

Reading

- 1 **SPEAKING** Look at the photos above. Talk about what you can see. What do you think is the connection between them?
- 2 **SPEAKING** Look at questions 1 to 5. What answers could you give to the questions?
 - 1 Are sea levels getting higher or is it just fake news?
 - 2 What can we do to prepare ourselves and our cities for rising sea levels?
 - 3 What's causing sea levels to rise?
 - 4 Can we still stop sea level rise by reducing carbon emissions?
 - 5 What are the consequences of sea level rise for us?
- 3 Read the text. Match each question (1–5) in 2 to its answer (A–E). Were any of your answers in 2 similar to the answers in the text?
- 4 **46** Choose the correct alternative. Write the letter of the paragraph where you found the answer.
 - 1 Melting ice caps are now more/less responsible for rising sea levels than in the past. Paragraph: _____
 - 2 There is evidence of the sea level rising because there have been a lot more/one or two big floods in recent years. Paragraph: _____
 - 3 It seems obvious that by reducing carbon emissions we can/can't completely stop the problem of rising sea levels. Paragraph: _____
 - 4 About 275 million people live in coastal areas/the ten biggest cities in the world. Paragraph: _____
 - 5 There are just one or two important/a variety of different ways we can beat the problem of rising sea levels. Paragraph: _____
- 5 What do the underlined words and phrases in the text mean? Guess and then check in your dictionary.

Reach higher

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UNDERSTANDING CLIMATE CHANGE

Sea Level Rise: you ask, the experts answer

A According to the US-based National Oceanic and Atmospheric Administration (NOAA), the global sea level in 2016 was 82 mm higher than the 1983 annual average. The NOAA believes that the global sea level will probably rise between 0.2 metres and 2 metres by 2100. Their statistics also show that in many places along the US coast, flooding is much more frequent than it was 50 years ago.

B Sea levels are rising for two main reasons. Firstly, glaciers and ice caps are melting and adding water to the ocean. And this is going to happen faster as global temperatures get higher. Over the last ten years, NOAA statistics show that the amount of sea level rise caused by melting has increased dramatically and is now the main factor in rising sea levels. Secondly, the water in the oceans is getting warmer and that means that it expands and takes up more space, increasing the volume of water in the sea.

C One big problem is that at least 275 million people live in areas which are going to be at risk from rising sea levels. Eight out of the world's ten largest cities are near a coast according to the UN *Atlas of the Oceans*. In Europe, London, Barcelona, Dublin and Venice are some of the cities that may face problems. Experts predict that millions of people will need to move away from their homes in the future.

D The tenth anniversary of the Paris Agreement to combat climate change and reduce carbon emissions will be in 2025. There are experts who are optimistic that lower carbon emissions will help to reduce the speed of rising sea levels. However, it is clear that we will need to spend money on other ways to protect these coastal areas because rising sea levels will still continue to cause problems.

E In the Netherlands, where flooding has always been a problem, engineers and architects are always coming up with different solutions, big and small. One is the building of floating homes. When the water rises, your home will rise, too. Other countries have decided they're going to think about building similar homes. Perhaps the biggest solution is the giant sea gate in Rotterdam that protects the port. A computer controls this gate and it closes automatically when there is danger of flooding. Each of the two parts of the gate is as big as the Eiffel Tower! But will engineers build similar gates to protect other cities?

'Climate Change: Global Sea Level', Rebecca Lindsey, NOAA Climate.gov, 2019.

6 Critical thinkers

In your opinion, how and how much does the question of sea level rise affect the place where you live?

What makes you say that?

Give examples from the text and other information to justify your opinion. Then share your ideas.