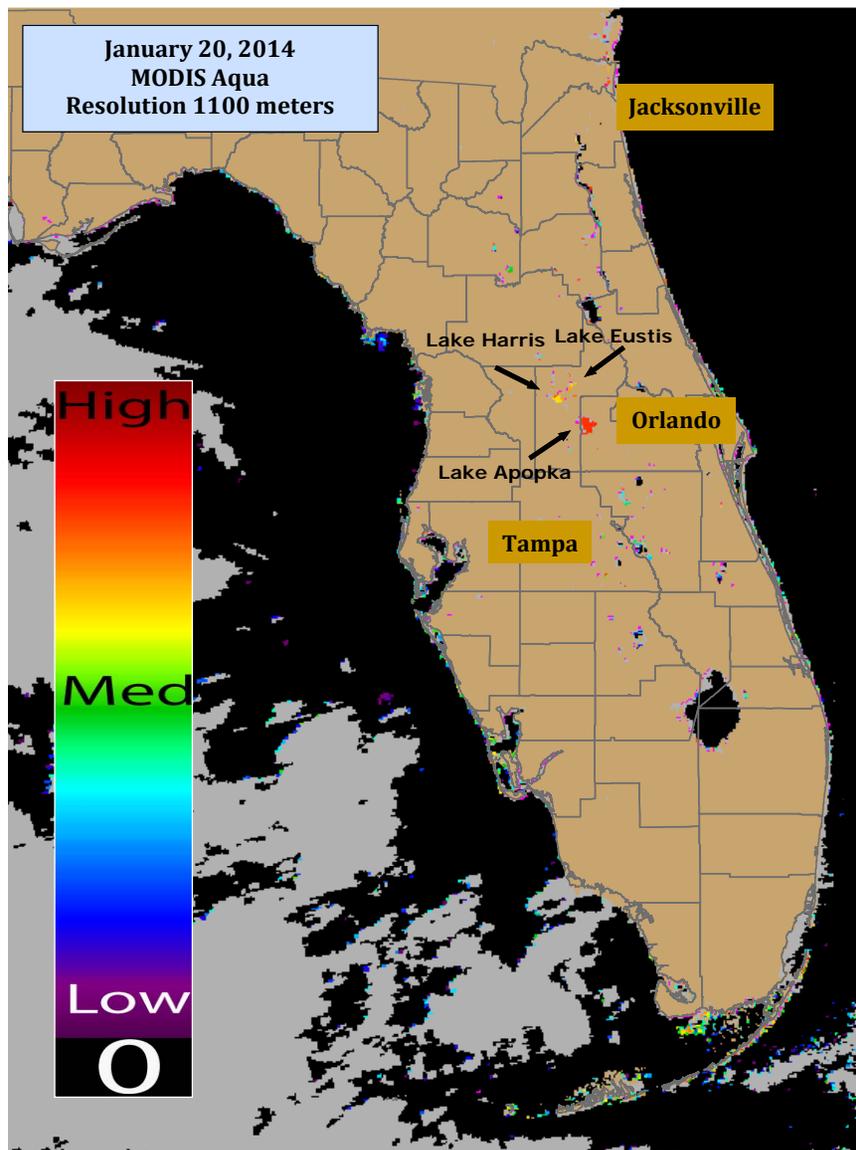


To report an illness related to a freshwater, estuarine, marine toxin or harmful algal bloom, please contact the Florida Poison Information Center at 1-800-222-1222. Images/data obtained from Florida Fish and Wildlife Research Institute, Florida Water Management Districts, National Oceanic and Atmospheric Administration (NOAA), NOAA National Climatic Data Centers and National Weather Centers. Support to produce this report from NOAA/NASA Contract NNH08ZDA001N.



MODIS Images display a chlorophyll-a index generated with a Moderate Resolution Imaging Spectroradiometer provided by the National Aeronautics and Space Administration (NASA)

Very low likelihood of a bloom

May indicate clouds or missing data

Low estimated chlorophyll-a concentrations

Medium estimated chlorophyll-a concentrations

Higher estimated chlorophyll-a concentrations

CyanoHAB Conditions Report

- Lake Apopka (Orange/Lake Counties) displayed a high estimated elevated chlorophyll-a concentration.
- Lake Harris and Lake Eustis (Lake County) displayed medium/high estimated elevated chlorophyll-a concentrations.
- Other large water features in Florida were unremarkable on the 1100 meter resolution MODIS image.

Central Florida wants St. Johns River water



St. Augustine Record, Saturday, Jan. 18, 2014

PALATKA — A coalition of five growing Central Florida counties — Seminole, Lake, Osceola, Polk and Orange — made public a draft plan that proposes to solve their future water needs by pumping 150 million gallons per day from the St. Johns River. The plan, called the Central Florida Water Initiative, comes after years of St. Johns River Water Management District studies to determine potential impacts to the waterway.

The Water Initiative is distinct from the district, though district scientists have worked on the proposal. Hans G. Tanzler III, the district's executive director, introduced the proposals, saying he welcomed "the opportunity to work on solutions to common problems" and that "the facts and law need to be unbiased." "In 1960, Florida had 6 million people. Today, it has 20 million. We have a growing population and [growing] water supply needs," he said, adding, "We have no ability to stop people from coming to Florida. There will be a need for alternatives to groundwater. That's what this is all about."

However, the idea of withdrawing that much water from a river already suffering algae blooms and low flow didn't sit well. Most of the people commenting were from St. Johns CountyThe current St. Johns Riverkeeper, Lisa Rowe Rinaman, said taking that water is "a short-term, unsustainable approach to regional water supply." She pointed to the toxic green algae that blanketed the river from April until Christmas. "It bloomed earlier this year," she said .. She was joined by Karen Ahlers of Putnam County's Environmental Council and Florida Defenders of the Environment. "To us, the district's plan then and now represents a series of horrendous decisions. It failed to give conservation priority and the river has a declined flow, nutrients, nuisance plants and lower production," she said.

See: <http://staugustine.com/news/local-news/2014-01-17/central-florida-wants-st-johns-river-water>

**** Due to background levels of *K. brevis* off Florida's SW coast, status reports for Florida red tide will be suspended until bloom conditions reoccur.**

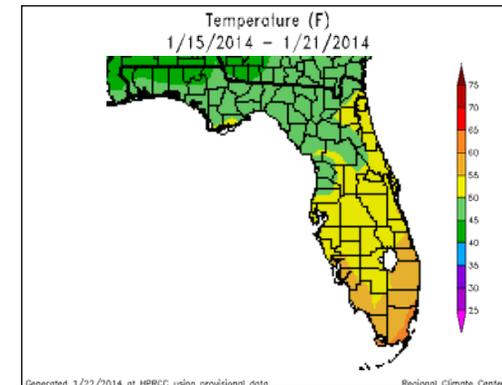
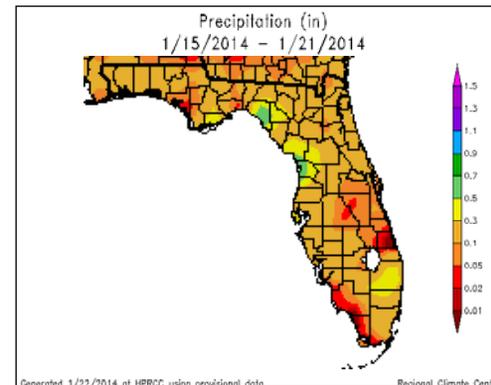
Interpreting Moderate Resolution Imaging Spectroradiometer Data

- The Moderate Resolution Imaging Spectroradiometer (MODIS) is deployed by NASA onboard the Terra (EOS AM) and Aqua (EOS PM) satellite. It passes over the earth, collecting new imagery every 1-2 days.
- This imagery is used as a surveillance tool. Data collected by the MODIS sensor are used to generate a chlorophyll-a index which is used to forecast harmful algal blooms. The results are not specific to any one HABs species and should be followed-up with onsite field observations. Data is only suggestive of a potential HAB event.
- MODIS uses a spectral band which is much coarser than MERIS, therefore only select larger water bodies in FL are visible using this technology.
- MODIS is better at depicting low to medium chlorophyll-a concentrations so once a potential bloom is depicted, a switch in algorithms may be used to improve the visibility. MODIS has a few spectral bands which have higher resolution that are more comparable to MERIS although these bands do not cover all of FL.
- Several environmental factors may affect how results can be interpreted. For example, areas with abundant aquatic vegetation may present with a high Chl-a index resulting in a false positive bloom reading.
- The sensor identifies biomass near the surface (in the upper few feet of water). As a result, it may underestimate the total biomass for blooms that are mixed or dispersed through the water column.
- While patches of red or warm colors may indicate higher chlorophyll-a concentrations, these data have not been verified in most cases using ground-truth methods.

Weather Conditions: Precipitation and Temperature - 01/15/14 to 01/21/14

- Weather conditions can impact the duration and location of blooms and the satellite imagery shown in this report may no longer be relevant.
- Images represent the last image taken with a realization that blooms may have moved, dissipated or intensified.
- Cloud coverage can obscure imagery and create patches or gray areas on map and obscure bloom detection.

January 20, 2014 MODIS Aqua True Color Image



To review HABs satellite reports in the Gulf of Mexico and marine waters visit the NOAA Harmful Algal Bloom Operational Forecast System bulletin archive at:
<http://tidesandcurrents.noaa.gov/hab/bulletins.html>



For Individual Weather Station Data, visit:
<http://www.sercc.com/perspectives>

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