

## ROHINI COLLEGE OF ENGINEERING AND TECHNOLOGY PALKULAM BUSINESS RESEARCH METHODS

UNIT III DATA COLLECTION

# **SAMPLING DESIGN Population**

A population is an identifiable total group of aggregation of elements.

For Example:People, Products, Organizations, Physical Entities that are of interest to the researcher and pertinent to the specified information problem.

## **Element:**

An element is a person or object from which data and information are sought.

## Sampling units:

Are the target population elements available for selection during the sampling process.

## Sampling frame:

After defining the target Population the researcher must assemble a list of all eligible sampling units, referred to as a sampling frame.

## Characteristic of a good sample design

## 1. Goal orientation:

The sample design should be oriented to the research objectives, tailored to the survey design, and filtered to the survey conditions.

#### 2. Measurability:

A sample design should enable the computation of valid estimates of its sampling variability normally this variability is expressed in the form of standard errors in surveys

#### 3. Practicality:

This implies that the sample design can be followed properly in the survey as it also refers to simplicity of the design.

#### 4. Economy:

It implies that the objectives of the survey should be achieved with minimum cost and effort.

#### **ADVANTAGES OF SAMPLING:**

- 1. Sampling is cheaper than a census survey. It is obviously more economical for instance to cover a sample of households than the entire household in a territory although the cost per unit of study may be higher in a sample survey than in a census survey.
- 2. Since the magnitude of operation involved in a sample survey is small, both the execution of the fieldwork and the analysis of the results can be carried out speedily.
- 3. Sampling results in greater economy of effort, as a relatively small staff is required to carry out the survey and to tabulate and process the survey data.
- 4. A sample survey enables the researcher to collect more detailed information than would otherwise be possible in a census survey. Also information of a more specialized type can be collected which would not be possible in census survey on account of the availability of a small number of specialist.

5. Since the scale of operation involved in a sample survey is small. The quantity of the interviewing supervision and other related activities could be better than the quality in a census survey.

## LIMITATIONS OF SAMPLING:

- 1. When the information is needed on every unit in the population such as individual, dwelling units a business establishment a sample survey cannot be of much help for it fails to provide information on individual count.
- 2. Sampling gives rise to certain errors of these errors are too large, the results of the sample survey will be of extremely limited use.
- 3. While in a census survey it may be easy to check the omissions of certain units in view of complete coverage this is not so in the case of a sample survey.

#### DATA

Data refers to information or facts. Often researcher understand by data only numerical figure. It also includes descriptive facts, non-numerical information, qualitative and quantitative information. Data could be broadly classified as:

#### **Primary Data:**

It is known as the data collected for the first time through field survey. Such data are collected with specific set of objectives to assess the current status of any variable studied. Primary data are generally information gathered or generated by the researcher for the purpose of the project immediately at hand. When the data are collected for the first time, the responsibility for their processing also rests with the original investigator.

## Secondary data

It refers to the information or facts already collected. Such data are collected with the objective of understanding the past status of any variable. Secondary data can be obtained internally ie within the firm or external from one or more outside agencies.

Sources

