

PSY 540 Final Project Guidelines and Rubric

Overview

Within the professions of psychology, it can be typical for you to work on proposals for programs, studies, or new initiatives. For example, you may work for a university that regularly partners with foundations and corporations to identify grant opportunities for projects in local communities. The final project for this course is a project proposal that provides you an opportunity to draw upon your knowledge of cognitive psychology and demonstrate the key skills and abilities developed in this course to address a contemporary psychological problem, giving you critical exposure to how that problem impacts people's interactions in a professional setting. You will select an area of interest in cognitive psychology and one of the following applied settings: education, law, mental health, or technology. Your proposal may include brief references to an additional setting, but your focus must be on your primary applied setting choice. For example, you can select education as your primary applied setting as you research a contemporary problem related to memory processes and learning, but you may find that you want to also touch on memory disorders (i.e., mental health setting) within the scope of your project.

This project is supported by **four milestones**, which will provide you opportunities to work toward the final project throughout the course and improve the quality of your final submission. These milestones will be submitted in **Modules Two, Four, Six, and Seven. The final project will be submitted in Module Nine.**

Outcomes

These assessments will address the following course outcomes:

- Apply foundational theories of attention, learning, memory, language, and decision making to practical, contemporary problems
- Identify gaps in and propose improvements for practices in professional disciplines based on the strengths and limitations of human cognitive systems
- Assess foundational theories of cognitive psychology for their relevancy to real-world issues
- Interpret current research and statistical findings in cognitive psychology through the application of sound methodological principles
- Advocate for and defend the use of socially responsible strategies and techniques for improving upon human cognitive processes



Prompt

Approach your proposal by first identifying an area of cognitive psychology to address within your proposal: attention, learning, memory, language, or decision making. Then select an applied setting to connect with your selected area of cognitive psychology: education, law, mental health, or technology. You will focus on a contemporary problem that pertains to your selected area of cognitive psychology and your selected applied setting. For example, suppose that you selected "attention" as your area of cognitive psychology and "education" as your selected applied setting. Based on those selections, you will now have to identify a relevant contemporary problem. As an example, with the growth of online education, consider online students, the different factors competing for attention given the nature of the educational environment, and potential impact on success.

After you have identified your area of cognitive psychology, applied setting, and contemporary problem, you will select at least **two** relevant foundational theories within your selected area of cognitive psychology, keeping in mind your selected applied setting and contemporary problem. For example, in relation to attention, you may be interested in exploring Treisman's attenuation theory, which posits that information not being attended to "consciously" is still being processed. However, the information being attended to is being processed at a deeper level than the unattended information. Based on your review of related research, you will be required to formulate a research question that addresses potential improvements to practices in your selected applied setting based on the strengths of human cognitive systems. Lastly, you will devise an appropriate solution that will offer socially responsible strategies and techniques to address the problem.

The examples below can help provide further direction for your proposal. Keep in mind that you must identify a key topic or area of cognitive psychology, as well as an applied setting (education, law, mental health, or technology) in your proposal. In your proposal, you may briefly address secondary applied settings, as well:

Topic and Proposal Examples

Example 1:

Area of cognitive psychology: Attention

Applied setting: Education (with potential secondary applications in technology)

Example: A study that investigates online students, the factors competing for attention, and the impacts on educational success, and draws conclusions about the resulting societal implications for improving upon these human cognitive processes

Example 2:

Area of cognitive psychology: Memory (processes and disorders)

Applied setting: Mental health (with potential secondary applications in education)

Example: A mental health program designed to help the elderly improve memory and prevent memory loss due to Alzheimer's and/or dementia



Example 3:

Area of cognitive psychology: Decision making

Applied setting: Law

Example: A study that investigates decision-making processes of jurors in court cases

Topic Selection Resources

The following sites offer topics and news feeds on a variety of issues related to various areas of psychology.

<u>American Psychological Association</u> – Topics area Psychological Science in the News – News feed

Specifically, the following critical elements must be addressed in your proposal, in the following order:

- I. Problem Statement
 - a) Describe the **contemporary problem** that is the focus of your proposal with full details with respect to your selected applied setting.
 - b) Identify your **selected area of cognitive psychology** (attention, learning, memory, language, or decision making) and **appropriate foundational theories** that apply to your selected problem.
 - c) Describe **performance issues** in your selected applied setting based on **limitations** of human cognitive systems.
 - d) Create a research question that addresses **potential improvements** to practices in the applied setting based on the strengths of human cognitive systems. Remember that your research question should address your contemporary problem.
- II. Contemporary Relevance
 - a) Evaluate the **utility of the theories** you identified when describing your problem with respect to their strengths and limitations.
 - b) Which particular theory offers the greatest utility for practitioners to **apply in addressing real-world issues** specific to the contemporary problem you selected? Defend your selection.
- III. Interpretation of Research Findings: Explain how each primary or secondary resource you selected supports your research question. This is where you will apply sound methodological principles (by following the prompts below, a–b) to qualify the research results and statistical findings.
 - a) How do the research results and statistical findings apply to your research question?*
 - b) Explain the strengths and limitations of the research results and findings in supporting the research question. This is where you will explain how the research results and findings you have reviewed **support your research question** and specific gaps. In other words, in reviewing your sources, is there sufficient support for this research question? This is also where you would identify what research does not yet exist that is necessary in supporting the application of your research question.*



- IV. Methodological Principles: This is where you will look at your research question (critical element I, part d) and determine what types of strategies or techniques you would use if you were to hypothesize improving upon the problem in your selected applied setting. Remember, this is not limited to a controlled experiment.
 - a) What socially **responsible strategies and techniques** could be used for improving upon human cognitive processes specific to your applied setting?
 - b) What are the implications for using these strategies and techniques?

V. Conclusion

a) What potential future direction do you see from implementation of your research specific to addressing the contemporary problem you cited in critical element I, part a?

*Click <u>here</u> to access a list of approved publications, which has been provided to illustrate the standards of quality expected in the types of resources necessary in supporting this proposal.

Project Milestones

Milestone One: Topic and Setting Submission

In **Module Two**, you will draft a topic suggestion by identifying your particular area of interest in cognitive psychology (attention, learning, memory, language, or decision making), select an applied setting (education, law, mental health, or technology), and describe the contemporary problem as it relates to your topic and setting. Last, draft three potential research questions that explore potential improvements related to your topic and the applied setting. **This milestone will be graded using the Milestone One Rubric.**

Milestone Two: Annotated Bibliography

In **Module Four**, you will work from the topic, applied setting, and research questions you identified in Milestone One and start identifying relevant research to support your final proposal. You will complete an annotated bibliography featuring a minimum of four research articles. In your bibliography, you will reflect on how the research applies to your topic, explore strengths and limitations of the research, and propose ways to expand on the research. **This milestone will be graded using the Milestone Two Rubric.**

Milestone Three: Rough Draft of Final Proposal

In **Module Six**, you will submit a rough draft of your proposal and post the draft to the Module Seven discussion topic to be reviewed by one of your peers. The draft will include all the required elements of your final proposal and incorporate any relevant instructor feedback you received on Milestones One and Two. This draft submission represents an opportunity to receive targeted instructor feedback that you can use to improve your final proposal. **This milestone will be graded using the Milestone Three Rubric.**



Milestone Four: Peer Review of Rough Draft

In **Module Seven**, you will review a rough draft completed by one of your peers and provide feedback related to current strengths of the proposal, potential areas of clarification, and remaining questions. You will also respond to feedback that one of your peers provided on your own rough draft. **This milestone will be graded using the Milestone Four Rubric.**

Final Submission: Project Proposal

In **Module Nine**, you will submit your final project, a proposal exploring how you would address a contemporary problem of cognitive psychology within a specific setting. Throughout the course, you have had multiple opportunities to work on elements of this proposal and to fine-tune your thinking on your chosen topic. Your finalized proposal should incorporate feedback you have received from your instructor as well as your peers. **This submission will be graded with the Final Project Rubric.**

Deliverables

Milestone	Deliverables	Module Due	Grading	
1	Topic and Setting Submission	Two	Graded using the Milestone One Rubric	
2	Annotated Bibliography	Four	Graded using the Milestone Two Rubric	
3	Rough Draft of Final Proposal	Six	Graded using the Milestone Three Rubric	
4	Peer Review of Rough Draft	Seven	Graded using the Milestone Four Rubric	
	Project Proposal	Nine	Graded using the Final Project Rubric (on following page)	



Final Project Rubric

Guidelines for Submission: Written components of the proposal must follow these formatting guidelines when applicable: double spacing, 12-point Times New Roman font, one-inch margins, and APA citations. Your proposal should be approximately 8–10 pages, not including cover page and references, and use preapproved resources. (The submission should include a variety of research and findings from at least three of the provided publications. Click here to access the list of approved publications.)

Critical Elements	Exemplary (100%)	Proficient (90%)	Needs Improvement (70%)	Not Evident (0%)	Value
Problem Statement:	Meets "Proficient" criteria, and	Describes a contemporary	Describes the contemporary	Does not describe a	9
Contemporary	porary the details are well qualified problem in full de-		problem, but with gaps in detail	contemporary problem in any	
Problem with examples specific to the		respect to the applied setting	with respect to the applied	detail with respect to the	
	applied setting		setting	applied setting	
Problem Statement:	Meets "Proficient" criteria with	Explains aspects of foundational	Explains aspects of foundational	Does not explain aspects of	9
Selected Area	examples from real-world	theories, fully connecting them	theories, but with gaps in	foundational theories	
	situations	to selected problem	connecting them to selected		
			problem		
Problem Statement:	Meets "Proficient" criteria and	Identifies performance issues in	Identifies performance issues in	Does not identify performance	9
Performance Issues	is well qualified with examples	the selected fields (education,	the selected applied setting	issues in the selected applied	
and Limitations	from selected applied setting	law, mental health, or	(education, law, mental health,	setting (education, law, mental	
		technology), demonstrating	or technology), but connections	health, or technology)	
		clear connection to the	to the limitations of human		
		limitations of human cognitive	cognitive systems are unclear		
		systems			
Problem Statement:	Meets "Proficient" criteria and	Creates research question that	Research question addresses	Does not create research	9
Potential	is well qualified with examples	addresses potential	potential improvements to	question that addresses	
Improvements	from selected applied setting	improvements to practices in	practices in the applied setting,	potential improvements to	
		the applied setting based on the	but connections to the	practices in the applied setting	
		strengths of human cognitive	strengths of human cognitive		
		systems	systems are unclear		
Contemporary	Meets "Proficient" criteria, and	Evaluate the utility of the	Evaluates the utility of the	Does not evaluate the utility of	9
Relevance: Utility of	contrast of theories is well	foundational theories for	foundational theories for	the foundational theories	
Theories	qualified with real-world	practitioners with respect to	practitioners, but with gaps in		
	examples	their strengths and limitations	addressing their strengths or		
			limitations		
Contemporary	Meets "Proficient" criteria and	Selects theory and defends with	Selects theory but is unclear on	Does not select particular	9
Relevance: Apply	is well qualified with examples	explanation on how particular	how selection offers the	theory for practitioners to apply	
	in which the theory would not	theory offers the greatest utility	greatest utility for practitioners	in addressing real-world issues	
		for practitioners to apply	to apply in addressing real-		



	be applicable in real-world	specific to contemporary	world issues specific to		
	situations	problem selected	contemporary problem selected		
Interpretation of	Meets "Proficient" criteria and	Explains the research and	Explains the research and	Does not explain how the	9
Research: Question	is well qualified with examples	research findings with regard to	research findings, but does not	research and research findings	
	in which aspects of the research	how they apply to proposed	connect to proposed	apply to proposed	
	and research findings would not	improvements	improvements	improvements	
	be applicable to proposed				
	improvements				
Interpretation of	Meets "Proficient" criteria and	Explains the strengths and	Explains the research results	Does not explain the strengths	9
Research: Support	substantiates with specific	limitations of the research	and findings, but does not	and limitations of the research	
	examples of scholarly research	results and findings in	address strengths or limitations	results and findings in	
		supporting the research		supporting the research	
		question		question	
Methodological	Meets "Proficient" criteria and	Recommends appropriate,	Recommends appropriate	Does not make appropriate,	9
Principles: Strategies	substantiates strategies and	socially responsible strategies	strategies and techniques for	socially responsible	
and Techniques	techniques with scholarly	and techniques for improving	improving human cognitive	recommendations for strategies	
	research	human cognitive processes that	processes, but with gaps in	and techniques for improving	
		are applicable to applied setting	applicability to proposal	human cognitive processes	
Methodological	Meets "Proficient" criteria, and	Explains implications of the	Explains implications of the	Does not explain implications of	9
Principles:	the implications of the	strategies and techniques in full	strategies and techniques, but	the strategies and techniques	
Implications	strategies and techniques are	detail with respect to the	with gaps in detail with respect	with respect to the applied	
	well qualified with examples	applied setting	to the applied setting	setting	
	specific to the applied setting				
Conclusion	Meets "Proficient" criteria and	Explains potential future	Explains potential future	Does not explain potential	5
	substantiates with scholarly	direction from implementation	direction from implementation	future direction from	
	research	of research specific to	of research, but with gaps in	implementation of research	
		addressing the contemporary	how it is specific to addressing	study	
		problem(s)	the contemporary problem(s)		



Articulation of	Submission is free of errors	Submission has no major errors	Submission has major errors	Submission has critical errors	5
Response	related to citations, grammar,	related to citations, grammar,	related to citations, grammar,	related to citations, grammar,	
	spelling, syntax, and	spelling, syntax, or organization	spelling, syntax, or organization	spelling, syntax, or organization	
	organization and is presented in		that negatively impact	that prevent understanding of	
	a professional and easy-to-read		readability and articulation of	ideas	
	format		main ideas		
Earned Total					100%

Project Resources

In this course, you will synthesize quality research so that you can use your findings to develop your own solutions to contemporary issues. *Psychology Today* and other such publications developed for the mass consumer market are NOT appropriate resources upon which to base the research that informs your solutions in these projects. Below is a list of quality resources that are critical to your ability to map cognitive psychology concepts and theories onto real-world situations. Your work should be informed by a variety of resources from at least three of these publications. Use these resources to identify current research (less than five years old) and statistical findings that will inform your interpretation of the foundational theories in this course.

Shapiro Library Resource Guide for Undergraduate and Graduate Psychology Students

You are not limited to the publications listed below for informing your work. For additional research, you may wish to use this guide provided as a main jumping-off point to source quality research. This guide organizes and provides psychology students and faculty links to the Shapiro Library resources available in this field of study.

Association for Psychological Science

The Association for Psychological Science (previously the American Psychological Society) is a nonprofit organization dedicated to the advancement of scientific psychology and its representation at the national and international level.

Cognitive Psychology

This journal offers articles that focus on new theoretical advances in the study of attention, memory, language processing, perception, problem solving, and thinking.

Cognitive Science

This multidisciplinary journal brings together researchers from a variety of fields including but not limited to psychology, neuroscience, philosophy, and education, which will be valuable as you seek to apply your solutions in the fields of education and mental health.

Cognition, Technology & Work

This journal focuses on human interaction with technology in the context of work and working conditions, which will be valuable as you seek to apply your solutions in terms of interaction with technology in the workplace.



Law & Psychology Review

This journal combines the disciplines of law and psychology, which will be valuable as you seek apply your solutions specific to issues of law.

Memory & Cognition

This journal covers topics including but not limited to human memory and learning, conceptual processes, and problem solving.

Psychological Science

This journal offers the latest findings in cognitive, social, developmental, and health psychology, as well as behavioral neuroscience and biopsychology.

Trends in Cognitive Sciences

This journal provides a topic for research in cognitive science, which brings together the fields of psychology, artificial intelligence, linguistics, philosophy, and neuroscience, among others.

Topics in Cognitive Science

This journal offers topics specific to cognitive science.