

CZECH TECHNICAL UNIVERSITY IN PRAGUE

Faculty of Electrical Engineering Department of Economics, Management and Humanities Zikova 4, 166 29 Prague, Czech Republic

REVIEW BY SUPERVISOR OF THE DIPLOMA THESIS

Topic: Decentralized electricity supplies of village behind the polar

circle.

Author: Alena Surovezhko

Supervisor: **Július Bemš, Ph.D.**

The author designed the system of the solar power station with diesel generators in the remote area behind the polar circle and calculated its economic profitability.

The first part of the thesis deals with technological issues related to the selection of optimal technology respecting weather conditions and other limitations. Its output is the whole design of the decentralised electric supply.

The second part is devoted to financial model preparation and economic evaluation of the project. Based on the proposed financial model, author prepared three project evaluation scenarios (realistic, optimistic and pessimistic) and performed sensitivity analyses on input parameters.

Cooperation with the author was excellent. Alena was always coming well-prepared for consultations, her approach was proactive and it was a pleasure to work with her. She fulfilled all my requirements and proved that she is able to solve complex problems independently.

According to my opinion, the work has a high practical impact and can be used in real-world applications.

I recommend grade this thesis

A – Excellent

using the ECTS grading scale and I recommend work for defence.

I have no questions.

Prague, 1st June 2018 Július Bemš, Ph.D.