

*Stellingen*

*behorende bij het proefschrift*

**Developing a New Measure of Conceptual Knowledge:  
Concept Retrieval Technique**

*Gavin Hays*

1. Retrieval tasks require the test-takers to retrieve knowledge from memory without cues hinting to the correct answer, a process that is considered more cognitively demanding and an adequate measure of knowledge and understanding. *(this thesis)*
2. The scores for the Concept Retrieval Technique represent the knowledge network of a student, based on cognitive psychology research on how knowledge is organized in semantic networks of connected concepts. *(this thesis)*
3. The purpose of the Concept Retrieval Technique is similar to the approach of concept mapping. However, it addresses the shortcomings experienced in reliably scoring concept maps. *(this thesis)*
4. The Concept Retrieval Technique is based on the idea that a person can recall multiple concepts after another based on the strength of linkages that exist between the recalled concepts. *(this thesis)*
5. Clear instructions are required from the teacher regarding the responses that are expected from the student in undertaking the Concept Retrieval Technique. If these instructions are not conveyed it can impact on the reliability of the scoring process. *(this thesis)*
6. Feedback is one of the most powerful influences on learning and achievement, but this impact can be either positive or negative. *(Hattie & Timperley)*
7. To develop the application of knowledge and skills to new situations, students must possess a thorough knowledge base within and across academic domains. *(McTighe & Wiggins).*
8. The most important single factor influencing learning is what the learner already knows. Ascertain and teach them accordingly. *(David Ausubel)*
9. For assessment to function formatively, the results have to be used to adjust teaching and learning. *(Black and Wiliam)*
10. If we are to understand how teaching relates to learning, we have to begin at the closest point to that learning, and that is students' experience. *(Graham Nuthall)*

11. Memory is the residue of thought. What remains in your memory from an experience depends mostly on what you thought about during the experience. (*Daniel Willingham*)