

New Orleans: Loss of wetlands opens floodgates to disaster

By David Usborne Independent 01 September 2005

The worst has happened in New Orleans and not everyone is surprised. For years, specialists have warned that the city, built partly below sea level and in an area of radically depleted wetlands, was a natural disaster waiting to happen. And when it did, they said, we would have no one to blame but ourselves.

That the Crescent City is where it is does not make sense in the first place. But the first European settlers, in 1718, made the same calculation that generations have made ever since. The site was right for commerce, and commerce means dollars. In the battle between dollars and nature, you know who wins.

What has happened in recent decades has made matters worse. Not just in New Orleans but all along the Gulf Coast, human encroachment has accelerated without pause. This has meant taming natural water flows - including the gradual straightening of the Mississippi itself - and draining wetlands.

Among those lamenting past mistakes is John Barry, the author of *Rising Tide*, a book about the Mississippi flood of 1927. "People have said for a long time that we can't continue to do the things we're doing, but the reality is that we don't take natural disasters seriously until they happen," he said.

Arguments are already breaking out over the connection between global warming and Katrina. Most agree the rising sea levels and temperatures may have contributed to the damage it caused. But many scientists say the real problem is what has been wrought on the ground in the Gulf Coast region itself. And most serious of all may be the loss of the wetlands. Wetlands, along the edges of rivers and near the coast itself, are vital for absorbing and storing floodwaters. As such, they provided New Orleans with a natural defence against storm surges such as the one generated by Katrina.

But, according to the US Geological Survey, Louisiana has lost 1,900 square miles of wetland in the past seven decades - an area larger than the state of Rhode Island.

The draining of the wetlands to make way for roads, malls, beach communities, marinas and condominiums has also meant shrinkage of the shoreline. Louisiana, in fact, loses 25 square miles of coast every year.

General Robert Flowers, the head of the Corps of Engineers until last year, is concerned by the loss of a "natural storm protection", along Louisiana's coast. "With that loss of wetlands ... we had to build hurricane protection. I think a longer-term solution that replenishes Louisiana's wetlands will better serve us."

It was to protect the city from hurricanes and disastrous floods that the levees and dams have been built. There are thousands of miles of them along the river. They usually do a fine job.

Except there is a bad side-effect. The millions of tons of silt that flow down the Mississippi would once be deposited all along its edges and in the flood plains when it broke its banks. Those deposits that once replenished the Delta region are now missing and the Delta, along with New Orleans, is sinking. Barrier islands that protected the city are shrinking for the same reason.

More people live in hurricane territory than ever before. More people to be hurt and more property to be damaged. Professor Kerry Emanuel of the Massachusetts Institute of Technology said: "We have to put stuff in harm's way for there to be a disaster, and we're good at doing that."