Writing Chapter 5: Discussion
Objectives of Workshop

• To gain a better understanding of the contents of a well-developed Chapter 5

• To introduce students to the subsections of the chapter

• To discuss ideas related to the presentation, interpretation, and implications of dissertation findings

• To present an outline of Chapter 5
Overview of Chapter 5

• A well-written Chapter 5 should include information about the following:
  – Summary of findings
  – Interpretation of findings
  – Context of findings
  – Implications of findings
  – Discussion on limitations of study
  – Discussion on future directions of research/field
Summary of Findings

• Begin with a summary of your results using little or no statistical jargon.
• Use “the layperson test”: How would you explain your findings to a relative?
• One way to organize this section is around whether findings did or did not support the study’s hypotheses or research questions.
• Make sure to include unusual findings as well (e.g., results that you did not expect to be significant but were, and vice versa).
Interpretation of Findings

• This section addresses the meaning of your findings.
• In some cases, when your results are in the direction you predicted, this meaning was anticipated when the study was designed.
• In cases where the results are not all in the desired direction, researchers must explain why this was not the case.
  – Address sampling, measurement, and procedural issues as well as confounding variables
• Keep in mind that the absence of significant findings does not necessarily mean the confirmation of the null hypothesis; explore alternative explanations.
Context of Findings

- Remember that your study, as important as it is, was not the only one in the area, and, as such, it must fit the existing literature.
  - Consider how the findings fit the Literature Review in terms of population characteristics, assessment instruments, independent variables, research design, and procedures.
  - Are your findings in agreement with existing literature? Do they contradict it? Do the findings extend previous research? Do they solve or clarify contradictions in the literature?
Implications of Findings

• This section addresses the issue of whether research findings improve (or change) the field’s understanding of the phenomenon under investigation.

• Consider the implication of findings in at least three areas: theory, research, and practice.
  – Are findings consistent with current theories in the field? Are they consistent with selected theoretical framework?
  – Does the study help advance research methodology? (e.g., understanding of new confounding variables, issues of measurement, issues of design)
  – Who may be interested in using these findings in a professional field? Why should they pay attention to the findings? Could the findings lead to changes in the way professionals “do” things?
Limitations

• Think of it as a “humility subsection.”

• In your proposal, you would have addressed potential limitations of the study as the final subsection of Chapter 3.

• Look at potential limitations as you initially proposed and then discuss those that may have affected—one way or another—your findings.
Limitations (cont.)

• Limitations typically originate in one of two sources: the study’s design and the study’s problems during implementation.

• Issues of design involve decisions about sampling, assessment, procedures, and choice of research design (poor match).

• Issues of implementation must be addressed (e.g., low sample, measurement issues, heterogeneous groups).
Limitations (cont.)

• Think of limitations in four major areas (but all four need to be present):
  – Internal Validity: unless the study is a “true experiment” one cannot claim that the IV “caused” changes in the DV
  – External Validity: issues of the extent to which findings can be generalized must be discussed
  – Measurement: discuss issues of reliability and validity of assessment instruments
  – Statistical analysis: discuss issues of power, effect size, conservative or liberal statistics and statistical test chosen
Future Directions

• Discuss findings in light of questions or issues that suggest future research directions.
• Extend the study to other populations.
• Think of other IVs and DVs that ought to be explored in the field, also, think of how to assess those additional variables.
• This is the section of the paper where most researchers are allowed to dream; think of extending your study to other questions that may add to the understanding of the issues.
Tips to Write Chapter 5

• Be a critical thinker; as you write your concluding remarks, play the devil’s advocate and put yourself in the shoes of your future readers.

• Avoid common mistakes:
  – If the numbers seem to suggest a direction but are not statistically significant, then don’t treat them as if they were significant
  – Do not use cause-effect language to refer to correlations
  – Do not think of statistical significance as effect size
  – Do not present new analyses in the discussion section
  – Do not make Chapter 5 a repetition of Chapter 4
ARC Guidelines

- Templates may be found in the *Applied Dissertation Procedures Manual* and at the ARC website.
- Chapter 5 is only submitted as part of the final dissertation report (i.e., not in the proposal)
- Additional headings, based on the student’s topic, may be included.
• Introductory paragraphs provide an overview of the study
• Results are elaborated and interpreted in sequence and relative to each research question
• Conclusions and summaries regarding the findings are offered
• Findings are linked to existing research
• Implications of findings are discussed
• Limitations are indicated
• Recommendations for future research are offered
Chapter 5 Outline

• Summary of Findings
  – Avoid technical detail
  – Use clear language

• Interpretation of Findings

• Context of Findings
  – Consider if there is convergent or divergent findings as compared to existing literature

• Implications of Findings
  – Theoretical implications
  – Methodological implications
  – Applied implications
Chapter 5 Outline (cont.)

• Limitations of Study
  – Internal and external validity issues
  – Measurement and statistical issues

• Future Directions

• Remember:
  – Be a critical thinker
  – Avoid common problems
  – Use an outline to write the chapter
Reference