Report on Master Thesis

Institute of Economic Studies, Faculty of Social Sciences, Charles University in Prague

Student:	Tomáš Kroutil
Advisor:	PhDr. Jozef Baruník
Title of the thesis:	Predictive Accuracy of Competing Value-at-Risk Specifications During Crisis: *An Application to CEE Financial Markets*

OVERALL ASSESSMENT (provided in English, Czech, or Slovak):

The thesis presents technically demanding topic regarding different Value-at-Risk models and their evaluation based on CEE stock-index data in the crisis period. The theoretical background of the thesis is strong, standard theory is appropriately described and explained with references to the current literature. Thesis is competently written, has logical structure and neat form.

The technical character of the thesis should be appreciated. It demonstrates author's good understanding of the Value-at-Risk concept and technical skills to empirically use advanced technical methods. However, a few comments and possible limitations are mentioned above and may be also used as the defense questions.

As the main limitations of the thesis I consider the fact that dynamic models are not re-estimated for moving window in out (in)-of-sample models' comparison. Author mentioned this limitation, however, the reasoning on page 48/49 should be extended and this issue should be discussed in more detail, as it can be the significant reason of "surprising" results. The first sentence in the abstract claims that recent financial crisis has increased the need for reliable financial risk measurement and management, which is partially motivation of the thesis. Many advanced GARCH specifications are used in the thesis and further more advanced techniques using high-frequency data employed, such as realized volatility concept, to make more precise VaR estimates. Therefore seems a little bit odd not to re-estimate dynamic models for moving window with the justification that risk management should be uncomplicated and friendly for practitioners and should not require estimation on daily basis (page 49). I´m aware of technical demandingness of this application which may go beyond the scope of the thesis, still, it could be done only for shorter time period for comparison, how results may differ.

Further, better connection between presented models and VaR concept should be added. The chapter 2.2 discusses many volatility models using GARCH modifications, those models are described quite technically without intuition and link to the VaR model, i.e. under which circumstances should be this GARCH modification better for VaR any why. This should be more straightforward also in results section.

Finally, just for style of the manuscript. 1) it would be useful to add one result table into the main text, not only to refer into the appendix. 2) the author uses in the text "et. al" instead of "et al." et alii (and others). 3) list of abbreviations would be useful since some abbreviations are not defined immediately after the first use in the text.

Abovementioned problems should be considered and improved before the thesis will be submitted as a rigorous thesis.

Still, based on the technical quality of the submitted diploma thesis, I recommend the thesis for the defense with evaluation **Excellent.**

SUMMARY OF POINTS AWARDED *(for details, see below):*

CATEGORY		**POINTS**
Literature	*(max. 20 points)*	19
Methods	*(max. 30 points)*	25
Contribution	*(max. 30 points)*	26
Manuscript Form	*(max. 20 points)*	17
TOTAL POINTS	*(max. 100 points)*	**87**
GRADE	**(1 – 2 – 3 – 4)**	**1**

NAME OF THE REFEREE: PhDr. Jakub Seidler
DATE OF EVALUATION: August 28th, 2010

Referee Signature

EXPLANATION OF CATEGORIES AND SCALE:

LITERATURE REVIEW: *The thesis demonstrates author's full understanding and command of recent literature. The author quotes relevant literature in a proper way.*

Strong	*Average*	*Weak*
20	*10*	*0*

METHODS: *The tools used are relevant to the research question being investigated, and adequate to the author's level of studies. The thesis topic is comprehensively analyzed.*

Strong	*Average*	*Weak*
30	*15*	*0*

CONTRIBUTION: *The author presents original ideas on the topic demonstrating critical thinking and ability to draw conclusions based on the knowledge of relevant theory and empirics. There is a distinct value added of the thesis.*

Strong	*Average*	*Weak*
30	*15*	*0*

MANUSCRIPT FORM: *The thesis is well structured. The student uses appropriate language and style, including academic format for graphs and tables. The text effectively refers to graphs and tables and disposes with a complete bibliography.*

Strong	*Average*	*Weak*
20	*10*	*0*

Overall grading:

TOTAL POINTS	**GRADE**		
81 – 100	**1**	= excellent	= výborně
61 – 80	**2**	= good	= velmi dobře
41 – 60	**3**	= satisfactory	= dobře
0 – 40	**4**	= fail	= nedoporučuji k obhajobě