**Reflection on Research Methods and Professional Practice Module**

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**Module:** Research Methods and Professional Practice  
**Word Count:** 1081 words  
**GitHub Repository URL:** <https://fahadsaleh19.github.io/E-Portfolio/research-methods.html>   
**Date:** 20 July 2025

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**1. Introduction**

The Research Methods and Professional Practice module provided an integrative learning experience by combining methodological rigor with professional awareness. Structured around three key questions proposed by Rolfe et al. (2001), “What?”, “So What?”, and “Now What?” This reflection explores my development throughout the course (Rolfe 2001). Drawing upon Dawson’s Projects in Computing and Information Systems (2015) and Berenson et al.’s Basic Business Statistics (2020) alongside peer collaboration and digital tools. This module helped me refine skills in literature review, data analysis, ethical research conduct, project management along with reflective practice. I reference Gibbs’ Reflective Cycle to deepen my introspection as well as future application (Ahmadpour 2025).

**2. What? – Description of Experience**

In the first units, we learned about research paradigms and ethical rules. I learned why it is important to have a clear research problem. I did short review on topics about technology and society. Ethics was a big focus. We talked about things like keeping data private, getting consent from people as well as protecting their information. These ideas were based on Dawson (2015). I filled out a sample ethics form. This helped me understand how important it is to follow university rules.

We were shown how to search for academic papers using Google Scholar and library databases. I learned the difference between primary and secondary sources. I learned how to look at research methods and decide if they are strong or weak. Using the PICO framework helped me make clear research questions. This made it easier to choose useful articles. I wrote research proposal. It included both qualitative and quantitative methods following what Dawson (2015) explained.

In this course, I learned about different types of data. I used Berenson et al. (2020) to study numbers and statistics. We looked at things like p-values, confidence intervals, and t-tests. I used Microsoft Excel to do these calculations. We learned about qualitative methods. This included interviews and finding common themes in answers. I did mock analysis on how students feel about online learning. I used method from Braun and Clarke (2006) to group answers into themes.

We learned how to make good surveys. I created a sample questionnaire using Google Forms. I used Likert scales and made sure the questions were clear. Later, we used Excel, SPSS, and R to look at the data. In SPSS, I did simple statistics, counted responses as well as ran regression tests. The technical depth of SPSS was at first intimidating but soon rewarding echoing my prior challenges in other statistical software (Miller 2024).

In the final units, I presented a mock research proposal and received peer feedback. We practiced writing abstracts and structuring academic reports. The last week emphasized reflective models, specifically those of Rolfe et al. (2001) and Gibbs' Cycle as tools for lifelong learning and professional development (Tullis, 2020).

**3. So What? – Analysis and Reflection**

**3.1 Personal and Academic Growth**

At first, I felt anxious about learning statistics, especially hypothesis testing. The formulas and terms were confusing. I was not alone, Conner (2025) says many students feel this way. This fear made it hard for me to understand and use statistics. But after using SPSS and Excel many times, I started to feel better. These tools helped me learn step by step (Conner, 2025).

On the other hand, I found qualitative work much easier. I liked reading open-ended answers. I enjoyed coding them. It felt calm and relaxing. This difference between stats and stories helped me see the value of mixed-methods research. It brings numbers and words together to give full picture (Creswell, 2017).

**3.2 Interpersonal and Professional Competencies**

The collaborative components, peer presentations, group critiques, and survey workshops greatly enriched my experience. One group activity involved debating ethical concerns in AI-driven research, which sharpened my ethical reasoning and communication skills. I often reflect on Schön’s (1983) concept of “reflection-in-action,” where immediate problem-solving is combined with professional learning (Schön 1983). These interactions enhanced my teamwork especially in sharing research roles like data entry, editing, and analysis.

**3.3 Dealing with Feedback and Revision**

Peer and tutor feedback on my data visualizations like unclear axis labels or misrepresented frequencies. This highlighted the importance of clarity in communication. I revised charts in Excel as well as adjusted visual cues.

**3.4 Self-awareness and Emotional Intelligence**

Reflecting on moments of confusion during hypothesis testing or data cleaning, I recognized frustration as a learning cue. According to Pekrun’s (2006) Control-Value Theory, emotions influence cognitive engagement (Pekrun 2006). Instead of withdrawing, I channeled discomfort into structured reflection, validating Gibbs’ model as practical emotional and professional development tool.

**4. Now What? – Future Application and Goals**

**4.1 Short-term Actions**

I will continue practicing data analysis in SPSS and begin familiarizing myself with R through short online courses (e.g., via Coursera). I plan to maintain an e-portfolio showcasing my mini research projects, coding skills, and reports, inspired by the structured portfolios we submitted in class.

SMART Goals:

* Complete one R course by November 2025.
* Submit journal-style literature review for peer feedback.
* Collaborate with classmates for a research workshop presentation.
* Integrate both statistical and narrative tools in future assignments.
* Finalize all these steps by the end of the academic year.

**4.2 Long-term Vision**

I want to build strong research and professional skills. This will help me do my final-year dissertation with confidence. I plan to use both surveys and interviews to study how people use technology. Each month, I will use Rolfe’s model to look at what went well and what was hard. I will then plan how to improve. I will use tools like Trello or Notion to track my tasks and reflections. This module has helped me understand what I want to do next. I now know that I want a career where I use research and work in an honest and professional way.

**5. Conclusion**

The Research Methods and Professional Practice course helped me grow in many ways. I learned about both technical and professional skills. At first, the content seemed hard. But with practice and feedback, I got better. I studied both quantitative and qualitative research. I learned about ethics and how to use research software. Using Rolfe et al.'s (2001) model helped me think deeply about what I learned. I used Gibbs’ cycle and emotional insight theory to guide my reflection. These tools helped me understand my learning better. Now, I see the value of reflection. It helps me improve in my studies and future career. This course gave me strong knowledge. More importantly, it changed the way I apply what I learn.

# References

Ahmadpour, N., Shariati, A., & Moghadam, M. P. 2025. "Effect of narrative writing based on Gibbs’ reflective model on the empathy and communication skills of nursing students." *BMC Medical Education* 25 (1): 10. Available at: https://link.springer.com/article/10.1186/s12909-024-06593-7 (Accessed: 21 July 2025).

Berenson, L., Levine, D., Szabat, K., & Stephan, D.F. 2020. *Basic Business Statistics: Concepts and Applications (14th ed.).* Pearson. Available at: https://api.pageplace.de/preview/DT0400.9781292265131\_A37749503/preview-9781292265131\_A37749503.pdf (Accessed: 21 July 2025).

Braun, V., & Clarke, V. 2006. "Using thematic analysis in psychology." *Qualitative research in psychology* 3 (2): 77-101. Available at: https://www.tandfonline.com/doi/abs/10.1191/1478088706QP063OA (Accessed: 21 July 2025).

Conner, H. 2025. "The Relationship Between NCLEX Pass Rates and Simulation Hours: A Quantitative Study (Doctoral dissertation, South College)." Available at: https://search.proquest.com/openview/5702850929947266b228ba1246b9b906/1?pq-origsite=gscholar&cbl=18750&diss=y (Accessed: 21 July 2025).

Creswell, J. W., & Clark, V. L. P. 2017. *Designing and conducting mixed methods research.* Sage publications. Available at: https://books.google.ae/books?id=eTwmDwAAQBAJ&printsec=frontcover&hl=ar&source=gbs\_ge\_summary\_r&cad=0#v=onepage&q&f=false (Accessed: 21 July 2025).

Dawson, C. 2015. *Projects in Computing and Information Systems: A Student’s Guide (3rd ed.).* Available at: https://repository.dinus.ac.id/docs/ajar/Projects-in-Computing-and-Information-Systems-A-Student%E2%80%99s-Guide-2nd-Edition-April-2009.pdf (Accessed: 21 July 2025).

Miller, A., & Pyper, K. 2024. "Anxiety around learning R in first year undergraduate students: Mathematics versus biomedical sciences students." *Journal of Statistics and Data Science Education* 32 (1): 47-53. Available at: https://www.tandfonline.com/doi/abs/10.1080/26939169.2023.2190010 (Accessed: 21 July 2025).

Pekrun, R. 2006. "The control-value theory of achievement emotions: Assumptions, corollaries, and implications for educational research and practice." *Educational psychology review* 18 (4): 315-341. Available at: https://link.springer.com/article/10.1007/s10648-006-9029-9 (Accessed: 21 July 2025).

Rolfe, G., Freshwater, D., & Jasper, M. 2001. "Critical reflection for nursing and the helping professions: A user's guide." Available at: https://philpapers.org/rec/ROLCRF (Accessed: 21 July 2025).

Schön, D.A. 1983. *The Reflective Practitioner: How Professionals Think in Action.* Basic Books.Available at: https://www.taylorfrancis.com/books/mono/10.4324/9781315237473/reflective-practitioner-donald-sch%C3%B6n (Accessed: 21 July 2025).

Tullis, J. G., & Goldstone, R. L. 2020. "Why does peer instruction benefit student learning?" *Cognitive research: principles and implications* 5 (1): 15. Available at: https://link.springer.com/article/10.1186/s41235-020-00218-5 (Accessed: 21 July 2025).