

# 10 Fundamental Thesis Preparation Tips

Dr. Dario Toncich



## Tip Number 6 – A Rigorous Thesis Structure

Research theses span the spectrum of knowledge from the arts, business and humanities through to engineering, medicine and science. Diverse as these fields are, theses all tend to require the same basic elements. A thesis is not a novel but a vehicle for demonstrating that a research student has gained a particular set of skills that are required to become a professional researcher. The critical element in research training is rigor – following a systematic pathway from learning through peers to developing ways of extending knowledge and then impartially assessing the value of that knowledge. Research is not about random ideas / thought bubbles – and the thesis needs to reflect this.

Consider the following 7-Chapter Thesis Structure as a basic template for demonstrating the basic skills required in higher degree research:

1. **Introduction** – A statement of the research problem and environment, the basic hypothesis to be tested and the premise on which it is based
2. **Literature Review** – An examination of the work of learned peers in the field and how their research, findings and recommendations led to the methodology for the research
3. **Methodology** – A detailed description of the approach taken in order to test the hypothesis
4. **Experimental Design** – A detailed description of the methods used to validate/negate a hypothesis including experimentation, surveys, processes, modeling, etc.
5. **Experimental Results** – Tabulated, graphical or charted research outcomes that demonstrate the efficacy of the proposed methods against other existing benchmarks
6. **Broad Context Discussion of Results** – A contextual placement of the specific graduate research outcomes against the broad body of work carried out by learned scholars in the field
7. **Conclusions and Recommendations** – A summation of the hard outcomes relative to other work, a listing of the shortcomings/limitations of the research and recommendations for future research that might address shortcomings or extend the results of the work.