Case Study Research - Overview

Literature

Collier, D., Mahoney, J. (1996) Insights and Pitfalls: Selection Bias in Qualitative Research, *World Politics* (49) 1, pp. 56-91.

Flyvbjerg, B. (2006) Five Misunderstandings about Case-Study Research, *Qualitative Inquiry* (12) 2, pp. 219-245.

Gerring, J. (2007) Case Study Research. Principles and Practices, Cambridge: Cambridge University Press.

Gerring, J. (2008) Case Selection for Case-Study Analysis: Qualitative and Quantitative Techniques, in: Box-Steffensmeier, J. M., Brady, H. E., Collier, D. (eds.) The Oxford Handbook of Political Methodology, Oxford: Oxford University Press, pp. 645-684.

Posner (2004) The Political Salience of Cultural Differences: Why Chewas and Tumukas are Allies in Zambia and Adversaries in Malawi, The American Political Science Review (98) 4, pp. 529-545.

Yin, R. (2008) Case Study Research. Design and Methods, Thousand Oaks: Sage Publications.

(Influential) Accounts based on Case-Study Methodology:

Moravcsik, A. (1998) The Choice for Europe. Social Purpose and State Power from Messina to Maastricht, Ithaca and New York: Cornell University Press.

Friedman, M., Schwartz, A. J. (1971 [1963]) A Monetary History of the United States. 1867-1960, Princeton: Princeton University Press.

Haughton, G, Allmendinger, P., Counsell, D., Vigar, G. (2010) The New Spatial Planning. Territorial Management with Soft Spaces and Fuzzy Boundaries, London and New York: Routledge.

Strengths

- Research Question: Why/How? (qualitative rather than quantitative RQ)
- In-depth small N-analysis: focus on causal relationships (explains a large proportion of variance)
    - exploratory (hypothesis generating) *or* explanatory (hypothesis testing)
- Corroborate/refute theoretical claims (i.e. private ownership superior to commons)
- Contribute to human learning (Kuhnian notion of knowledge generation through exemplars)

Challenges

- *Boundaries* between the phenomenon and the context are not clearly evident (Yin 2008)
- Representativeness: trade-off between parsimony and external validity (Collier&Mahoney 1996)
- Causal leverage: Little/No Control
- More variables than data points = how to isolate necessary/sufficient variables?
    - Remedy: *multiple* sources of evidence (data *triangulating*), natural experiments (i.e. Posner 2004), increase variation of both independent *and* dependent variables
- Selection bias = systematic error; sources: self-selection, endogeneity, truncation (also selection on dependent variable), omitted variables

Selection Techniques

In order to *isolate* a sample of cases that both reproduces the relevant causal features of a larger universe (**representativeness**) and provides variation along the dimensions of theoretical interest (**causal leverage**), case selection for very small samples must employ purposive (**non-random**) selection procedures (Gerring, 2008, p. 645)

1. Typical
- *Definition*: Cases (one or more) are typical examples of some cross-case relationship.
- *Cross-case technique*: A low-residual case (on-lier).
- *Uses*: Hypothesis testing.
- *Representativeness*: By definition, the typical case is representative.

2. Diverse
- *Definition*: Cases (two or more) illuminate the full range of variation on X_1, Y, or X_1/Y.
- *Cross-case technique*: Diversity may be calculated by (a) categorical values of X_1 or Y (e.g., Jewish, Catholic, Protestant), (b) standard deviations of X_1 or Y (if continuous), or (c) combinations of values (e.g., based on cross-tabulations, factor analysis, or discriminant analysis).
- *Uses*: Hypothesis generating or hypothesis testing.
- *Representativeness*: Diverse cases are likely to be representative in the minimal sense of representing the full variation of the population (though they might not mirror the *distribution* of that variation in the population).

3. Extreme
- *Definition*: Cases (one or more) exemplify extreme or unusual values on X_1 or Y relative to some univariate distribution.
- *Cross-case technique*: A case lying many standard deviations away from the mean of X_1 or Y.
- *Uses*: Hypothesis generating (open-ended probe of X_1 or Y).
- *Representativeness*: Achievable only in comparison to a larger sample of cases.

4. Deviant
- *Definition*: Cases (one or more) deviate from some cross-case relationship.
- *Cross-case technique*: A high-residual case (outlier).
- *Uses*: Hypothesis generating (to develop new explanations of Y).
- *Representativeness*: After the case study is conducted, it may be corroborated by a cross-case test, which includes a general hypothesis (a new variable) based on the case study research. If the case is now an on-lier, it may be considered representative of the new relationship.

5. Influential
- *Definition*: Cases (one or more) with influential configurations of the independent variables.
- *Cross-case technique*: Hat matrix or Cook's distance.
- *Uses*: Hypothesis testing (to verify the status of cases that may influence the results of a cross-case analysis).
- *Representativeness*: Not pertinent, given the goals of the influential-case study.

6. Crucial
- *Definition*: Cases (one or more) are most- or least-likely to exhibit a given outcome.
- *Cross-case technique*: Qualitative assessment of relative crucialness.
- *Uses*: Hypothesis testing (confirmatory or disconfirmatory).
- *Representativeness*: Assessable by reference to prior expectations about the case and the population.

7. Pathway
- *Definition*: Cases (one or more) where X_1, and not X_2, is likely to have caused a positive outcome (Y=1).
- *Cross-case technique*: Cross-tab (for categorical variables) or residual analysis (for continuous variables).
- *Uses*: Hypothesis testing (to probe causal mechanisms).
- *Representativeness*: May be tested by examining residuals for the chosen cases.

8. Most-similar
- *Definition*: Cases (two or more) are similar on specified variables other than X_1 and/or Y.
- *Cross-case technique*: Matching.
- *Uses*: Hypothesis generating or hypothesis testing.
- *Representativeness*: May be tested by examining residuals for the chosen cases.

9. Most-different
- *Definition*: Cases (two or more) are different on specified variables other than X_1 and Y.
- *Cross-case technique*: The inverse of the most-similar method of large-N case selection (see above).
- *Uses*: Hypothesis generating or hypothesis testing (eliminating deterministic causes).
- *Representativeness*: May be tested by examining residuals for the chosen cases.

Gerring 2007, p. 88-89