

***CHARA CONTRARIA* GERMINATION FROM VARIOUS SEDIMENT BURIAL DEPTH**

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Charophytes are a part of littoral submerged vegetation which provide habitats, nursery, feeding grounds for various organisms and acts as sink and storage of nutrients. For many charophytes species, the dispersion, colonization and maintenance of populations depend entirely on the oospore bank. It is important to know, how environmental factors influences current status of the population and ensure success of establishment in the case of restoration.

Estuarine environment is exposed to high hydrological disturbance (resuspension and sedimentation), where oospores can be buried by sediments. Therefore, the aim of this study was to test the impact of different cover by sediments to germination of oospores from *Chara contraria*, which is a dominant charophyte in the Curonian lagoon. Charophyte oospores with sediments were collected in the lagoon at the end of the vegetation season in 2017 and stored at 4-5 °C temperatures in the dark for month before experiment. Selected 50 viable calcified oospores were buried in the tubes with sediments at depths of 1, 5 and 10 cm (3 replicates for each depth). The experiment lasted 60 days.

Oospores germinated in the all experimental set ups, but different emergence time for germlings was observed. First germlings were observed in 1 cm sediment depth set up at the 12th day of the experiment, in 5 cm set up at the 21th day and germlings emerged from 10 cm sediment depth only on 49th day. Germlings developed only from 1 cm buried oospores, whereas shoots stopped growing after germination in other (5 and 10 cm) set ups. Results indicate that *C. contraria* oospores can germinate buried under 10 cm sediments, but germlings can delay in development and can be outcompeted by other macrophytes.