



Gulf of Mexico Harmful Algal Bloom Bulletin

Region: Southwest Florida

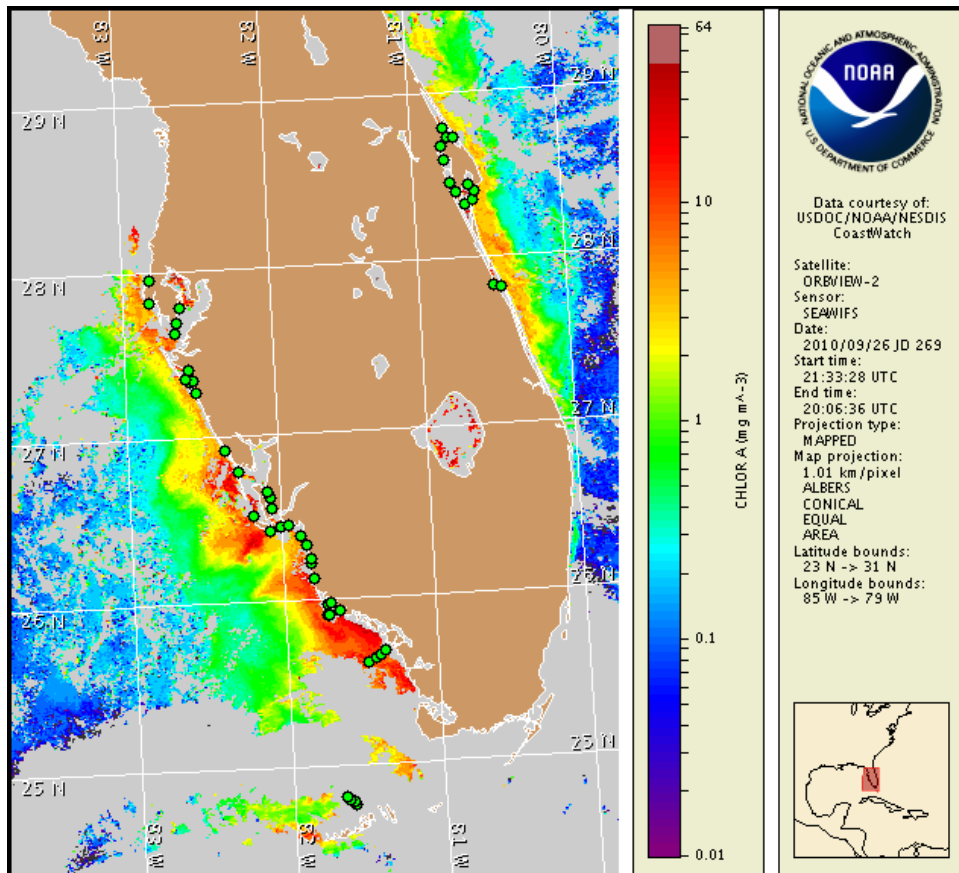
28 September 2010

NOAA Ocean Service

NOAA Satellites and Information Service

NOAA National Weather Service

Last bulletin: September 20, 2010



Satellite chlorophyll image with possible HAB areas shown by red polygon(s). Cell concentration sampling data from September 19 to 26 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 HABFS bulletin guide:

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

Please note the following restrictions on all SeaWiFS imagery derived from CoastWatch.

1. Data are restricted to civil marine applications only; i.e. federal, state, and local government use/distribution is permitted.
2. Image products may be published in newspapers. Any other publishing arrangements must receive GeoEye approval via the CoastWatch Program.

Conditions Report

There is currently no indication of a harmful algal bloom at the coast in southwest Florida, including the Florida Keys. No impacts are expected alongshore southwest Florida today through Sunday, October 3. Discolored water has been reported in southern Lee and northern Collier counties over the past week. This discoloration is attributed to a bloom of the algae *Takayama cf. acrotrocha*, which is not associated with the Florida red tide caused by *Karenia brevis*.

Analysis

There is currently no indication of a harmful *Karenia brevis* bloom in southwest Florida, including the Florida Keys. No *K. brevis* was detected at the coast in southwest Florida between Pinellas and Collier counties over the past week, including alongshore Sarasota County where 'very low' concentrations were previously identified on 9/13 (SCHD, FWRI, MML, CCPCPD; 9/20-9/24). A bloom of *Takayama cf. acrotrocha* continues to discolor the water alongshore southern Lee and northern Collier counties; however, samples collected last week suggest it may be dissipating (CCPCPD, 9/22). Unpleasant odors have been reported in the past week within this region and are likely associated with low dissolved oxygen as a result of the bloom (FWRI, 9/24).

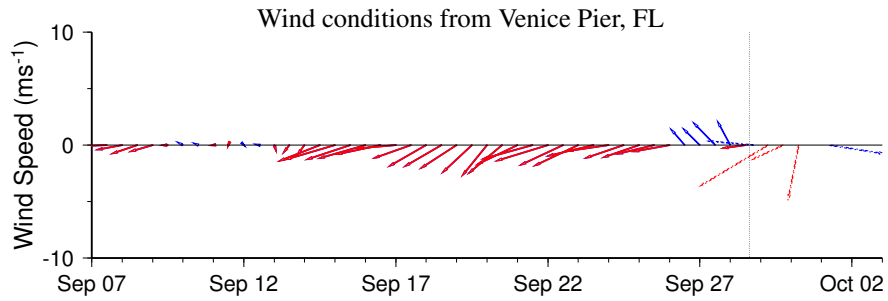
High chlorophyll features ($>10\mu\text{g/L}$) remain visible in recent imagery alongshore Charlotte and northern Lee counties, extending approximately 15 miles offshore. Elevated to high chlorophyll (7 to $>20\mu\text{g/L}$) is continually visible in a band south to southwest of Sanibel Island, central Lee County, from $26^{\circ}26'8''\text{N}$, $82^{\circ}6'31''\text{W}$ to $26^{\circ}14'39''\text{N}$, $82^{\circ}32'2''\text{W}$ and alongshore northern Collier County (4 to $>10\mu\text{g/L}$) to approximately 25 miles offshore Naples. Elevated chlorophyll (4 to $8\mu\text{g/L}$) is also visible alongshore southern Pinellas County. Non-harmful algal blooms continue to be reported in several counties along the coast of southwest Florida (FWRI; 9/20-9/23).

Observed conditions were not conducive to bloom formation over the weekend. Upwelling favorable northeast to east winds are expected through Saturday, Oct. 2; however bloom formation is unlikely this week.

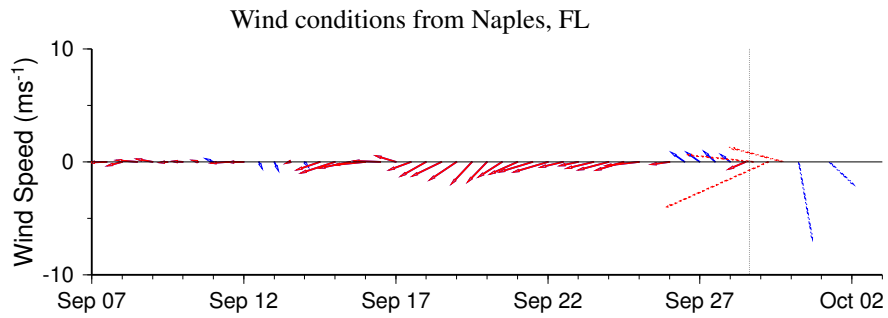
-Fisher, Yang

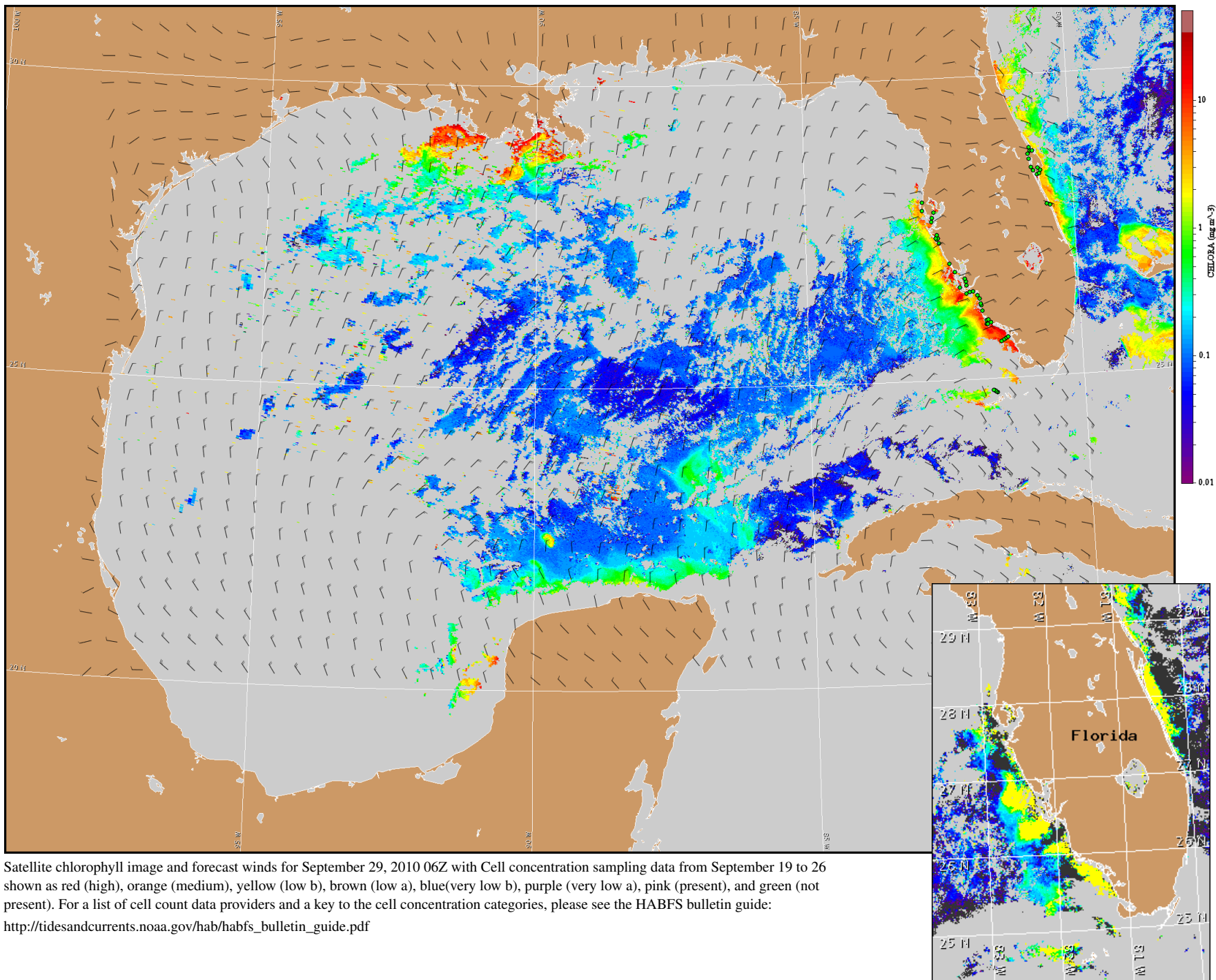
Wind Analysis

Northeast to east winds today (10-15kn, 5-8 m/s), shifting north Wednesday (15kn, 8m/s). Northwest winds Thursday (15kn), shifting north Thursday night. North to northwest winds Friday shifting northeast Friday night through Saturday (15kn).



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 September 29, 2010 06Z with Cell concentration sampling data from September 19 to 26 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 HABFS bulletin guide:

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

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