



Footage from a Miami, FL camera installed as part of the WebCOOS pilot project.

## Join the Community Web Camera Observation Network

Web cameras or webcams are a low-cost coastal observing platform transforming how community environmental monitoring is conducted. Webcams can address significant gaps in the nation’s ability to monitor and accurately forecast various weather, ocean, ecological, and public health hazards.

Webcams for Coastal Observations and Operational Support (WebCOOS) is a community supported low-cost webcam coastal observing network, which provides valuable imagery and tools for scientists, communities, and local coastal managers to make decisions.



Webcam located in Miami, FL installed as part of the WebCOOS pilot project. Image credit: Surfline, Inc.

### How can web camera data help your community?

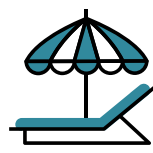
Below are a few examples of how webcam data is transforming coastal monitoring.



Identify Rip Currents



Study Beach Erosion



Monitor Beach Usage



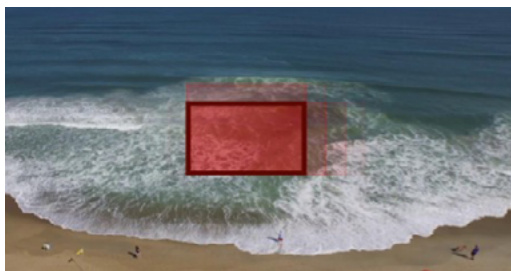
Flood Monitoring

### Partnership Opportunity

There is strength in numbers! With more webcams, higher quality information can be provided to users. Communities can partner with SECOORA to either provide existing webcam streams or install a webcam in their chosen location and receive the imagery and data personalized for their needs.

A team will work with each community to help access the data available already or to determine the appropriate webcams, locations and installation. Customized products can be created for those that want alerts of interest to the community.

# How are webcam data being used?



## Identify Rip Currents

Machine learning and flow-based tracking can identify rip currents from webcam imagery.

Used to inform the public of rip current dangers and improve NOAA rip current forecasts.



## Study Beach Erosion

Algorithms and tools can identify shoreline water levels (tides, storm surge, wave runup) from webcam imagery.

Used to identify potential dune erosion or overwash events, infrastructure risk and limitations to beach access.



## Monitor Beach Usage

Machine learning tools can count a range of objects in a given area - including beach activities such as number of visitors and parking lot traffic.

Provides information to coastal managers on how busy a location is during different times of the day, season, or year for planning and safety purposes.



## Flood Monitoring

Real-time monitoring and visualization of coastal flooding.

Used to document flooding impacts and provide real-time alerts for local communities.



## Next Steps

Interested in getting involved? Need a question answered? Contact us today!

Email: [webcoos@secoora.org](mailto:webcoos@secoora.org)

Website: <https://webcoos.org/>



*This is a SECOORA funded program. SECOORA is a non-profit that works to observe, understand, and increase awareness of our coastal ocean through strong partnerships.*