

Quantitative Research Questions

With quantitative research, while collecting and analyzing numerical data, we are searching for the relationship or patterns between two variables.

State Your Topic

First identify what you would like to research.

Student success on standardized tests

Identify Your Gap

Shift through research about your topic to help yourself narrow it down. Where does the gap lie? Where can you add to the conversation of research that is already available?

Ample research has been done on student success rates on standardized tests in relation to the schools' state developed curriculum; however, little research has been done on which strategies teachers can use when teaching the curriculum which influence success on standardized tests.

Define the **Problem**

Identify what problem you are trying to solve. This is essentially going to answer, why does your research matter?

There is a lack of clarity on the influence of theteacher's role in successfully engaging students in the curriculum.

Specify the Purpose

Identify what the purpose of your research is. What are you hoping to achieve?

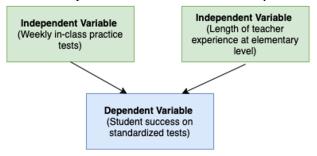
I want to identify what factors lead to increased success on standardized tests to empower educators with effective strategies to use.



Quantitative Research Questions

Identify Your Variables

What are your dependent and independent variables for this study?



Write the Question(s)

Before you write your question, ensure you know what you want to determine about your variables. Is it:

- 1. Cause-and-effect (casual relationships how does one thing impact another)
- 2. Observation (descriptive do you simply want to describe what relationship exists without speaking about the actual cause of that relationship?)

Questions

Based on the information above, you can then derive quality research questions. Remember, at Westcliff, we are writing three. Consider the following tips:

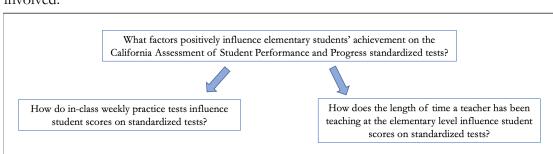
- (a) Starting your questions with how many, how often, how frequently, what percentages, what proportion
- (b) Use verbs such as: do, use, impact, affect, influence, effect, exceed (or for other ideas, see here)

Central Question

This question is the most general of your questions. Though, please note, you still want this to be narrow enough for you to actually answer based on your findings.

Sub-Questions

Determine two sub-questions to your central question. To determine further questions, consider thinking through elements related to the procedure or potentially issues involved.





Quantitative Research Questions

Ensure Alignment

After writing the question, look back at your problem and your purpose. Ensure you can answer yes to the following:

- Will these questions help you to find information that will address this problem?
- Will answering these questions help you accomplish your purpose?

Quality Research Question Tips

Ensure the question is	Explanation
Manageable	Is it too big to answer through your study? Or is it too small?
Specific	Does each question focus only on one topic and problem?
Legitimate	Is it a question and not a statement? Is it an open-ended question and not a yes/no question?
Clear	Will others understand what you are studying? (Consider asking a peer to review and tell you what they think you are attempting to study)