

I. IDENTIFICATION DATA

Thesis name:	Dry stack masonry: history, principles and contemporary applications
Author's name:	Ildar Sharipov
Type of thesis :	bachelor
Faculty/Institute:	Faculty of Civil Engineering (FCE)
Department:	Department of Concrete and Masonry Structures
Thesis supervisor:	Ing. Petr Bílý, Ph.D.
Supervisor's department:	Department of Concrete and Masonry Structures

II. EVALUATION OF INDIVIDUAL CRITERIA

Assignment	ordinarily challenging
<i>Evaluation of thesis difficulty of assignment.</i>	
<p>The thesis was mainly focused on the review of history, current state and technical principles of dry stack masonry technology. The current state should have been demonstrated by an example of design of a structure. The topic itself was not difficult, but the student could not rely on his knowledge gained in the basic courses of his study. This was a challenging aspect of the thesis. Overall, the assignment can be classified as ordinarily challenging.</p>	

Satisfaction of assignment	fulfilled with minor objections
<i>Assess that handed thesis meets assignment. Present points of assignment that fell short or were extended. Try to assess importance, impact or cause of each shortcoming.</i>	
<p>All the goals of the thesis defined in the assignment were fulfilled, but some of them should have been addressed more thoroughly. Regarding the principles of construction and design, most of the information was taken from just one source. In case of contemporary applications, just several examples of existing dry masonry systems were mentioned. More systems used in Europe should have been mentioned. Concrete examples of contemporary structures are missing. The design of the selected structure is very simplistic.</p>	

Activity and independence when creating final thesis	D - satisfactory.
<i>Assess that student had positive approach, time limits were met, conception was regularly consulted and was well prepared for consultations. Assess student's ability to work independently.</i>	
<p>The activity and independence of the student were rather insufficient. Even though regular consultations were agreed in the beginning of the semester, the student did not respect them. Except the last two weeks, there was just one personal consultation (in the middle of the semester, on the demand of the supervisor, not the student). The student presented a draft of the chapter focused on the history of dry stack masonry, which consisted of segments of the text copied from different sources in different languages, with no logical structure. The finalization of this part to acceptable form took more than one month. The conception of the thesis was defined mainly by the supervisor, not the student. The remaining parts of the thesis were created quite hastily in the last two weeks of the semester. They are mostly composed of the texts adopted from the literature, with little own contribution and evaluation from the student's side. The activity, enthusiasm and creativity of the student were practically non-existing, he mostly just fulfilled the assigned tasks. The only positive aspect was that the student himself contacted the producer of STAVSI system and obtain some materials directly from him. However, he was not able to gain more from this promising cooperation.</p>	

Technical level	D - satisfactory.
<i>Assess level of thesis specialty, use of knowledge gained by study and by expert literature, use of sources and data gained by experience.</i>	
<p>The technical level of the thesis is satisfactory, but many issues should have been studied and discussed in more detail, for example:</p> <ul style="list-style-type: none"> • Behavior of dry stack masonry under eccentric load is discussed just very briefly. 	

- Behavior under lateral loading (shear, flexure) is not discussed at all even though there is extensive information on this topic in materials related to STAVSI system.
- No dry stack masonry systems from Europe (except the Czech Republic) are presented.
- In the example of design, no eccentricity of vertical loads is considered even though the wall is clearly eccentrically loaded given the scheme of supports of slab panels.
- Check of external load-bearing wall is missing.
- Values of flexural strength are taken from Eurocode even though the values from tests are available for STAVSI system.
- A case study comparing the load-bearing capacity of STAVSI system with some of the regular masonry systems (HELUZ, Silka etc.) could have been performed on an example to demonstrate the benefits and problems of dry stack masonry.

Formal and language level, scope of thesis

C - good.

Assess correctness of usage of formal notation. Assess typographical and language arrangement of thesis.

The language level is good, even though there are occasional oddly constructed sentences, mistakes or typos. Typographical arrangement is average, with occasional errors in formatting.

Selection of sources, citation correctness

D - satisfactory.

Present your opinion to student's activity when obtaining and using study materials for thesis creation. Characterize selection of sources. Assess that student used all relevant sources. Verify that all used elements are correctly distinguished from own results and thoughts. Assess that citation ethics has not been breached and that all bibliographic citations are complete and in accordance with citation convention and standards.

The student used enough relevant sources of different types (doctoral theses, materials of masonry producers, standards, online sources). However, the citation ethics was not followed correctly. The citations are mostly used just with the figures. In the text, it is not clear which parts are adopted from other sources (or what sources have been used to compose them) and which parts are own thoughts of the author.

Additional commentary and evaluation

Present your opinion to achieved primary goals of thesis, e.g. level of theoretical results, level and functionality of technical or software conception, publication performance, experimental dexterity etc.

I have no more comments.

III. OVERALL EVALUATION, CLASSIFICATION SUGGESTION

The overall level of the thesis (and mainly of the process of writing the thesis) is below average, but the thesis is acceptable. The cooperation with the student was very disappointing due to the lack of communication and activity from his side. The student should significantly improve his attitude to work in the future.

I evaluate handed thesis with classification grade **D - satisfactory**.

Date: **7.6.2019**

Signature: *Petr Bílý*