowledge of dive signs to navigate around a virtual dive on one of the most famous dive sites on the Great Barrier Reef.
- 5. Dive log (10mins)**
Students reflect on their experiences of exploring the Great Barrier Reef by completing their dive logs and their first step to becoming a coral explorer.

Learning outcomes

- Consider what it would be like to be a coral explorer
- List important facts about the oceans
- Use dance (and song) to remember the common dive signs used by scientists
- Identify the main features of the coral habitat
- Reflect on the wonders of the coral reef

Step Guidance

Resources

1
10
mins



Step 1 introduces students to the world of coral exploration using a video reflection activity. The Setting Sail video is one of eight videos charting the work of the science team exploring the coral reef.

- Use the slideshow to set up the lesson, including the learning objectives.
- Show students the Setting sail video, explaining that they will be learning about scientists and their work exploring the coral reef over the next lessons. Students do not need to take notes on first viewing.
- Hand out a copy of Student Sheet 1a individually, in pairs or small groups depending on the set up of your class.
- Ask students to complete as much of the Video reflection sheet as they can.
- Watch the video again, asking students to complete more of the Video reflection questions.
- Conduct a review as a whole class discussion.

Slideshow 1:
Slides 1-3

Student Sheet 1a:
Video reflection

Video:
Setting sail

2
10
mins



Step 2 brings the learning out to the context of the whole ocean. This is useful, especially if this is the first ocean focused lesson you have taught with your class.

- Using the slideshow, have all your student stand up. Show the first ocean quiz question and ask students to point or move to the left or right depending on whether they think the real answer is more or less than the figure on screen.
- Reveal the answer on the next slide. There is an opportunity to debrief any surprises or misunderstandings after each question.
- Repeat this process for all the questions in the oceans quiz.
- Slides at the end of the quiz can be used to reinforce ocean literacy, including the number of oceans, the diversity of ocean habitats, the location of coral reefs and the Great Barrier Reef.

Slideshow 1:
Slides 4-20

Subject Update:
Learn more: How many oceans are there?

3
20
mins



Step 3 is a fun activity to set up the feeling of becoming a coral explorer. Students will learn the basic dive signs used by scientists exploring the coral reef, demonstrating their learning by creating a memorable dance (and song).

- Introduce the expedition using the slides
- Show the dive signs video on the linked Activity page.
- Remind students that they will be using these signs to navigate around a virtual coral reef later in this lesson.

Slideshow 1:
Slides 21-25

Activity:
Dive signs game

Student Sheet 1b:
Dive signs

Gallery:
Dive signs

Activity:
Animals dive signs

Step Guidance

Resources

- Students work in groups looking at the dive signs on the Student Sheet 1b or in the gallery and come up with their own dance (and song) to help remember these.
- Allow enough time for student groups to come to the front to demonstrate their learning and dances.



There is an additional activity that could be set for home learning to come up with some dive signs for different animals on the reef. Both this and a version of the dive signs activity are suitable for family learning and can be used to engage parents and carers in students' classroom learning.

Subject Update:

About: XL Catlin Seaview Survey

4
10
mins



Step 4 sees the whole class practise their dive signs as well as explore the coral habitat using a virtual dive.

- Visit the 360 tour of Agincourt Reef, part of the Great Barrier Reef. If this is the first time you have used Google Street View in a classroom context, see the additional information in the Subject Update.
- Conduct a virtual dive, reminding students that they cannot speak they can only use dive signs to communicate with you.
- Remind students that they do not need to hold their breath during this activity!
- You may ask students if they are ok, to go down, to slow down, or go right or left.
- Towards the end of the dive you will want to tell students that it's time to head back and to ascend.

Slideshow 1:

Slide 26

Diagram:

Agincourt Reef Google Maps

Subject Update:

How to: Use Google Street View Oceans

5
10
mins



Step 5 uses the format of a dive log for students to reflect on their learning.

- Hand out copies of the dive log to each student and use the questions on the slideshow to guide their reflection.
- These questions can be adapted to the ability of your class.
- Consider conducting a plenary discussion focused on words that students would use to describe the coral habitat.

Slideshow 1:

Slide 27

Student Sheet 1c:

Dive log