

LESSON – 5

Statistics – Meaning, Scope And Needs In Economics

Summary

The term ‘statistics’ is derived from the Latin word ‘statista’ means political state. In olden days statistics was used to collect information for proper functioning of state affairs. But, by the passes of time the study of statistics has proved its relevance in almost all discipline of entire education system, It also provides a basis for government to formulate planning and policies and also run good administration for welfare of common people. The study of economics is defined as a field of study relating to the collection, organization, presentation, analysis and interpretation as well as facts and figure related to statistical data. In this lesson we will discuss about meaning, scope and needs of economics and its various functions and limitations.

Need and Scope of Statistics

a) Need for Statistical Data

Statistics plays a pivotal role to understand various concept of economics in which statistical data are used like per capita income, national income, economic growth & development etc. Statistics is widely used in economics are as follows-

- In the Formulation of Economic Theory
- In Economic Planning
- In the formulation of the policy of the government
- To Reveal the Structure of an Economy

(b) Scope of Statistics

In ancient time, was used by the government for the purpose of running administration. But now a days, it is widely used as tool of all sciences. There is hardly any field whether it be natural science or social science where statistical tools not used. The word statistics is used two ways:**(a) the plural sense,**

(b) the singular sense.

- In plural sense, it refers to the quantitative information or simply statistical data.
- In Plural sense, it refers to method or methods used in arriving at the quantitative information or dealing with it.

Importance of Statistics in Economics

- Statistics and Study of Consumption
- Statistics and Study of Production
- Statistics and Study of Exchange
- Statistics and Study of Distribution

Meaning and Characteristics of Statistics

Meaning

In plural sense, facts expressed numerically are called statistics such as data relating to income, production, population, Prices etc

In other words, statistics means numerical statement of facts

Characteristics

- Statistical data are Aggregates of Facts
- Statistics are affected by multiplicity of causes
- Statistical Data are Numerically expressed
- Collected in a Systematic Manner
- Statistical Data Must be Obtained From Reasonable Degree of Accuracy
- Statistical Data are Collected for Pre-Determined Purpose

Statistics in Singular Sense

In singular sense, Statistics mean science of statistiocs or statistical method. It refers to technique or methods relating to collection, classification, Presentation, analysis and interpretation of quantitative data.

Stages of Statistical Enquiry

- Collection of Data
- Organization of Data
- Presentation of Data
- Analysis of Data
- Interpretation of Data

Stages of Statistical Enquiry

5. Interpretation of Data

4. Analysis of Data

3. Presentation of Data

2. Organization of Data

1. Collection of Data

Functions of Statistics

- Statistics Simplifies Complex Data
- Statistics Provides a Technique of Comparison
- Statistics Studies Relationship between two or more Variable
- Statistics Helps in Formulating Policies
- Statistics Provides the Basis of Forecasting
- Statistics Helps to Test and Formulate Theory

Limitation of Statistics

- It does not study qualitative aspect of problems
- It does not study individuals
- Statistical laws are true only on an average
- Statistics can be misused
- Statistical results lack mathematical accuracy

Evaluate Yourself

Q. “Statistics plays a very important role in economics.” How?

Q. Briefly describe various stages of statistical enquiry.

Q. Define statistics in plural sense and also mention of its various characteristics.

Q. “How can you say that the study of economics provides the basis for formulation of policy and decision making process.”