



# **D2.5 Report evaluating the feasibility of collecting the algae-juice during conditioning and pre-treatment**

## **Macro Cascade -Project**

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## Summary

The economic feasibility of valorization of the valuable components in run-off liquids (algae juice) during conditioning and pretreatment i.e. ensiling was analyzed. It is assumed that the run-off liquids can be integrated into the first section of the Macro Cascade bio-refinery process (D4.1) i.e. the cold-water extraction where laminarin and mannitol is recovered.

The analysis is based on the comparison of the value of the valuable components in the run-offs with the processing costs in the cold-water extraction of the Macro Cascade Bio-refinery. The analysis showed that it is not economic to integrate the run-offs from the ensiling of the seaweed into the Macro Cascade biorefinery process (i.e. an initial cold-water extraction and an afterwards hot water extraction as being developed in WP4). In fact, the costs of doing so exceeds the potential revenues by a factor 10. The best option to is most likely to apply the run-off liquids to biogas plants for biomethane production.

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