

Opening Statement  
**Chairwoman Eddie Bernice Johnson**  
House Committee on Science, Space, and Technology  
Environment Subcommittee Hearing

*Sea Change: Impacts of Climate Change on Our Oceans and Coasts*  
February 27, 2019

Thank you Madam Chair, and I would also like to join you in welcoming our witnesses this morning.

Two weeks ago we had our first climate change related hearing on the “*State of Climate Science and Why It Matters*.” That fruitful hearing was a broad overview of the myriad ways climate change is affecting multiple aspects of the environment and our society. Today, we continue in that same vein and look specifically at the science of how anthropogenic carbon emissions are affecting our oceans and coasts.

NOAA has found that almost 40 percent of the U.S. population lives in coastal counties. From the white sand beaches of Florida to the rocky shorelines of the Pacific Northwest, our coasts are not only iconic, popular tourist destinations, but also economic powerhouses of the nation. Coastal counties contribute \$6.6 trillion to our economy. Given the clear societal and economic importance of our oceans and coastal communities, it is imperative we work to protect these resources.

But, our coastal communities are already seeing impacts of climate change. Ocean warming due to anthropogenic carbon dioxide emissions is responsible for rising sea levels, melting sea ice, and lower oxygen concentrations in our seawater. Warmer ocean temperatures also fuel stronger storms, which can lead to additional coastal damage from hurricanes. The findings from the Fourth National Climate Assessment were very clear; cutting our emissions of greenhouse gasses will significantly and quickly help stave off the most severe potential impacts of climate change. Laying the foundation of the current state of science on our oceans and coasts in this hearing will help us better understand what we can expect to see if we do not act to mitigate our carbon emissions now.

During that first hearing, many of my colleagues on both sides of the aisle were excited to discuss potential solutions to the climate challenges that many of us are starting to face in our districts. However, in order to come up with robust solutions to the rapid changes we are seeing in our oceans and coastal communities, it is crucial that we understand what is driving these changes. Successful mitigation and adaptation solutions will be based on robust science.

I am looking forward to having another productive hearing on climate change today. And I am especially interested in receiving testimony from our expert scientific witnesses on how climate change is affecting sea level rise, the physical and chemical processes within our oceans, and marine ecosystems. I am also glad to have a representative from Pacific Coast Shellfish Growers Association to speak about concrete evidence of climate change impacts on their livelihoods, and how they utilized science to develop solutions to this pressing issue.

The diverse perspectives provided by our witnesses will help guide the Members of this Committee as we work to develop bipartisan policy solutions to address climate change and ocean acidification based on sound science and ensure there is sufficient federal funding for climate research.

Thank you, and I yield back.