



Formulating SMART Research Objectives

Welcome to Week 2 of our research methods course. Today, we'll explore how to develop effective research objectives that will guide your study from conception to completion. By the end of this session, you'll be able to craft your own SMART research objectives.

Understanding Research Fundamentals

The Research Hierarchy

Topic: The general subject area you're investigating

Aim: The overall purpose or goal of your research

Objectives: Specific, concrete steps to achieve your aim

Think of your topic as the territory, your aim as the destination, and your objectives as the map that guides you there.



SMART Research Objectives



Specific

Clearly define what you're investigating, avoiding vague or general statements. Focus on particular aspects, variables, or relationships.



Relevant

Align objectives with your research aim and ensure they contribute meaningfully to your field of study.



Measurable

Ensure your objective can be measured or assessed in some way. Include quantifiable elements where possible.



Time-bound

Include a timeframe or deadline for achieving each objective, creating structure and urgency.



Achievable

Set objectives that are realistic given your resources, time constraints, and access to data or participants.

From Objectives to Research Questions

Well-crafted objectives naturally lead to focused research questions. Each objective can generate one or more questions that your research will answer.

The relationship is cyclical - sometimes you start with questions that help you formulate objectives, and sometimes objectives help you refine your questions.

Key Connection Points:

- Variables identified in objectives become central to questions
- Measurement approaches in objectives inform methodology
- Time boundaries in objectives structure your research timeline



Strong vs. Weak Objectives



Strong Objective

"To measure the impact of daily 30-minute mindfulness practice on stress levels among 50 undergraduate students over an 8-week period using validated psychological assessment tools."



Weak Objective

"To look at how mindfulness affects students"

Problems: Not specific, no measurement approach, no timeframe, no sample size, too broad.

More Examples Analyzed

Weak	Strong	Improvement
"To study climate change effects."	"To quantify changes in coastal erosion rates in Norfolk between 2000-2023 using satellite imagery and identify correlation with sea level rise."	Added specificity, measurement method, location, timeframe
"To explore gender differences."	"To compare leadership styles between male and female CEOs in Fortune 500 companies through structured interviews and leadership assessment inventories by December 2024."	Added context, methodology, population, deadline

Workshop Task Instructions

Your Assignment

1. Select a research topic in your field of interest
2. Formulate one overarching research aim
3. Develop three SMART objectives that support your aim
4. For each objective, draft a potential research question

You'll have 30 minutes to complete this task. We'll then share and provide peer feedback on your objectives.





Key Takeaways

1 Research Structure Matters

Understanding the hierarchy of topic, aim, and objectives creates a solid foundation for your research.

2 SMART Criteria Ensure Quality

Applying the SMART framework helps transform vague ideas into actionable research objectives.

3 Objectives Guide

~~Methodology~~ Methodology naturally inform your research questions and methodological choices.

4 Practice Makes

~~Perfect~~ Developing strong research objectives is a skill that improves with practice and feedback.