



PRACTICAL RESEARCH 1 DAY 1 - Q4

HERBERT P. VARGAS

RESEARCH METHODOLOGY

- a general approach a researcher takes in carrying out the research project (qualitative , quantitative or mixed)

RESEARCH DESIGN

- a general structure that guides the data collection and analysis in order to address a research problem.

COMMON RESEARCH DESIGN (QUALITATIVE)

Case study – is an in-depth examination of an individual group of people or entity for a defined period of time and usually does not intent to generalized it conclusion to greater population.

Ethnography – to understand how behavior reflect the culture of a group in its natural setting

Phenomenological study – understand an experience from the participants' point of view “lived experience” to particular situation.

COMMON RESEARCH DESIGN

Grounded theory– collects data relevant to a research problem and uses them to develop a new theory about a particular phenomenon.

Content analysis –characteristics of a body of material is systematically examined in order to detect general patterns, themes or biases; the material typically involve some form of verbal, visual or behavioral human communication

Historical – concerns the identification, evaluation and synthesis of data from the past to confirm or reject a hypothesis.

| Method | Focus | Sample Size | Data Collection |
|------------------|--|-------------|--|
| Ethnography | Context or culture | — | Observation & interviews |
| Narrative | Individual experience & sequence | 1 to 2 | Stories from individuals & documents |
| Phenomenological | People who have experienced a phenomenon | 5 to 25 | Interviews |
| Grounded Theory | Develop a theory from grounded in field data | 20 to 60 | Interviews, then open and axial coding |
| Case Study | Organization, entity, individual, or event | — | Interviews, documents, reports, observations |

PLANNING RESEARCH DESIGN

- Establishing the purpose
- Methods and strategies you intend to use
- Review of scope and limitation of the study
- Nature or types of data and research problems

POPULATION AND SAMPLING

- identify the sample and describe in detail the manner in which it will be chosen.
- Naturally, if you are including all possible subjects, you are dealing with a population.
- In this case, you describe the characteristics of the population.
- Discuss why you use the type of sampling

SAMPLING (NONPROBABILITY)

- no way of predicting or guaranteeing that each element of the population will be represented in the sample
- Some member of the population have little or no chance of being sampled.

1. PURPOSEFUL SAMPLING

- use to recruit participants who can provide in-depth and detailed information about the phenomenon under investigation. It is highly subjective and determined by the qualitative researcher generating the qualifying criteria each participant must meet to be considered for the research study.

PURPOSIVE SAMPLING

- An example of this would be a student who seeks to look at current nurses' perceptions of leadership styles within a specific hospital setting. This one sentence description alone can already generate two selection criteria:
- (a) must be an active nurse and
- (b) must work at a specific hospital setting. Additional criteria such as number of years in the field or level of nursing education will ensure participants have a similar foundation.

2.) CONVENIENCE SAMPLING (ACCIDENTAL SAMPLING)

- **use to recruit participants who are easily accessible and convenient to the researchers.**
- Oftentimes this may include utilizing **geographic location** and **resources that make participant recruitment convenient.**
- An example of this would be a teacher who wanted to examine the perceptions of teachers about a policy change and decided to utilize a school within the district he or she worked in to recruit participants

2.) CONVENIENCE SAMPLING (ACCIDENTAL SAMPLING)

- a professional who is a **member of a professional organization and wanted to recruit participants** through contact information available to members of that organization. Both examples would be convenient to each researcher but would also require obtaining permissions to recruit participants (from the district and professional organization respectively).

2.) CONVENIENCE SAMPLING (ACCIDENTAL SAMPLING)

- Supposed you own a small restaurant and want to sample the opinion of your patron on the quality of food and service
- You open at 9am and for 5 days you question 50 of your early morning arrival (40 male and 10 female)
- Heavily lopsided polls in favor of men

3.) QUOTA SAMPLING

- Variation of convenient sampling
- Select respondent in the sample proportions from the general population but not in a random fashion.
- Decide while designing the study how many people with which characteristics to include as participants.
Characteristics might include age, place of residence, gender, class, profession, marital status, etc.

QUOTA SAMPLING

- use recruitment strategies appropriate to the location, culture, and study population – find people who fit these criteria, until we meet the prescribed quotas
- Consider a population of 20 Asian American and 20 European American without any attempt to select them randomly from the population

QUOTA SAMPLING

- Then a reporter put a mic and a camera beside a main street in a particular city. As people pass by you interview them.
- All you need are the opinion of 20 people in each category
- Regulates only the size of each category within the sample. The selection is nonrandom and convenient at the same time.

4.) SNOWBALL SAMPLING

- also known as **chain referral sampling** – is considered a type of purposive sampling. In this method, participants or informants with whom contact has already been made use their **social networks to refer the researcher** to other people who could potentially participate or contribute to the study.
- Snowball sampling is often used to find and recruit “hidden populations,” that is, groups not easily accessible to researchers through other sampling strategies.

5. THEORETICAL SAMPLING

- used for grounded theory study
- Inclusion and exclusion criteria in sampling

NONPROBABILITY SAMPLING

| Sampling Type | Description |
|---------------|--|
| Purposive | seeks out elements that meet specific criteria. |
| Convenience | gathers data from whatever cases happen to be convenient. |
| Quota | selects cases from within several different subgroups. |
| Snowball | relies on participant referrals to recruit new participants. |

FACTORS IN DETERMINING SAMPLE SIZE

- Homogeneity of the population –the more they are the same the smaller the sample size
- Degree of precision desired by the researcher – the larger the sample the higher the accuracy
- Types of sampling procedures

APPROACHES IN DETERMINING SAMPLE SIZE

- A sample size of 30 are generally adequate to ensure that the sampling distribution of the mean will approximate the normal curve
- Total population is equal to or less than 100. this same number may serve as the sample size. (universal sampling)
- Slovin's Formula is used to compute for the sample size.

$$n = \frac{N}{1 + ne^2}$$

RESEARCH DESIGN SAMPLE

This study utilized the **qualitative type** which according to Nieswiadomy (2004) is a naturalistic method of inquiry of research, which deals with the issue of human complexity by exploring it directly. In here the emphasis is on the complexity of humans, their ability to shape and create their own experience and the idea that truth is a composite reality This study also utilizes the **case study method**.

RESEARCH DESIGN SAMPLE

Case study method involve a comprehensive and extensive examination of a particular individual, group or situation over a period of time.it provide information on where to draw the conclusion about the impact of significant event in a person's life.(Sanchez, 2002)

RESEARCH DESIGN SAMPLE

The design is fitted to this present study since the focus is on the psychological processes of a group of students who failed on their academic performance in Physics, soliciting their personal view and perceptions relative to the queries given by a panel of interviewers during the third quarter of the school year _____.