



Gulf of Mexico Harmful Algal Bloom Bulletin

Region: Southwest Florida

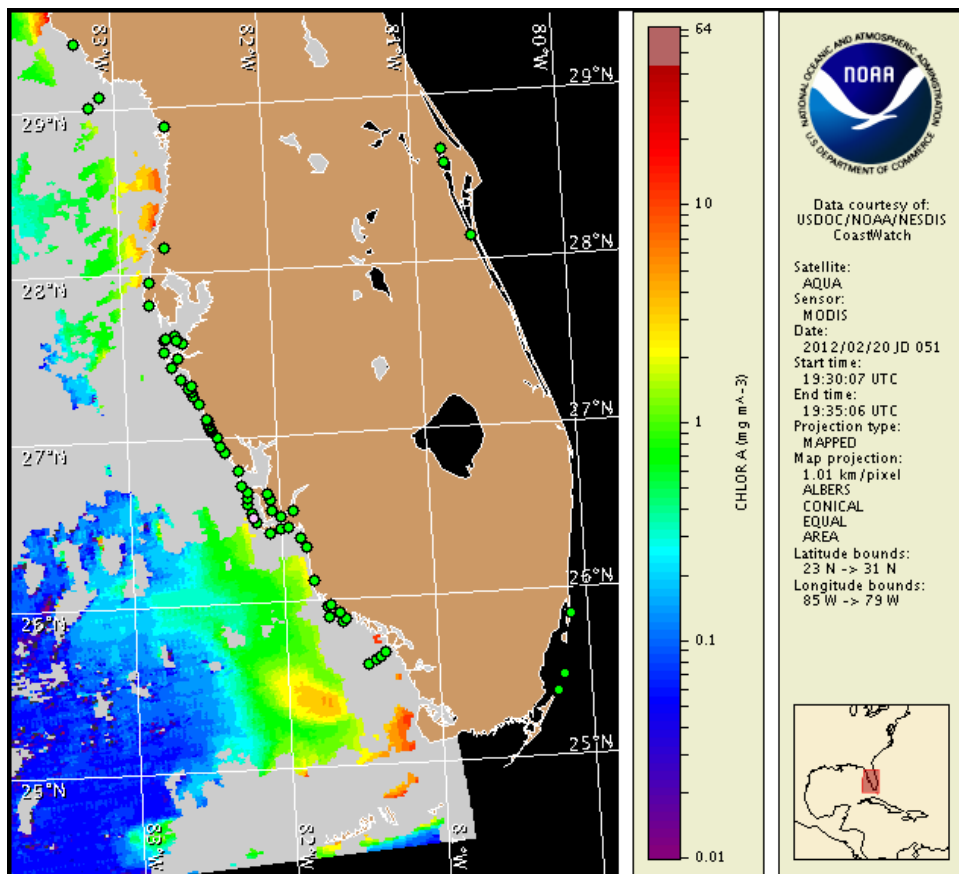
Tuesday, 21 February 2012

NOAA Ocean Service

NOAA Satellite and Information Service

NOAA National Weather Service

Last bulletin: Thursday, February 16, 2012



Satellite chlorophyll image with possible HAB areas shown by red polygon(s). Cell concentration sampling data from February 11 to 16 shown as red (high), orange (medium), yellow (low b), brown (low a), blue (very low b), purple (very low a), pink (present), and green (not present). For a list of cell count data providers and a key to the cell concentration categories, please see the HAB-OFS bulletin guide:

http://tidesandcurrents.noaa.gov/hab/habfs_bulletin_guide.pdf

To see previous bulletins and forecasts for other Harmful Algal Bloom Bulletin regions, visit the NOAA Harmful Algal Bloom Operational Forecast System bulletin archive:

<http://tidesandcurrents.noaa.gov/hab/bulletins.html>

Conditions Report

A patchy harmful algal bloom was last identified offshore in the Gulf side region of the Florida Keys, Monroe County on February 10. No reports of impacts in association with this bloom have been received; however, impacts remain possible in this region. No additional respiratory impacts are expected alongshore southwest Florida today through Wednesday, February 23.

Analysis

Florida Keys: A harmful algal bloom may be present offshore in the Gulf side region of the Lower Florida Keys. No new samples have been reported since last Thursday's bulletin. 'Very low' to 'low a' concentrations of *Karenia brevis* were identified approximately 10 miles north and northwest of Key West (MML, 2/10), and approximately 5-9 miles north and northeast of Harbor Key (MML, 2/8). Other samples collected last week showed *K. brevis* was 'Not Present' (MML, FWRI; 2/6-2/10). Recent MODIS imagery is cloudy, limiting analysis. Forecasted easterly to southeast winds may maintain the location of the bloom and may decrease impacts at the coast of the Lower Keys. Continued sampling is recommended to verify bloom dissipation.

Southwest Florida: There is currently no indication of a harmful algal bloom present at the coast in southwest Florida. Recent samples collected showed *K. brevis* was 'Not Present' in Lee County (FWRI, 2/15). Additional sample information can be obtained through FWRI at <http://myfwc.com/research/redtide/events/status/statewide/>.

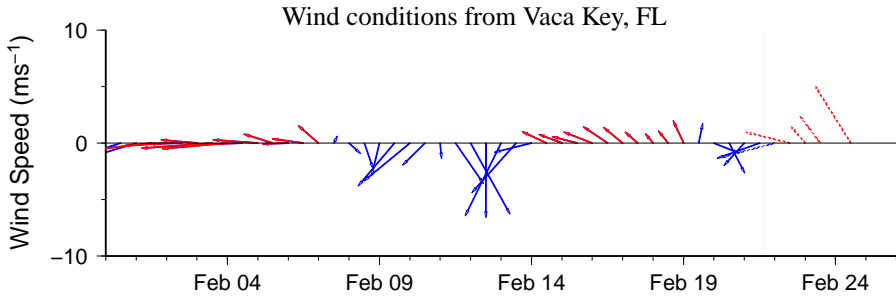
Recent MODIS imagery shows a slightly elevated chlorophyll feature ($\sim 2 \mu\text{g/L}$) that may contain *K. brevis* remains visible approximately 35 miles southwest of Cape Romano. Forecasted easterly to southeast winds may maintain the location of the elevated chlorophyll patch offshore of Cape Romano through Wednesday. Bloom formation at the coast is unlikely.

~Fenstermacher, Derner

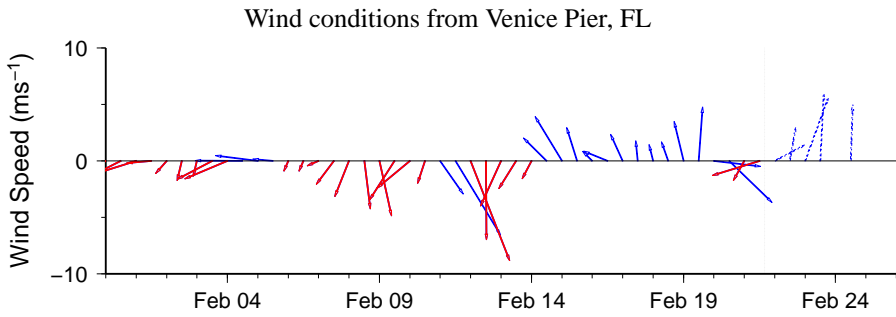
Wind Analysis

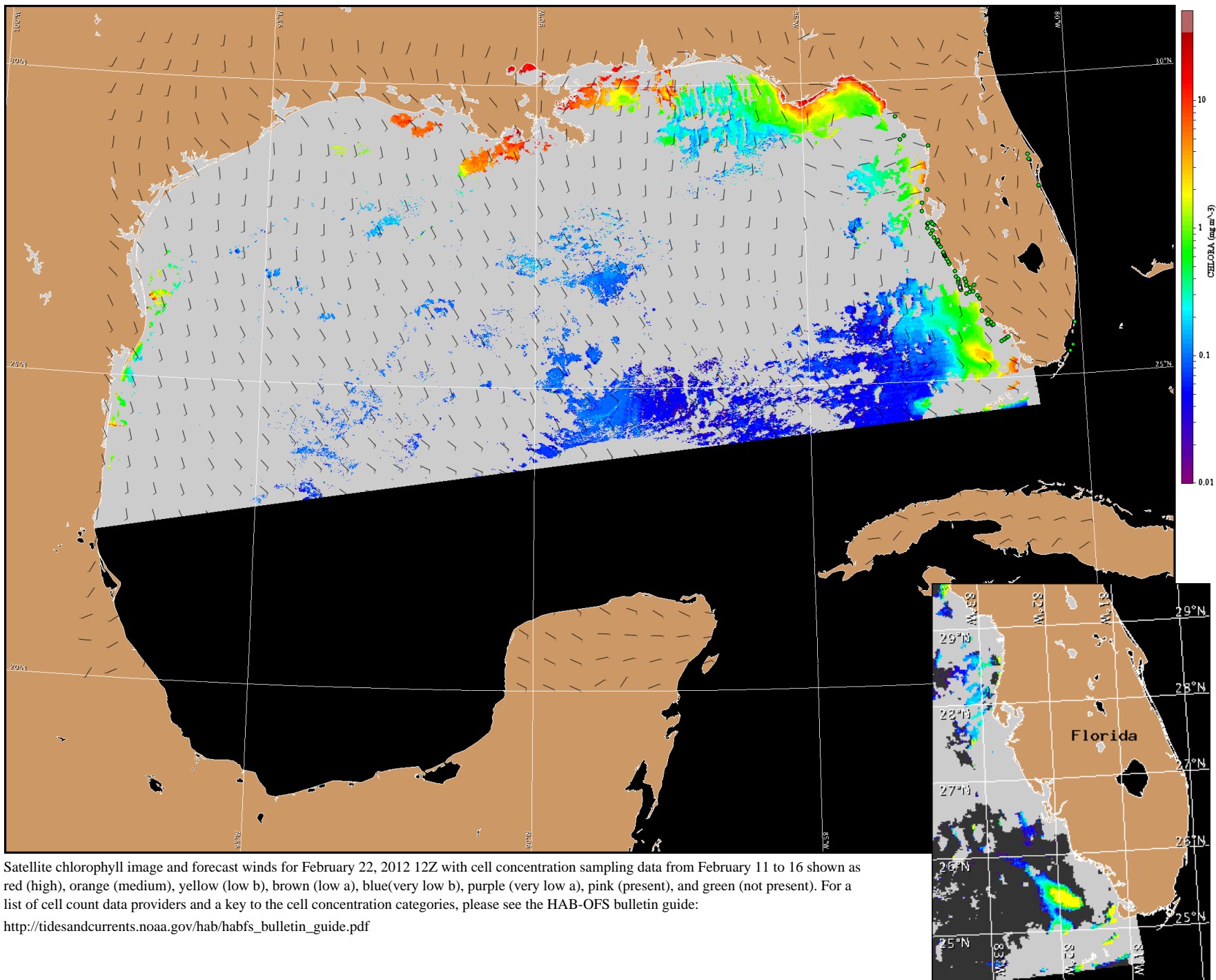
FL Keys: east winds to southeast winds today through Wednesday (10-15 kn; 5-8 m/s).

SWFL: Variable winds today and southeast to southwest winds on Wednesday (10-15 kn).



Wind speed and direction are averaged over 12 hours from buoy measurements. Length of line indicates speed; angle indicates direction. Red indicates that the wind direction favors upwelling near the coast. Values to the left of the dotted vertical line are measured values; values to the right are forecasts. Wind observation and forecast data provided by NOAA's National Weather Service (NWS).





Satellite chlorophyll image and forecast winds for February 22, 2012 12Z with cell concentration sampling data from February 11 to 16 shown as red (high), orange (medium), yellow (low b), brown (low a), blue(very low b), purple (very low a), pink (present), and green(not present). For a list of cell count data providers and a key to the cell concentration categories, please see the HAB-OFS bulletin guide:

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Verified and suspected HAB areas shown in red. Other areas of high chlorophyll concentration shown in yellow (see p. 1 analysis for interpretation).