

## I. IDENTIFICATION DATA

<b>Thesis title:</b>	CALCULATION OF INTEGRATED PROTECTION OF ELECTRICAL EQUIPMENT
<b>Author's name:</b>	Agata Kalganova
<b>Type of thesis :</b>	master
<b>Faculty/Institute:</b>	Faculty of Electrical Engineering (FEE)
<b>Department:</b>	Department of Economics, Management and Humanities
<b>Thesis reviewer:</b>	Ing. Miroslav Vítek, CSc.
<b>Reviewer's department:</b>	Department of Economics, Management and Humanities

## II. EVALUATION OF INDIVIDUAL CRITERIA

<b>Assignment</b>	<b>extraordinarily challenging</b>
<i>How demanding was the assigned project?</i>	
The task of the diploma thesis was two parts. First designing integrated protection for several cases from technical point of view. Secondly trying to express effectivity of installation and operation analogue or digital protection of transformer from an economic point of view.	

<b>Fulfilment of assignment</b>	<b>fulfilled with minor objections</b>
<i>How well does the thesis fulfil the assigned task? Have the primary goals been achieved? Which assigned tasks have been incompletely covered, and which parts of the thesis are overextended? Justify your answer.</i>	
The task was fulfilled only the problematic of probability of fault of transformers or protection devices could be more discussed.	

<b>Activity and independence when creating final thesis</b>	<b>A - excellent.</b>
<i>Assess whether the student had a positive approach, whether the time limits were met, whether the conception was regularly consulted and whether the student was well prepared for the consultations. Assess the student's ability to work independently.</i>	
The graduate regularly consulted with me on the results of his work and he have positive approach for my recommendation.	

<b>Technical level</b>	<b>B - very good.</b>
<i>Is the thesis technically sound? How well did the student employ expertise in his/her field of study? Does the student explain clearly what he/she has done?</i>	
The student sufficiently described the technical aspects of the protection designing. The award deserves the acquisition of the necessary technical and economic data from practice to calculate the economic effectiveness of protection. The probability of a fault condition leading to a possible transformer failure and the probability of protection failure are important for expression of economic benefit of protection device. May be this fact could be more discussed in theses.	

<b>Formal level and language level, scope of thesis</b>	<b>A - excellent.</b>
<i>Are formalisms and notations used properly? Is the thesis organized in a logical way? Is the thesis sufficiently extensive? Is the thesis well-presented? Is the language clear and understandable? Is the English satisfactory?</i>	
The work has a logical structure, reads well and I had not problem with understanding.	

<b>Selection of sources, citation correctness</b>	<b>A - excellent.</b>
<i>Does the thesis make adequate reference to earlier work on the topic? Was the selection of sources adequate? Is the student's original work clearly distinguished from earlier work in the field? Do the bibliographic citations meet the standards?</i>	
The student has long list of book titles from professional literature. Other imported information obtained from discussion with specialist in practice. The bibliographic citations meet the standard, absolutely.	

**Additional commentary and evaluation (optional)**

*Comment on the overall quality of the thesis, its novelty and its impact on the field, its strengths and weaknesses, the utility of the solution that is presented, the theoretical/formal level, the student's skillfulness, etc.*

Research into the economic effectiveness of protections in high voltage grids is not a very widespread activity, as it may seem trivial. The fact is that the price of protection is much lower than the price of the protected equipment, so efficiency is somehow automatically assumed, but on closer examination it may not be so clear-cut. It is a stochastic task for which numbers based on operational statistics are important. The thesis defended could represent a certain starting point for further research.

**III. OVERALL EVALUATION, QUESTIONS FOR THE PRESENTATION AND DEFENSE OF THE THESIS, SUGGESTED GRADE**

*Summarize your opinion on the thesis and explain your final grading.*

The grade that I award for the thesis is **B - very good**.

Date: **1.6.2021**

Signature: