

Outlook of 2023 Sargassum blooms in the Caribbean Sea and Gulf of Mexico* March 1, 2023, by University of South Florida Optical Oceanography Lab (bbarnes4@usf.edu, vuyuan@usf.edu, huc@usf.edu)



The maps below show Sargassum abundance, with warm colors representing higher values. After increases in two consecutive months, the overall Sargassum quantity in the central Atlantic Ocean decreased from January to February, although this abundance (6.1 million tons) is still the second highest amount recorded for the month of February. While the change in Sargassum quantity from January to February has typically been a slight increase, a decrease in this span has been seen once in the modern bloom era (2019). Nevertheless, within the Caribbean Sea (CS), Sargassum quantity nearly doubled, as large patches moved westward between the Antilles islands. Notable quantities of Sargassum reached the Yucatan Peninsula near mid-February, with small amounts also observed in the Gulf of Mexico (GoM) at the end of the month.

Looking ahead, the decrease in Sargassum quantity from January to February is uncommon, and presents a glimmer of hope that the overall 2023 bloom may not be as large as previously feared although 2023 will still be a major Sargassum year. Nevertheless, the large quantities already in the CS (and to the east) will continue to accumulate and migrate westward, creating beaching hazards along the way. The Florida Keys may start to see small amounts in March. We will continue to closely monitor Sargassum coverage, with more updates provided by the end of March 2023. More information and near real-time imagery can be found under the Sargassum Watch System (SaWS, https://optics.marine.usf.edu/projects/saws.html).



Disclaimer: The information bulletin is meant to provide a general outlook of current bloom condition and future bloom probability for the Caribbean Sea. By no means should it be used for commercial purpose, or used for predicting bloom conditions for a specific location or beach. The authors of this bulletin, as well as USF and NASA, take no responsibility for improper use or interpretation of the bulletin.