Virus deadly to dolphin hits lagoon

Jim Waymer, FLORIDA TODAY 9:23 p.m. EDT August 29, 2014



(Photo: FLORIDA TODAY file photo)

A virus killing bottlenose dolphins by the hundreds along the Atlantic seaboard has spread to the Indian River Lagoon, with foreboding consequences for dolphins that spend their lives here.

And the dead just keep washing up.

"We're basically on high alert, expecting a dolphin every day," said Megan Stolen, a research scientist at Hubbs-SeaWorld Research Institute.

In August alone, Hubbs researchers found 18 dead bottlenose dolphins: a dozen from the lagoon (eight of them calves), and the others along the beach and in the Halifax River.

On average, 26 dolphins wash up dead or strand in the lagoon region annually, Hubbs researchers say. Including beachside, about 70 dolphins die per year in the lagoon region. This year, 67 have already died, with 32 of those in the lagoon.

And many more may be on the way.



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(http://www.floridatoday.com/videos/news/politics/2014/08/29/14821361/?from=global&sessionKey=&autologin=)

"Because we have this sort of smoking gun right now, that's where all of where our attention is going," Stolen said.

Past surveys by Hubbs have counted about 660 bottlenose dolphins that spend their lives almost exclusively in the lagoon.

Researchers have recently been finding dead mothers, and then days or weeks later, their orphaned calves.

On Thursday, Hubbs responded to a dead calf being pushed by its mom at the Port St. John boat ramp.



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Tests are pending, but dolphins in the lagoon are showing telltale signs of morbillivirus — skin and oral lesions. The dolphins also can appear skinny, swim erratically, and make sounds from their blow hole as if they're coughing.

Hubbs is urging anyone who sees a dolphin showing such symptoms to call a state wildlife alert hotline as soon as possible, because fresh samples are key to determining cause of death.

People shouldn't touch the dolphins, Hubbs staff says. Although its called a measles-like virus, humans don't catch morbillivirus, but sick dolphins can carry other diseases.



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The morbillivirus dolphin deaths in the lagoon herald biologists' worst fear: that the virus is again gaining a deadly foothold in the lagoon. That hasn't

http://www.floridatoday.com/story/news/local/environment/2014/08/29/virus-deadly-dolphin-hits-lagoon/...

happened since the 1980s.

"We know that at least some of the animals in the lagoon have been exposed, but this is the first I believe, documented morbillivirus death in that many years," Stolen said.

"I'm hoping that some of the animals that have been exposed in the past will fight it off."

As the top mammal predator, bottlenose dolphins are sentinels of the lagoon's overall health, biologists say, and our well being as well.



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Is Indian River Lagoon OK for play?

(http://www.floridatoday.com/story/news/local/environment/2014/06/14/indian-river-lagoon-ok-play/10527607/? from=global&sessionKey=&autologin=)

Lagoon dolphins eat some of the same seafood we do. But they've been dying at triple the usual rate, washing up gaunt and with other signs of long-term suffering.

Biologists had already been tracking unusual dolphin deaths in the lagoon. Since Jan. 1 of last year, more than 70 lagoon dolphins died mysteriously, most within Brevard County. Biologists had worried it might be something in their diet.

One common thread: shrimp. Researchers have been finding the crustaceans in the guts of dead dolphins.

But few answers have surfaced since a year ago, when scientists opened a formal federal investigation into the lagoon's unusual dolphin deaths. More than half of similar marine mammal investigations yield no definitive cause. With more tissue tests pending, however, biologists hold out hope that answers will be forthcoming.

A separate bottlenose dolphin die-off last year in the mid-Atlantic prompted NOAA Fisheries to declare another "Unusual Mortality Event." More than 800 dolphins have died or stranded that year in the Atlantic from New York to Virginia. More than nine times the historical average of bottlenose dolphins died or stranded in the mid-Atlantic region in July and August, alone, last year.

NOAA officials said last year that they suspect morbillivirus had killed or stranded the mid-Atlantic dolphins and tests have confirmed that hypothesis.

Initially, the lagoon and mid-Atlantic unusual die-offs were thought to be unrelated. Now biologists aren't so sure.

Federal scientists had hoped when mid-Atlantic dolphins migrated to the lagoon region that lagoon dolphins would be immune.

Studies show some lagoon dolphin have antibodies to morbillivirus, but that hasn't seemed enough to make them immune.

The lagoon has had two other big dolphin die-offs in recent years: 41 dolphins in 2001 and 47 in 2008. What killed them remains a mystery.

About a decade ago, researchers first began discovering more viruses, fungal and bacterial lesions on lagoon bottlenose dolphins, and more conditions that dolphins and humans share, such as hepatitis, meningitis and cancer. Heart murmurs and cancer also began showing up for the first time in the species. Biologists suspect pollution is driving the higher incidence of those conditions.

Hubbs researchers had thought the die-off had tapered off.

"It's so bad," said Wendy Noke Durden, a research scientist with Hubbs. "We were doing good for a long time."

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It is not advisable to handle any sick or dead wildlife, but citizens can report sick, dead or injured wildlife by calling the FWC's Wildlife Alert Hotline at 888-404-3922.

• Learn about the dolphin die offs:

http://www.nmfs.noaa.gov/pr/health/mmume/midatldolphins2013.html (http://www.nmfs.noaa.gov/pr/health/mmume/midatldolphins2013.html)

And here: www.nmfs.noaa.gov/pr/health/mmume/floridadolphins2013.html (http://www.nmfs.noaa.gov/pr/health/mmume/floridadolphins2013.html)

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