

## A Guide to Photo Monitoring

Learn how to track change on your property using photos

# Why is it important to monitor changes on your property?

Flooding and erosion are a natural part of the dynamic life of a coastline; seasonal changes in wave activity, storms, and precipitation drive land and water level changes that can be exacerbated by climate change. Keeping track of changes to your property due to flooding and/or erosion is important for understanding short- and long-term change. Records of shoreline change over time can also provide important information (such as shoreline position and slope) to professionals to develop strategies to deal with any issues caused by flooding and erosion. Photo monitoring, which involves taking photos from the same location over time, can be a useful tool for documenting change.

## How to set up an photo monitoring station on your property

#### 1. Choose a location & identify/install two reference points

Find one or more locations on your property from which to take pictures of the area affected by erosion or flooding. The pictures are most effective when taken from the same place each time. Identify a fixed point that will not move, for example, a spot on a deck or fence, a bird feeder/house on a post, a raised garden bed support, or even a lawn ornament. Be creative! If all else fails you can sink a wooden post to serve as your fixed point.

To ensure that your photographs are collected from the same point and at the same angle/height/etc each time, you will create a mark on your fixed point to indicate where you will hold the camera to take the photo. You can create the mark with paint or a permanent marker. Alternatively, you can purchase an L-bracket from a hardware store to support your camera/phone. The bracket can attach to the fixed point and serve as a structure to balance your camera or phone to ensure consistency among pictures. See the photo on the right side of the page for an example.



## Tips

- The photo should capture the area where you are observing the most flooding/erosion.
- It is helpful to capture an item in the photos that can be used as a reference point, such as a tree, a large rock, or a structure.



2. Determine how often you will take pictures at each of your chosen locations

### a) Erosion:

If your property experiences erosion, consider taking pictures on a monthly basis, as well as after storms. (If you are interested in also collecting data on the extent of erosion on your property, please see the **Guide to Erosion Monitoring**)

### b) Flooding:

If your property experiences flooding, take pictures of the property without flooding as a baseline in addition to during flooding events. Only photograph flooding if it is safe to do so. In addition, consider taking photos after each event if there are signs of flood impacts such as wrack lines, debris, or watermarks on structures. See Mill Pond Shoreline photos as reference.

## 3. Saving your photos in a central place

Create a system for storing your photos to avoid losing track of your images as they accumulate. If monitoring more than one location, create a folder for each location. Name each picture file with the location, date and time. One suggestion is Location\_Date (YYYYMMDD)\_Time. For example, the photo taken at the Mill Pond Shoreline on December 8, 2016 at 10:33am would be named MillPond\_20161208\_10:33. If the hour the photo was taken is past noon, use a twenty-four hour clock format, i.e. 1pm is 13:00, 2pm is 14:00, etc. It is easiest to store photos directly on a computer or external hard drive, but there are many online storage options available as well.



Mill Pond Shoreline December 8, 2016 10:33am, flood event



Mill Pond, July 1, 2020 11:40am, low tide

If you have questions about monitoring erosion on your property, please contact Dr. Alyson Eberhardt, Coastal Ecosystems Specialist, at alyson.eberhardt@unh.edu.

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