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**Ecological footprint analysis based awareness creation
for energy efficiency and climate change mitigation measures
enhancing the environmental management system of Limassol port**

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Abstract

Sea ports are very complex systems related to a wide variety of issues, the most important being waste production as well as water, air and soil releases. Furthermore, in port areas, several activities are carried out that may cause significant environmental impacts such as fisheries, industrial activities and storage of hazardous materials. Setting objectives and goals in terms of a comprehensive environmental management plan is of a great importance for sea ports. The main scope of this study is to introduce a novel approach to rationalize the environmental management strategies of sea ports based on the reduction of their ecological footprint. The object of the study is the Limassol sea port, a main cargo and cruise home port of the Mediterranean that serves one of the largest shipping fleets worldwide. In terms of this study, the most significant environmental aspects of the Limassol sea port are identified. An analysis of the main results of the calculation of the ecological footprint and carbon footprint is presented, by applying the Ecological Footprint analysis methodology. This study aims to deliver a comprehensive methodology that links the results of ecological footprint analysis with the environmental objectives of an ISO 14000 environmental management system.

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