

CASE STUDY RESEARCH

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by

Twine Bananuka, PhD

School of Distance & Lifelong Learning

Philosophical Underpinnings

- Both Stake (1995) and Yin (2003) base their approach to case study on a constructivist paradigm. Constructivists claim that truth is relative and that it is dependent on one's perspective. This paradigm "recognizes the importance of the subjective human creation of meaning, but doesn't reject outright some notion of objectivity.
- Ontologically, constructivism believes in relativism, since knowledge is a social construct of the knower. Epistemologically, the researcher must take a subjective position as the only way to unlock positions held by individuals, including the inquirer. The methodological approach is dialectical as a means of harmonizing the sophisticated positions (Bananuka, 2014)

Case study in postgraduate research

- Has become the most popular approach among postgraduate students (Qi, 2009, Rule & John, 2011) b'se:
 - Offers flexibility in terms of focus and methods
 - Enables students to study their own work context or a related context in depth (issues around them)
 - Offers versatility: can be used in conjunction with other approaches, e.g. Life history, action research, survey.
 - They are strong on reality & they catch unique features that may otherwise be lost in large scale data
 - They can be undertaken by a single researcher

The notions of “Case study” and “case”

- The case study should have a “case” which is the object of study. The “case” should:
 - be a complex functioning unit,
 - be investigated in its natural context with a multitude of methods, and
 - be contemporary.

What is a case?

- The concept of *case* is not well defined and remains a subject of debate.
 - ▣ The case may be a relatively bounded object or a process;
 - ▣ it may be theoretical, empirical, or both (Ragin & Becker 1992).
 - ▣ At a minimum, a case is a phenomenon *specific to time and space*.

Case as 'unit of analysis'

- The unit of analysis is the basis for the case.
 - ▣ It may be an individual person, an event, (such as a decision, a programme, an implementation
 - ▣ Process or organisational change, or an organisation or team or department within the organisation.
 - ▣ It can sometimes be difficult to identify the boundaries of the unit of analysis.
 - ▣ A key issue is that the case study should only ask questions about the unit of analysis, and any sub-units; sources of evidence and the evidence gathered are determined by the boundaries that define the unit of analysis.

Defining case study

- An empirical inquiry that investigates a contemporary phenomenon in depth and within real-life context, especially when the boundaries between phenomenon and context are not clearly evident' (Yin, 2009)
- A systematic and in-depth investigation of a particular instance in its context in order to generate knowledge (Rule & John, 2011).

Purpose for case study research

- Wallace (1998, p.164) suggest that case study research is aimed at:
 - Solving particular problems
 - Applying theories into practice
 - Generating hypotheses
 - Providing illustrations

Key features of case study

- Case referred to as a 'bounded system'
- Focus on the individual unit: 'science of the singular'
- Usually qualitative, but can include quantitative data
- Crucially concerned with an understanding of people's own meanings and perspectives
- Multiple methods of data collection (illuminate a case from different angles)
- Rich, thick/in-depth description of the phenomenon
- Focus on real contexts, recognizing that context is a powerful determinant of both cause and effects

Doing case study research



- Make sure that you find an interesting case
- Make sure you have good people skills
- Gather rich data and try to establish the context

What makes an exemplary case study?

- The case study must be ‘interesting’
 - The case study must display sufficient evidence
 - The case study must be ‘complete’
 - The case study must consider alternative perspectives
 - The case study should be written in an engaging manner
 - The case study should contribute to knowledge
- One case study is fine! A common error: sampling logic

Comparing case study and survey

Case study

Intensive

Depth

Focus on single instance

Usually qualitative, can
use mixed methods

Survey

Extensive

Breadth

Focus on representative
sample

Usually quantitative

Types of case study (Stake, 1995)

Intrinsic

Focuses on the case because it is interesting in itself, e.g. 'The prison as university: the case of Robben Island'

Instrumental

Focuses on the case in order to investigate a broader issue, e.g. 'A case study of curriculum change in a high school'

Types of case study (Stake, 1995)

contd ...

- Multiple or collective case study is where a number of cases are jointly studied together to explain a phenomena.
- It can also be seen as a collection of instrumental cases studies ([Stake, 2005](#); [Tight, 2010](#)).

Types of case study (Yin, 2003)

Exploratory	Often examines a phenomenon that has not been studied before, lays basis for further study
Explanatory	Attempts to explain what happens in a particular case or why it happens. Can be used to test or generate theory
Descriptive	Presents complete description of a phenomenon in its context

These can further be divided into two types – ‘holistic’ or ‘embedded’ i.e. Holistic when there is only one unit of analysis and embedded when it has a subunit or a main unit and subunits of analysis (Casey & Houghton, 2010)

Types of case study (Bassegy, 1999)

Categorises
case study
according to
ultimate goal

- Theory-seeking or theory-testing,
- Story-telling or picture-drawing and
- Evaluative case studies.

Reflective task

- From the article of:
- Asmussen K.J & Creswell J.W (1995). Campus response to a student gunman. *Journal of Higher Education*, 66(5) 575-591
- Identify the aspects or characterises of case study in this article
- List down the process of Case study Research design

Reflective task contd ...

Aspect of case study	Campus response to student gunman
Type of case study	
Unit of analysis	
Boundedness	
Sources of data	
Context	
Chronology of the case/events	
Can findings be generalised?	
Do you see any emerging theory?	

TYPE OF DATA AND ANALYSIS

- Ideally data collection and analysis follows protocols as in other designs. What is critical is the ability to blend the multiple data sources and analysis

Data analysis contd ..

- In a case study of EDF examining the linkage between adult education and community development, Bananuka (2014) notes:
 - Data analysis involved several cycles of both deductive and inductive processes. Deductively, codes were pre-assigned based on literature and theoretical frameworks leading to the generation of some themes.
 - Inductively, flexibility was allowed in order to accommodate emerging themes through open-coding, during data collection and at the end, using NVivo software
 - The resulting information was therefore a blend of pre-generated themes and emerging categories and themes from the data.

Campus response to a student gunman

(Aspects of case study)

Bounded System	<ul style="list-style-type: none">• Time—6 months of data collection• Place—situated on a single campus• Single Case—campus community• The reactions of the groups on campus
Multiple Sources of Information	<ul style="list-style-type: none">• Initial Interviews Campus administrators, students, newspaper reporters• Expanded Interviews Campus informants and gathered observational data, documents and audio visual materials
Case Description	<ul style="list-style-type: none">• Narrative structure to describe details including edited quotes from the informants and stating the interviewers interpretations of the events• Considerable time describing the setting for the case
Case Based Themes	<ul style="list-style-type: none">• Denial• Fear• Safety• Retriggering• Campus planning (Preparedness)

Identifying and selecting the case

- What is the case?
- What is it a case of?

The inclusion of a learner with a physical disability in the ordinary school setting: a case study

- Case Learner with a physical disability
- Focus Inclusion
- Setting Ordinary school

Four ways of linking theory and case study

1. Theory of the case
2. Theory for the case
3. Theory from the case
4. Between theory and case

1. Theory *of* the case

- A case study assumes a theory of:

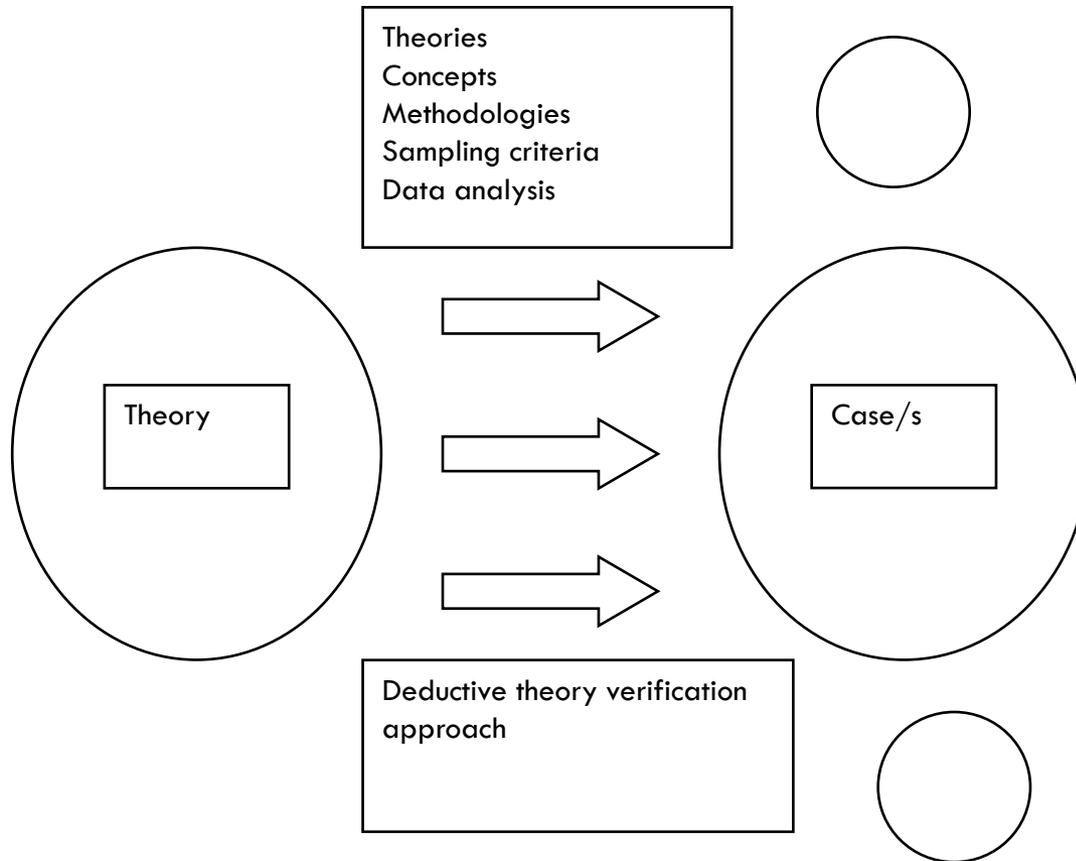
what a case is in general;

what the case in the study is;

what it is a case of.

- E.g. “a bounded system”; “a single instance”
- E.g. “A rural primary school”
- E.g. class of rural primary schools

2. Theory *for* the case



A sequential model of theory-based case study

- **THEORY**


Presents the theory, e.g. Senge's theory of learning organisations
- **CASE OR CASES**

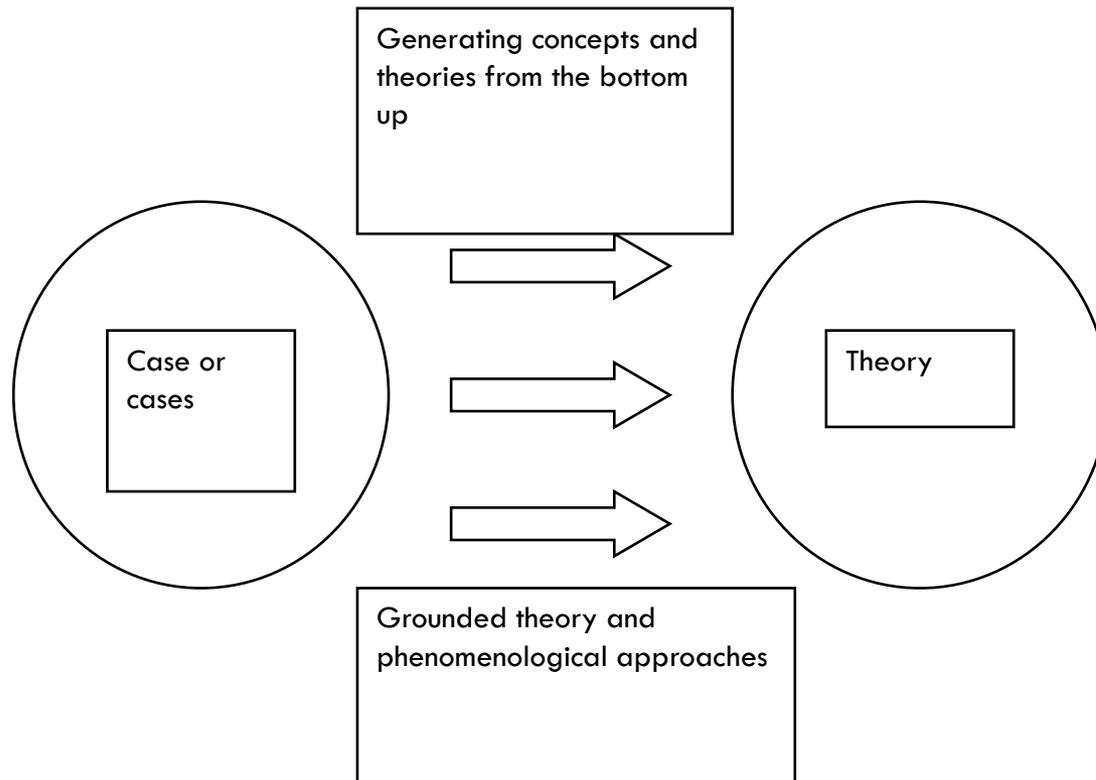

Introduces and presents the case/s, e.g. three successful African companies in the IT sector
- **APPLICATION OF THEORY TO CASE/S**


Discusses the companies in relation to the theory of learning organizations, e.g. the extent to which they exemplify systems thinking, personal mastery and team learning.
- **CONFIRMATION
MODIFICATION
REJECTION OF
THEORY**


Discusses the usefulness of the theory in relation to these cases, i.e. the extent to which the cases confirm or disconfirm the theory.
- **EFFICACY OF THEORY**

Draws conclusions about the theory. e.g. confirming, elaborating, modifying or rejecting it.

3. Theory *from* the case



A sequential model of a theory-building case study

- CASE OR CASES



- DETAILED CASE/S PRESENTATION



- ANALYSIS OF PATTERNS WITHIN/ACROSS CASES



- THEORY CONSTRUCTION

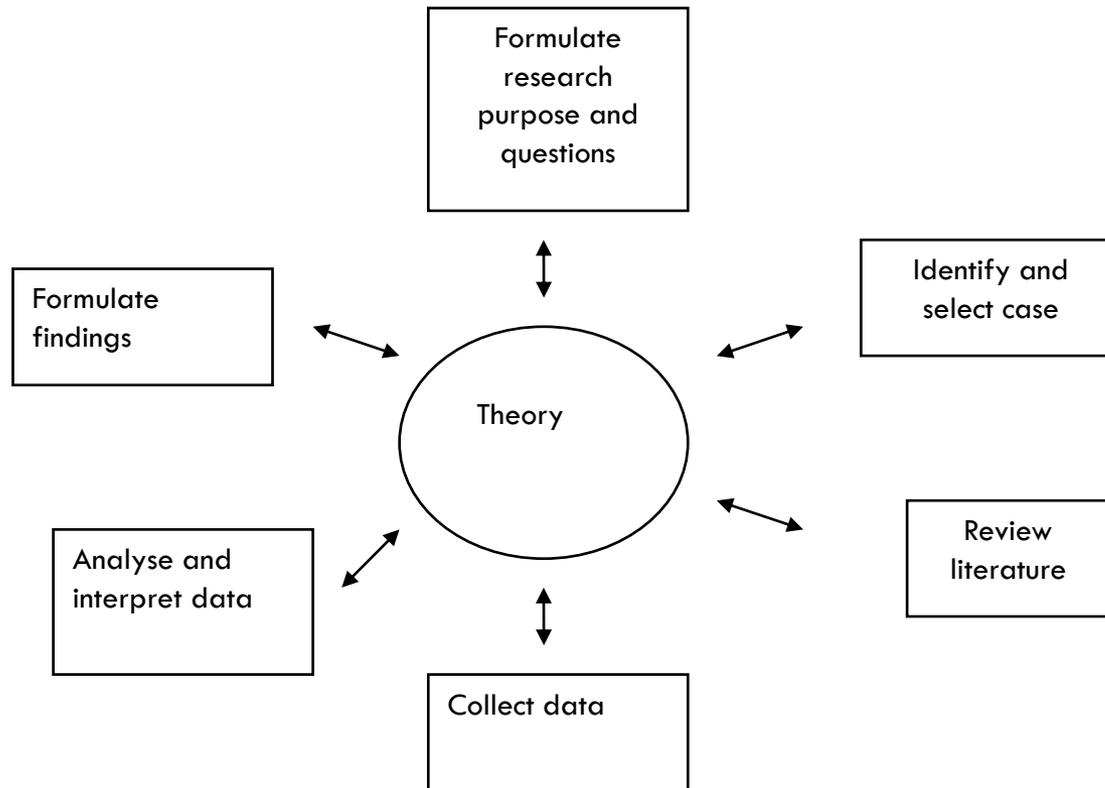
Introduces and presents the case/s, e.g. three successful African companies in the IT sector

Provides a detailed narrative and/or thick description of each case regarding their policies, practices and structures related to learning.

Through processes of open, axial and selective coding and memo-making, identifies patterns and generates themes relevant to organizational learning.

Generates concepts, models or theories built on the themes and patterns emerging from the data.

4. *Between* theory and case: A dialogical model



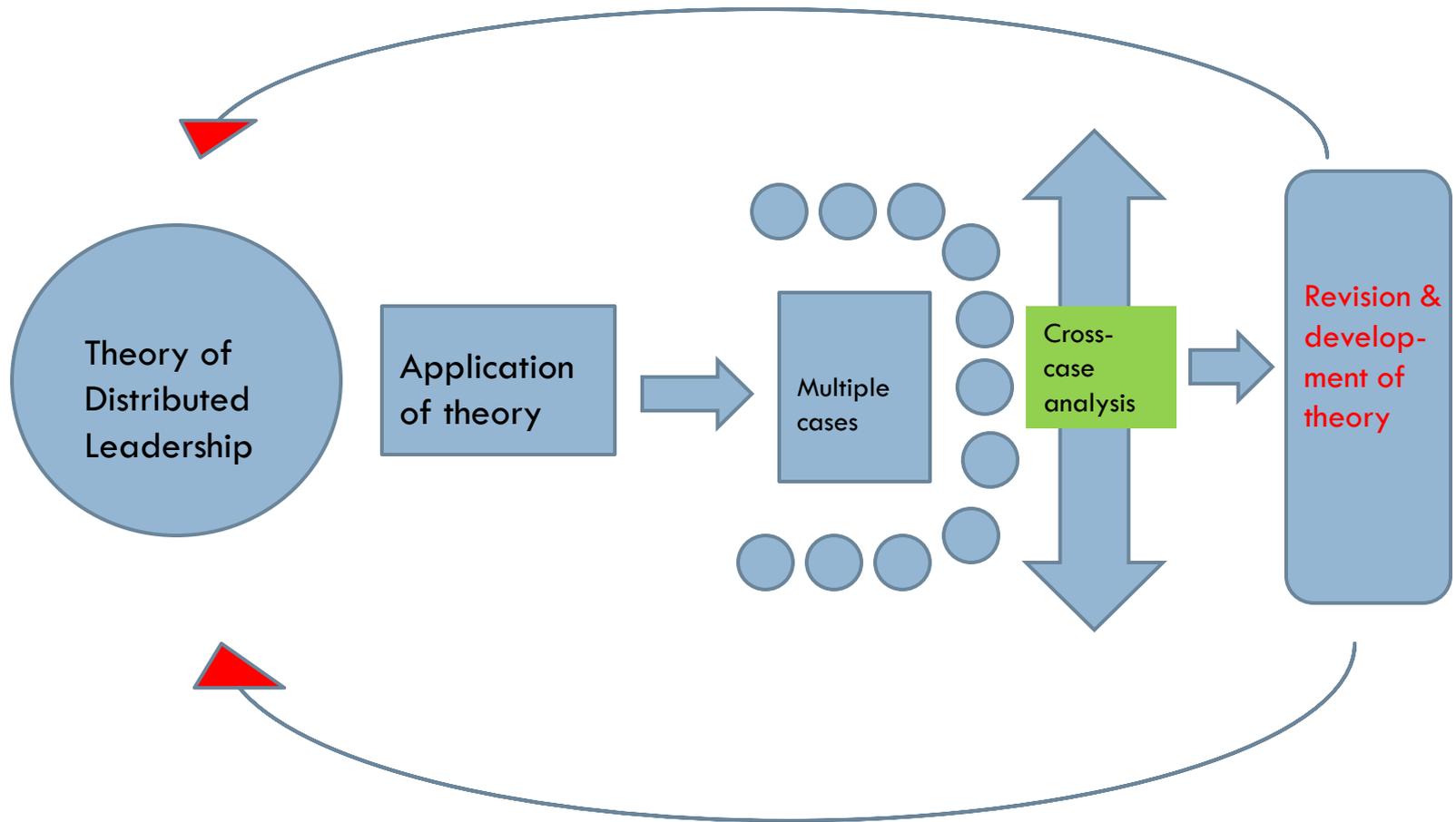
A dialogical approach to theory in case study

- Research as a recursive process
- Constant backwards and forwards movement between theory and research at different stages of the research process
- Theory and research as mutually constitutive

Thinking about theory in a multi-case study

- Focus on teacher leadership in 11 schools in KZN;
- Applied theory of distributed leadership;
- Used same key research questions and methods in each case;
- Able to make some overall findings regarding applicability of distributed leadership in KZN context.

Across-case analysis and theory development



Individual task

Based on the knowledge of case study research, develop a research idea /topic around your work/study place

Study title	
Type of case study	
Brief problem statement/study focus	
Unit of analysis	
Study objectives	
Research questions	

Recommended Readings

- Yin, R. K. (2009). *Case Study Research: Design and Methods* (Fourth ed.). Thousand Oaks: Sage Publication, Inc.
- Rule, P., & John, V. (2011). *Your guide to case study research*. Pretoria: Van Schaik.
- Bassegy, M. (1999). *Case Study Research in Educational Settings: Doing Qualitative Research in Educational Settings*. Berkshire: Open University Press.
- Stake, R. E. (2005). Qualitative Case studies. In N. K. Denzin & Y. S. Lincoln (Eds.), *Handbook of Qualitative Research* (Third ed., pp. 443-462). Thousand Oaks: Sage Publications.

Limitations of case study designs

- Selection & findings bias
- Generalisability, particularly of single case studies
- Very demanding to carry out
- Difficulty in gaining access to the particular company or group of companies that you want to study
- The researcher has no control over the situation

Limitations of case study designs

contd ...

- Reliability & Validity (at least as it is understood in quantitative research) may be hard to establish
 - ▣ Construct validity (establishing correct operational measures for the concepts being studied)
 - ▣ Internal validity (establishing a causal relationship)
 - ▣ External validity (establishing the domain or population to which a study's findings can be generalized)
 - ▣ Reliability (demonstrating that the study can be replicated with similar results)

Do these limitations mean no research?

- Rowley (2002): Generalisation for case studies is not statistical generalisation, but analytical generalisation in which a previously developed theory is used as a template with which to compare the empirical results of the case study
- Cohen, et al. (2007): Generalization takes various forms, i.e. from a single instance to the class of instances that it represents, from features of the single case to a multiplicity of classes with the same features and from the single features of part of the case to the whole of that case.
- Vissak (2010): Generalization is possible, even with a single case study, depending on the nature of that particular case and how it was selected.

Mitigating the limitations associated with case study design

- As in all qualitative research, use of multiple methods of data collection improves the quality of the research as it allows triangulation, reduces the respondent bias, provides additional information, increases support for the researcher's conclusions, and may lead to new questions that can be answered in later research.
- Subjecting the draft case description to the informants for correcting inaccuracies, getting additional information and obtaining their agreement that the story is correct.

PhD thesis using case study method

- Bananuka Hannington Twine
- Janice Busingye Desire
- Ephraim Nuwagaba
 - ▣ All available on the website of the University of KwaZulu-Natal, South Africa. However, I can avail them to you on request sent to: twineb@gmail.com



□ *End*

□ *I Thank you for
your audience*