Qualitative versus Quantitative?
Research design

“the plan of a study that organises observations in such a way as to establish a sound logical basis for causal inference”

(Manheim et al. 2012, 422)
How do I know I am right?
(or at least not completely wrong)
Research design

• Should help to ‘connect the dots’

• Should help to disentangle rival hypotheses

• Should allow you to claim external validity
Rival Hypotheses

• A random sample of 1000 people showed that people who watch public broadcasting have a better political knowledge than those who do not. The effect is large and statistically significant

• -> support for public funding of RTE?
Rival Hypotheses

• Perhaps level of education impacts both
• Perhaps those who watched the RTE could have learned more doing something else
• People who watch the RTE also have time to read newspapers, etc.
Different types of research design

• Experimental research

• Observational research
  – Survey research
  – Content analysis
  – Participatory observation
  – Discourse analysis
  – ... (many more)
Qualitative v. Quantitative

- Stylized overview of different research traditions/cultures/approaches
- Labels themselves disputed
Qualitative research: an example

Study: Skocpol (1979)
From: Gerring (2007)
Quantitative research: an example

FIGURE 3
THE RELATIONSHIP BETWEEN POLICY CHANGE AND PRIOR OPINION CHANGE

Differences

**Qualitative**
- Small-N
- Many variables
- Many different types of observations
- Methods: Interviews, participant observation, focus groups, document analysis

**Quantitative**
- Large-N
- Few variables
- Similar types of measurements
- Methods: experiments, surveys, quantitative content analysis
## Approaches to explanation

<table>
<thead>
<tr>
<th>Qualitative</th>
<th>Quantitative</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Causes of effects</strong></td>
<td><strong>Effects of causes</strong></td>
</tr>
<tr>
<td>How can we explain the success of populist parties in Western Europe?</td>
<td>What is the effect of public broadcasters on political knowledge?</td>
</tr>
</tbody>
</table>
Which of the following is a causes-of-effects study?

1. What is the effect of gender on voting behaviour?

2. How can we explain the success of the military intervention in Mali?

3. Are men more likely to receive a high salary than women?
Conceptions of causation

Qualitative

*Necessary and sufficient causes*

Democracies invade non-democracies if there is a conflict AND they stand to gain from ending the conflict.

Quantitative

*Correlational causes*

*Mean causal effect*  
\[ = \text{Mean treatment} - \text{Mean control} \]

Opposition parties are more likely to ask parliamentary questions than government parties.
# Multivariate explanations

<table>
<thead>
<tr>
<th>Qualitative</th>
<th>Quantitative</th>
</tr>
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<tbody>
<tr>
<td>Multiple causal paths</td>
<td>Additive causation</td>
</tr>
<tr>
<td>$Y = (A \text{ AND } B \text{ ANC } C) \text{ OR } (B \text{ AND } D \text{ AND } E)$</td>
<td>$Y = b_0 + b_1 \ast A + b_2 \ast B + b_3 \ast C$</td>
</tr>
</tbody>
</table>
Scope and generalization

Qualitative

Narrow scope

Quantitative

Broad scope ->

generalization
Lack of fit

**Qualitative**

Only a few cases, so all cases should fit.

**Quantitative**

It’s about overall fit of the model, not fitting particular cases.
Quantitative versus qualitative?

- Both of value
- Complement each other
- Qualitative: identify factors that may matter
- Quantitative: do these factors generalize?