

# High-efficiency cooperation of energy storage containers in ports and terminals





## Overview

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Is collaborative optimization feasible between Port Logistics and energy systems?

To verify the economic feasibility of collaborative optimization between the port logistics system and the energy system, two comparative cases are set up as follows: Case B: Collaborative optimization of logistics and energy systems. Specifically, the separate optimization of logistics and energy systems was carried out in two steps.

What energy storage technologies can a seaport use?

Thanks to the rich energy sources, ports, especially large seaport integrated energy systems, can apply various energy storage technologies such as electric energy storage, thermal energy storage, natural gas storage, and hydrogen storage.

Can integrated energy systems be used in port development?

In recent years, research on integrated energy systems has been flourishing and has achieved relatively complete research results, which can also be applied to the construction and development of port integrated energy systems.

What is the energy supply for port operations?

The energy supply for port operations can be from fossil fuels, clean fuels including renewable sources. The energy can also be obtained from the grid in the form of electricity or it can be generated within the port. In this section, renewable energy and other clean fuels are assessed as the energy supply for ports. 4.2.1. Renewable energy



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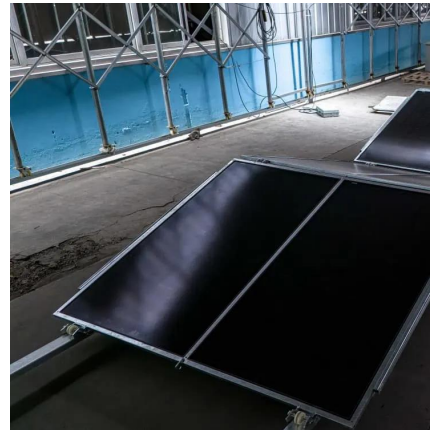


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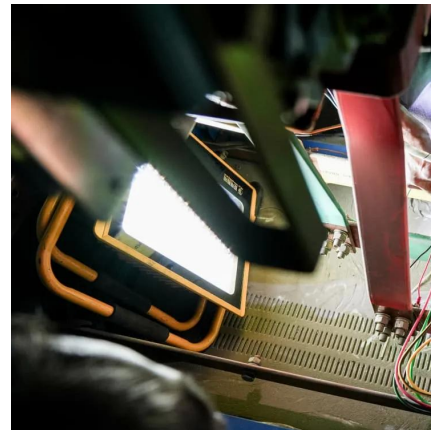
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