DIPLOMA THESIS EVALUATION
SUPERVISOR EVALUATION

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Thesis title: Steam Temperature Control Based on Modified Active Disturbance Rejection

A. Abstract quality, keywords matching ........................................Very good (2)
B. Research scope and processing ..............................................Good (3)
C. Level of theoretical part ......................................................Very good minus (2-)
D. Appropriateness of the methods ............................................Excellent minus (1-)
E. Results elaboration and discussion ........................................Very good (2)
F. Students own contribution ....................................................Good (3)
G. The conclusion statement .....................................................Very good (2)
H. Fulfillment of Thesis tasks (goals) ........................................Fulfilled
I. Structure, correctness and fullness of references ......................Very good minus (2-)
J. Typographical and language level ..........................................Very good minus (2-)
K. Formal quality .................................................................Excellent (1)
(text structure, chapters order, clarity of illustrations)
L. Student access (independence, activity etc.) ............................Very good minus (2-)

Comments, remarks

The thesis contains unnecessarily many misspellings and inappropriate formulations that lead to a difficult understanding of the described issue.
Overall assessment:

The student dealt with a completely new issue of the alternative method to eliminate (to minimize) the effect of unmeasured disturbance on a system and in the application for temperature control of the outlet temperature from the superheater. A simple and functional algorithm would be very welcome in industrial practice. Unfortunately, the work shows signs of imperfect orientation in the issue, in some places, there is no logical link in the procedure. E.g. in the initial analysis of the method, the robustness properties of the control are nicely analyzed on examples, but the complete conclusion is missing.

The work is an example of the student's ability to work with literature and solving new problems. The basic principles of the method are suitably described and demonstrated, application to a specific technology is also performed, but could be processed in more detail.

Questions for the defense:

1. There are tests for a system with multiple time constant. Did you try to find out how the control process will behave for a system with several different time constants, or with a complex pair of poles?
2. The controller does not contain the integration component. Did you observe this on simulation results? Why yes or no?

Plagiarism checking:

Similarity by STAG: 0 %

Comment if similarity is above 5 %: Reviewed

Overall classification:

Work meets the Master degree requirements and therefore I recommend it for defense

I suggest to classify this work by grade Very good minus (2-)

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date May 20, 2019

By signing I certify that I am not in any personal relationship with the author of the thesis

Supervisor signature