**Supervisor's statement of a final thesis**

| Student: | Danil Luzin |
| Supervisor: | Ing. David Sedláček, Ph.D. |
| Thesis title: | Texture extraction from photographs |
| Branch of the study: | Web and Software Engineering |

**Date:** 11. 6. 2018

### Evaluation criterion:
The evaluation scale: 1 to 4.

1. Fulfilment of the assignment

   - 1 = assignment fulfilled,
   - 2 = assignment fulfilled with minor objections,
   - 3 = assignment fulfilled with major objections,
   - 4 = assignment not fulfilled

**Criteria description:**
Assess whether the submitted FT defines the objectives sufficiently and in line with the assignment; whether the objectives are formulated correctly and fulfilled sufficiently.

In the comment, specify the points of the assignment that have not been met, assess the severity, impact, and, if appropriate, also the cause of the deficiencies. If the assignment differs substantially from the standards for the FT or if the student has developed the FT beyond the assignment, describe the way it got reflected on the quality of the assignment’s fulfilment and the way it affected your final evaluation.

**Comments:**
The assignment is fulfilled in higher detail than expected.

### Evaluation criterion:
The evaluation scale: 0 to 100 points (grade A to F).

2. Main written part

   - 98 (A)

**Criteria description:**
Evaluate whether the extent of the FT is adequate to its content and scope: are all the parts of the FT contentful and necessary? Next, consider whether the submitted FT is actually correct – are there factual errors or inaccuracies? Evaluate the logical structure of the FT, the thematic flow between chapters and whether the text is comprehensible to the reader. Assess whether the formal notations in the FT are used correctly. Assess the typographic and language aspects of the FT, follow the Dean's Directive No. 26/2017, Art. 3. Evaluate whether the relevant sources are properly used, quoted and cited. Verify that all quotes are properly distinguished from the results achieved in the FT, thus, that the citation ethics has not been violated and that the citations are complete and in accordance with citation practices and standards. Finally, evaluate whether the software and other copyrighted works have been used in accordance with their license terms.

**Comments:**
The thesis is written in good English, with only occasional typing errors. The overall look of the thesis is very good, including formal notations, images, their references, equations, etc., ... The text itself clearly describes problems and their solutions, leads the reader fluently through the whole work, from problem analytics, solution decisions up to final testing.

The minor remark is to testing, where I would welcome more examples, also in closer detail to the model, with final values of process parameters.

### Evaluation criterion:
The evaluation scale: 0 to 100 points (grade A to F).

3. Non-written part, attachments

   - 95 (A)

**Criteria description:**
Depending on the nature of the FT, comment on the non-written part of the thesis. For example: SW work – the overall quality of the program. Is the technology used (from the development to deployment) suitable and adequate? HW – functional sample. Evaluate the technology and tools used. Research and experimental work – repeatability of the experiment.

**Comments:**
The source code is in C++, documented by doxygen standard (the documentation is also generated). Build system was chosen CMake, what brings an easy portability of the solution to other platforms. Building and application use is clearly described in the attached manual, what is not part of the thesis. Licenses of used libraries are clearly specified.

A final tool is written as a command-line for the possibility to easily incorporate it into the reconstruction workflows (as stated in the assignment).

Unfortunately, the author didn't attach other testing data presented in the thesis, then the Slany scene, provided by the supervisor.
4. Evaluation of results, publication outputs and awards  
100 (A)

Criteria description:
Depending on the nature of the thesis, estimate whether the thesis results could be deployed in practice; alternatively, evaluate whether the results of the FT extend the already published/known results or whether they bring in completely new findings.

Comments:
The final tool is directly applicable in reconstruction workflow and produces comparable results to existing software.

There is no comparison of results to existing tools, but it would be out of thesis scope.

The overall thesis has the potential for publication on student conference like is CESCG, if it will be extended by comparison with others.

Evaluation criterion:
The evaluation scale: 1 to 5.

5. Activity and self-reliance of the student  

| 5a: | 1 = excellent activity,  
|     | 2 = very good activity,  
|     | 3 = average activity,  
|     | 4 = weaker, but still sufficient activity,  
|     | 5 = insufficient activity  
| 5b: | 1 = excellent self-reliance,  
|     | 2 = very good self-reliance,  
|     | 3 = average self-reliance,  
|     | 4 = weaker, but still sufficient self-reliance,  
|     | 5 = insufficient self-reliance |

Criteria description:
From your experience with the course of the work on the thesis and its outcome, review the student’s activity while working on the thesis, his/her punctuality when meeting the deadlines and whether he/she consulted you as he/she went along and also, whether he/she was well prepared for these consultations (5a). Assess the student’s ability to develop independent creative work (5b).

Comments:
Student was proactive, self-sufficient. He initiative looks forward to discussing the problem, with the proposed solutions, not only passively waiting for supervisor advice.

Evaluation criterion:
The evaluation scale: 0 to 100 points (grade A to F).

6. The overall evaluation  

98 (A)

Criteria description:
Summarize which of the aspects of the FT affected your grading process the most. The overall grade does not need to be an arithmetic mean (or other value) calculated from the evaluation in the previous criteria. Generally, a well-fulfilled assignment is assessed by grade A.

Comments:
The thesis is really well-written work from both views (program part, and written part). If minor deficiencies were corrected, it could be presented as an adequate diploma thesis.

Signature of the supervisor: