Difference between short-run and Long run production function.

(i) During the short period, It is not possible for the firms to change its all factors of production. While in the long period production function, the supply of factors of production function can be adjust to the required output

(ii) Under short run, the firm can change the supply of inputs only to a limited extent. While in the long run, all inputs may be increased or decreased in desired way.

(iii) Under short run, producer may vary the proportion of factors of production. While in long run, factor may increased in the same proportion

(iv) Under short run, the cost of the variable factors does not remain constant. Their cost may vary according to the demand and the supply while in the long run it may constant.

(v) Short run production function is related to to 'the law of variable proportion'. While long-run production function relates to to the law of 'returns to scale.'

(vi) Short run production function is realis-tic while long run production is little theoretical importance.

* Land, capital, capital equipments, production technology etc are fixed factor in short period while labours are variable factors of production.