

## Experimental-Basic

Level	1 (Beginner)	2 (Developing)	3 (Competent)	4 (Excellent)
Guiding context	<i>A description of what a beginning student looks like.</i>	<i>A description of what a slightly less than competent student looks like.</i>	<i>A description of what a competent student looks like.</i>	<i>A description of what an advanced student looks like.</i>
Research Design: Identify and develop a Research Question	Overly broad question and/or not applicable to the discipline.	Question is applicable to the discipline but requires refinement for intended audience and purpose.	Testable question appropriate to the discipline according to audience and purpose.	Testable question appropriate to the discipline according to audience and purpose within a specific context.
Methodology: Successfully experiment with one or more manipulated variables.	Failed to experiment with one or more manipulated variables.	Experimented with one or more manipulated variables but did not maintain adequate controls	Experimented with one or more manipulated variables while maintaining adequate controls.	Experimented with one or more manipulated variables with adequate controls and innovative experimental design.
Interpretation of Results: Analyze collected information to answer the research question.	No effort is made to analyze the results to support the research question.	Analysis to support the research question is made, but in a disorganized fashion.	Organizes the analysis of the results with little interpretive error.	Organizes the analysis of the results with no interpretive error.
Conclusions: Analysis conforms to research practices within the discipline.	Displays no knowledge of the existing research practices in the discipline and/or has significant errors in formatting and citation.	Does not articulate how their project contributes to the discipline and has significant errors in formatting and citation.	Articulates how their project contributes to the discipline but has some errors in formatting and citation.	Explains future applications of the project and properly employs discipline-specific formatting and citation.
Presentation: Communicate the project to the audience in a coherent and informative manner.	Failed to adequately engage the audience.	Failed to communicate in either a coherent or informative manner.	Adequately engaged the audience in a coherent and informative manner.	Professionally engaged the audience in a coherent and informative manner.