

IN THE DARK OF THE OCEAN

A shark glows bright green through the filters of David's camera.

There are incredible creatures living in the darkness.

In the darkness before dawn, marine biologist David Gruber dives into the ocean to observe the amazing creatures that live there. "Seventy-one percent of Earth is ocean, and much of it is dark, with tons of life down there that we don't know about," he says.

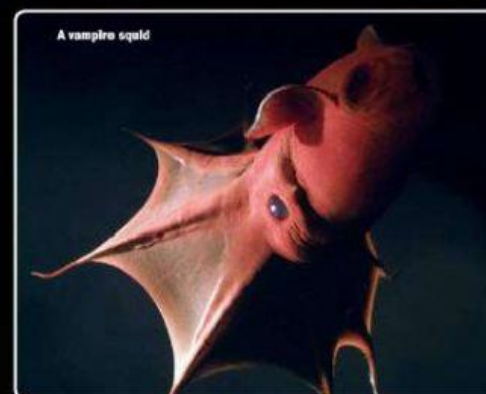
David discovered that many sea animals can see colors in the water that we cannot. So he designed a camera that allows him to see the colors just as a fish does. His camera shows a secret world of neon green, red, and orange colors on ocean life that glows in the dark.

In this fascinating world, David discovered a special kind of shark that glows bright with green spots. "When you see all these little bright spots and patterns, it's like flowers and butterflies. Why do they make patterns? It's to attract each other. It's to recognize each other," he says.

At the bottom of the ocean where there is no light at all, many animals produce their own light. The unusual vampire squid is an example. It can turn itself on or off, just like a lamp. It also has very big eyes to help it see in the dark. In fact, compared to its body size, the vampire squid has the largest eyes of any animal in the world. And this is just one

animal: ninety percent of the animals that live at the bottom of the ocean produce their own light.

It's easy to see why the darkness of the sea fascinates David. "Marine animals in the dark ocean produce lights to communicate with each other," says David. "It's an underwater disco party. We human beings are the last ones to join in!"



A vampire squid

23 Discuss in groups.

1. Decide if the sentences are true or false

a. David observes life in the ocean when it's dark.	TRUE	FALSE
b. We know a lot about everything that lives in the ocean.	TRUE	FALSE
c. We can see all the glowing colors in the ocean with our eyes.	TRUE	FALSE
d. Only one type of animal glows in the dark through the lens of David's camera.	TRUE	FALSE
e. A lot of animals at the bottom of the ocean make their own light.	TRUE	FALSE
f. The vampire squid has very large eyes to help it see in the dark.	TRUE	FALSE

2. Watch the video and choose the correct answer

<https://vimeo.com/219574322/773330cf1d>

1. David first became fascinated by the ocean by _____.
 - a. surfing
 - b. scuba diving
 2. David wondered _____.
 - a. if it would be hard to study biology
 - b. what's beneath him in the water
 3. David wanted to photograph the ocean so that he could _____.
 - a. understand how fish see it
 - b. sell his photos to magazines
 4. David says that _____ the ocean.
 - a. there's still a lot to learn about
 - b. scientists have discovered all of the species of
 5. According to David, the future of exploration is finding out _____.
 - a. how humans fit in among nature
 - b. why humans don't glow
-