Rising sea waters threaten NC's delicate coastline

WRAL January 16, 2011

MANNS HARBOR, N.C. —North Carolina officials watching an ever-encroaching ocean on the state's delicate coastline are planning for a wetter future.

The Charlotte Observer reported Sunday that a North Carolina science panel is predicting the sea level will rise by 1 meter by 2100.

That means about 2,000 square miles of coastline that is a meter or less above water is at risk. On that land is some of the state's most expensive real estate that economists say is worth a total of almost \$7 billion.

Some warn that higher sea levels will make coastal storms more devastating.

Ocean encroachment has already had a visible effect the coast when the iconic Cape Hatteras Lighthouse was moved away from the Atlantic in 1999 because of an 8-inch rise in sea levels.

"Sea-level rise is happening now," said geologist Rob Young of Western Carolina University, who studies developed shorelines. "This is not a projection of something that will happen in the future if climate continues to change."

State planners are working on detailed maps of future high-water lines to better prepare for moving people and buildings landward.

"To me, it's the big planning problem for this century," said Scott Shuford, planning director in Onslow County, on the southern coast. "There's an element of urgency about it, but at the same time a recognition that it can't be solved easily."

The North Carolina Division of Coastal Management is working on the state's first policy on sea-level rise that could guide regulations about development along the coast — everything from boat ramps to bridges and buildings.

The concern about rising sea levels was seen when U.S. Highway 64 across the Albemarle-Pamlico Peninsula was widened. The road bed was raised by a foot to allow for rising seas.

"What we're trying to do is get away from the hype and just look at the data," said state transportation engineer Ted Devens, who helped design the U.S. 64 project. "Our data tells us sea level is rising."

The question, Devens said, is how much.

That's what state planners are trying to figure out and when exactly things like water and sewer lines, roads, industries will have to be moved inland.

"Do you move those things now or do you wait? It gets to be an interesting chicken-andegg question," said study leader John Dorman of the state flood-plain mapping program.

Coastal geologist Young said state officials could start now by stopping the policy of allowing beach communities to rebuild on the water time and time again after hurricanes do significant damage.

He points out that North Carolina's coast doesn't have a major city that would be threatened by rising sea levels like Miami or New York City — places that likely would get priority for funding.

"If we have to fix Manhattan," Young said, "Hatteras is not going to compete for money real well."