

The production Function.

In modern Technology the Various factors like land, labour, capital, Organization skill, raw materials and other factors made use of in production are given a wider connotation called Inputs. The products realized due to the inputs is called outputs. Inputs Indicate the cost involved in procuring various factors, commodities as raw material, power etc

Production function shows for a given state of technology and managerial ability, the maximum rates of output than can be obtained from different combinations of the productive factors during a period of time or unit of time.

* The production function can be algebraically expressed in the equation.

$$q = f(a, b, c, d \dots n)$$

* The production function is the name given in the table between the rates of input of productive services and the rate of input of productive services and the rate of output product.

Production Function - Table:

Let us assume that for providing a commodity only two inputs viz... labour and capital are required.

The table shows the quantity of output produced with some combination of two inputs.

Production Function

Output X Per unit of Table.

| INPUT OF CAPITAL | 6 | 692 | 980 | 1200 | 1386 | 1550 | 1692 |
|------------------|---|-----|-----|------|------|------|------|
| | 5 | 632 | 896 | 1296 | 1264 | 1410 | 1550 |
| | 4 | 564 | 800 | 980 | 1128 | 1264 | 1386 |
| | 3 | 490 | 692 | 846 | 980 | 1096 | 1200 |
| | 2 | 400 | 564 | 692 | 800 | 896 | 980 |
| | 1 | 282 | 400 | 490 | 564 | 632 | 692 |

Input of Labour.

Assumptions of production function:

1. It is related to a particular unit of time.
2. The technical knowledge during that period of time remains constant.
3. The factors of production are divisible into most viable units.
4. The producer is using the last technique available.