

In The News

Current Events in Earth & Space Science

Summaries for the Classroom

Fast Rising Sea Level on U.S. East Coast

Sea-level rise is projected to rise twice as much in the northeast United States than along the coast of the rest of the nation and roughly three to four times faster than the global average.

Articles to Share with Students

- National Geographic News Sea Levels Rising Fast on U.S. East Coast http://news.nationalgeographic.com/news/2012/06/120625-sea-level-rise-east-coast-us-science-nature-climate-change/
- National Geographic News New York, Boston "Directly in Path" of Sea Level Rise http://news.nationalgeographic.com/news/2009/05/090528-greenland-melt.html
- National Geographic News New York Seas to Rise Twice as Much as Rest of U.S. http://news.nationalgeographic.com/news/2009/03/090315-new-york-sea-level.html
- New York Times Environment East Coast National Parks at Risk From Sea Level's Rise http://green.blogs.nytimes.com/2012/08/30/east-coast-national-parks-at-risk-from-sea-levels-rise/
- NPR AUDIO: A Tale of Two Coastlines, Skirted by Swelling Seas http://www.npr.org/2012/06/29/155992716/a-tale-of-two-coastlines-skirted-by-swelling-seas
- CBS VIDEO: Fast-rising sea levels hit Atlantic coast hardest http://www.cbsnews.com/8301-18563_162-57464122/fast-rising-sea-levels-hit-atlantic-coast-hardest/

General Information

Resource: The Encyclopedia of Earth – Sea Level Rise and Coastal Flooding Impacts Viewer http://www.eoearth.org/resources/view/178389/?topic=54291

NOAA's State of the Coast – Vulnerability of Our Nation's Coasts to Sea Level Rise http://stateofthecoast.noaa.gov/vulnerability/welcome.html

SERC EarthLabs: Future of the Cryosphere, Part A: Sea Level Rise http://serc.carleton.edu/eslabs/cryosphere/7a.html

Questions for Classroom Discussion

- Explore sea-level change over time (geologic time and recent time).
- What causes changes in sea level?
- Why is the coastal region of the eastern United States being impacted more than the rest of the United States coastline?
- What data do scientists use to model sea-level rise?
- Can we as humans stop or slow down sea-level change? What are your thoughts?
- National parks are protected lands. With the rise of sea level, should national parks on the east coast still be protected? What would be the benefits? The costs?
- Do you think humans should "stay put" on the east coast, or pack up and move?
 Why/why not?
- Is this rapid sea-level rise because of natural causes, human activity, or a combination of both? What is your evidence to support your point of view? What other evidence would you like to further support your ideas?

Tags

Sea-Level Rise

Big Ideas

From the Earth Science Literacy Principles

- Big Idea 1. Earth scientists use repeatable observations and testable ideas to understand and explain our planet. (1.1, 1.2, 1.3, 1.5, 1.6, 1.7)
- Big Idea 3. Earth is a complex system of interacting rock, water, air, and life. (3.4)
- Big Idea 9. Humans significantly alter the Earth. (9.1)

From The Big Ideas in Earth and Space Science (ESBD)

- The Earth System (1)
- The Nature of Science (21, 22, 24)