

◆ The Lake Watcher ◆

Volume 1 Issue 1

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◆ Lake focus

Cullaby Lake color unique

Cullaby Lake is the largest of the many lakes on the Clatsop Plains near Astoria. Typical of many coastal lakes, Cullaby was formed at the end of the Pleistocene ice age. Rising global temperatures brought a rise in sea level which backed up the water of many coastal streams including the Cullaby Lake basin. Migrating sand dunes cut off the ocean outlets for the streams and created many of the present coastal lakes. Lakes formed in this manner display a typical branching, or dendritic, shape reflecting the historic stream channel and its tributaries. The watershed of Cullaby Lake has been modified by several ditches and culverts, and the surface level of the lake is controlled by a weir at the outlet on the north end of the lake.

There are private homes and a county park on the west shore of the lake. The east shore is privately owned timberland and logging of the watershed is ongoing. The main tributary,

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◆ First Issue of newsletter

In an effort to better share information about the Citizen Lake Watch program and lake activities in Oregon, we are planning to publish a quarterly newsletter. One possible format for the newsletter is to focus on one lake each issue, highlighting some points of interest, sharing volunteer generated data, discussing management activities, identifying aquatic weeds of interest, etc. It will also be another method of sharing information of interest to all Lake Watch volunteers. If you have suggestions for newsletter topics, please contact the Lake Watch coordinator.

For our maiden voyage we will focus on Cullaby Lake since it has a preliminary Clean Lakes Program Lake Water Quality Assessment project underway.



◆ Aquatic plants

Cabomba: alias Fanwort

Janette Goolsby, Citizen Lake Watch volunteer at Cullaby Lake, has been sampling aquatic plants at selected locations around the lake since the summer of 1992.

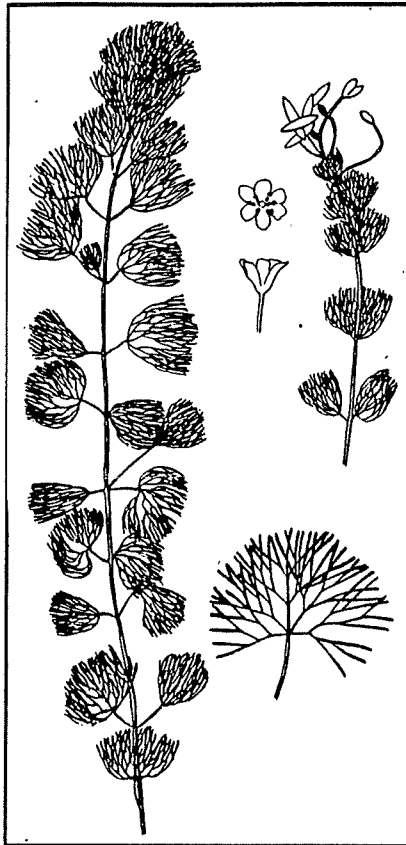
One of the most surprising finds in her plant grab was *Cabomba caroliniana*, commonly known as **Fanwort**. Originally, the plant was identified incorrectly because Cabomba's range is listed as the east coast of the U.S. Mark Sytsma, a limnologist and aquatic plant expert at the consulting firm of KCM, correctly identified the plant as Cabomba on a trip to Cullaby Lake. He said he had never actually seen the plant before, but recognized it immediately. To his knowledge, this is the first siting of this plant in a lake on the west coast. Evidently, Clatsop County personnel have been aware of Cabomba's existence in Cullaby Lake for the last ten years, but its presence had never generated much outside interest.

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◆ *Cullaby Lake continued*

Cullaby Creek, drains a large marshy area which includes extensive cranberry bogs.

The most noticeable feature of Cullaby Lake is the distinct tea color of the water. This is a natural occurrence and is caused by humic or tannic acids in the water which are present as a result of high concentrations of dissolved plant matter in the lake. The water is stained a dark brown color and the transparency is reduced as a result. The Secchi disk transparencies typically range between two and four feet. This tea color may also be seen in a number of other coastal lakes.



Cabomba caroliniana

◆ *Fanwort continued*

Cabomba is an exotic plant species and is of concern because it may spread to other lakes in the Northwest. The plant is likely present in the Skipanon River, into which the lake's outlet drains, and is known to exist in the Columbia River near Longview, Washington.

Leaves are on short or long stalks which are in pairs at each joint. The forked leaflets are a little wider at the tip than the base. Six-parted white or lavender flowers and small, narrow floating leaves are at the tip of the stem which reach the surface of the water.



The Lake Watcher is the newsletter of the Oregon Citizen Lake Watch Program and is published quarterly by Portland State University. The Citizen Lake Watch program is managed by Portland State University. For more information, please contact the Citizen Lake Watch coordinator at the return address listed or call 229-5279 or 725-4241.

Citizen Lake Watch Program
Oregon Department of Environmental Quality
Water Quality Division
811 SW 6th Ave.
Portland, OR 97204-1390