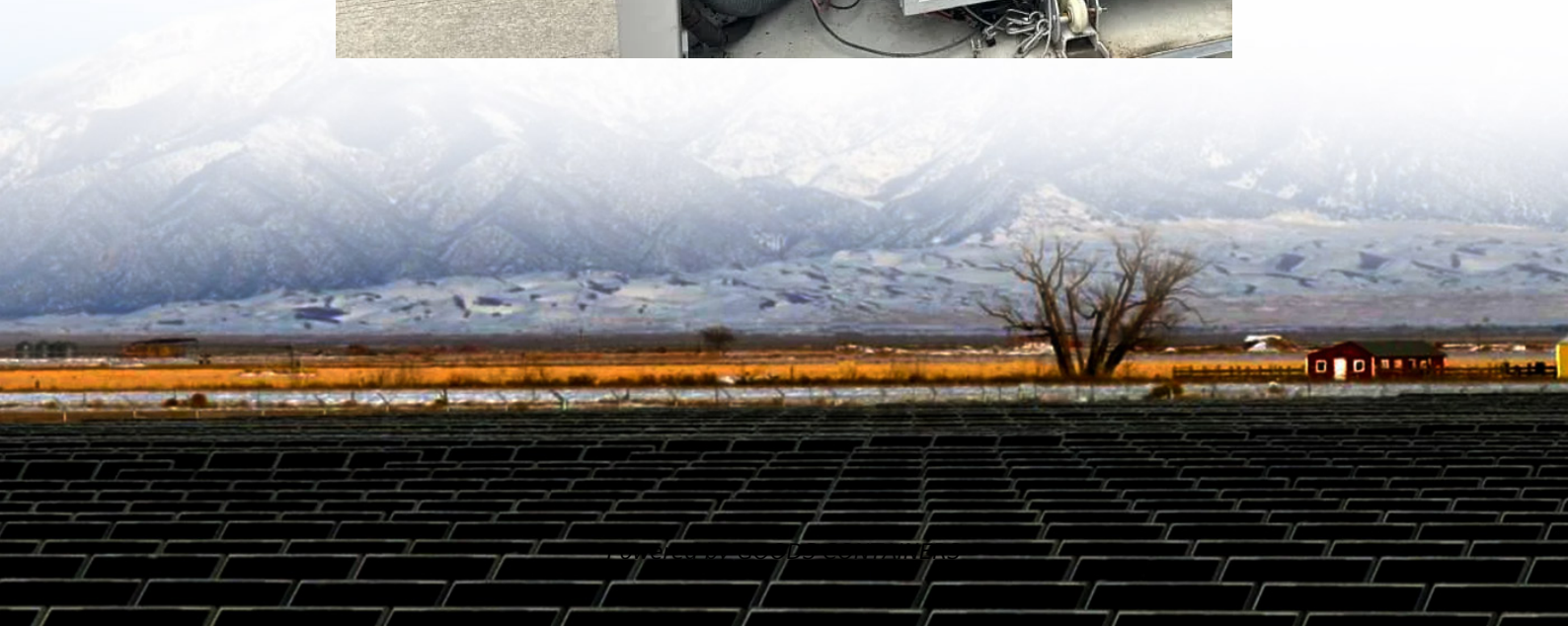


Wind power generation system transmission system





Overview

The mutual compensation of offshore wind energy and wave energy provides a cost-effective solution to offshore power supply. Herein, a novel wind-wave hybrid power generation system with hydraulic tr.

Which transmission system is used in wind turbine?

Normally, the mechanical transmission system (gear train) is used to transmit the power in wind turbine. But this transmission is not suitable in large scale power production. Currently, hydraulic power system has drawn an attention as a power transmission system in the wind turbine field.

What is power transmission in a wind turbine rotor?

The power transmission from the turbine rotor to the generator is an important and integral part of the wind turbine system. Generally, the power transmission unit is of two types, e.g., mechanical transmission system and hydrostatic power transmission system (HST).

What is a hybrid wind power generation system?

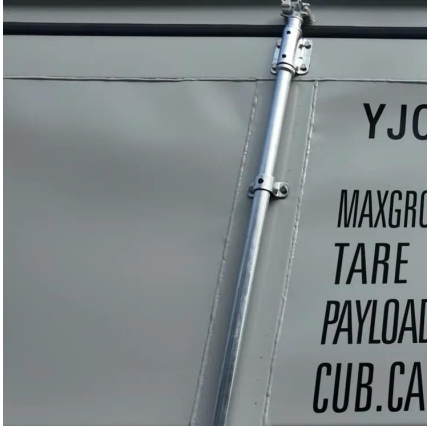
The hybrid configuration applies the combination of mechanical transmission and hydraulic transmission to the wind power generation system with the high efficiency of mechanical transmission and the flexibility of hydraulic transmission.

What is a wind power system?

A wind power system integrates different engineering domains, i.e. aerodynamic, mechanical, hydraulic and electrical. The power transmission from the turbine rotor to the generator is an important and integral part of the wind turbine system.



Wind power generation system transmission system

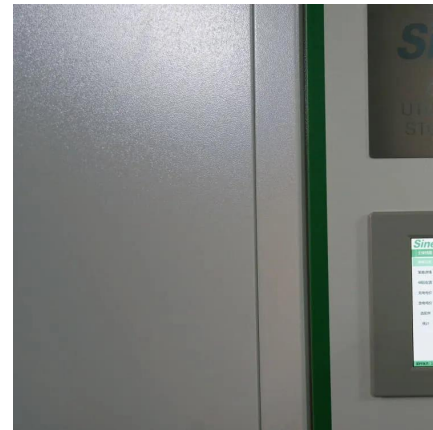


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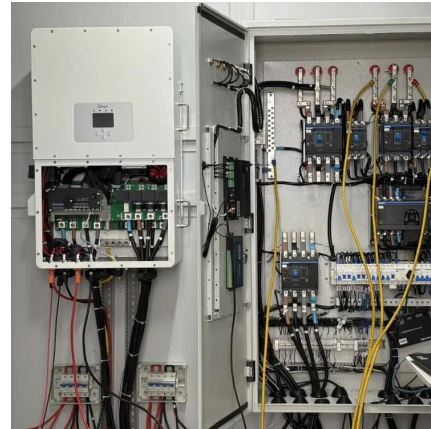
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