HUMAN CAPITAL FORMATION IN INDIA

Human capital refers to stock of skill and expertise of engineers, doctors, professors and workers of all types who are engaged in the process of production.

Human capital formation refers to the process of adding to the stock of human capital over time.

Good human capital produces other human capital. Thus, we need investment in human capital to produce more human capital out of human resources.

DETERMINANTS / SOURCES OF HUMAN CAPITAL FORMATION

Determinants of human capital refers to sources of human capital formation i.e. it refers to ways of adding to the stock of human capital.

Some of the ways of adding to the stock of human capital are:

(A)<u>Expenditure on Education</u> – Expenditure on education is the most productive way to enhance the productivity of labour force in the country.

Many families are ready to incur huge expenditures on education, even if they have to raise loans because they are aware that returns on such expenditures will be very high.

Education **improves the standard of living of the labour**. His total earnings during his life span would far exceed his initial expenditure on education.

(B) Expenditure on Health – Expenditure on health is an important determinant of human capital formation.

Expenditure on health makes a man more efficient and more productive. His contribution to the production process tends to rise. He tends to contribute more to GDP of the nation than a sick person.

Some of the forms of expenditure done on health are:

- * Expenditure on preventive medicines (vaccination)
- * Expenditure on curative medicines (medical intervention during illness)
- * Expenditure on social medicine
- **(C)** On-the-job training Production units and business firms spends huge sum of money on providing training to their employees in order to enhance their skills and to make them more productive. Generally, such type of trainings take

place in those fields where technological advancements takes place on a regular basis.

Two forms of on-the-job training are –

- (a) The workers may be trained within the organization under the supervision of skilled worker,
- **(b)** The workers may be sent for **off-campus training**.

Expenditure on such training is a source of human capital formation because benefits from enhanced labour productivity is more than the cost of it.

(D) <u>Migration</u> – Expenditure on migration is another source of human capital formation. People migrate from one place to another in search of better jobs and higher incomes.

Migration involves certain costs such as cost of transportation; higher cost of living in migrated place; psychic costs of living in a new social and cultural environment.

The enhanced earnings in the new place must be better than such costs then only individuals can benefit from migration.

(E) <u>Expenditure on information</u> — Expenditure on acquiring all sorts of information regarding labour markets, educational institutions, health care facilities etc. is also an important source of human capital formation.

Individuals should spend some time and money on acquiring such information if they want better results in the future.

HUMAN CAPITAL FORMATION AND ECONOMIC GROWTH

There is a cause and effect relationship between human capital and economic growth: Human capital formation stimulates the process of economic growth and economic growth also impacts human capital formation.

An increase in stock of human capital leads to an increase in per capita real income through increase in level of productivity and efficient utilisation of physical capital and resources.

This leads to increase in level of employment in the economy. Higher income facilitates higher investment on education and health which further enhances the stock of human capital.

Some of the ways through human capital formation contributes to the process of growth and development –

- (a) <u>Higher productivity of physical capital</u> Skilled labour force can better handle physical capital than unskilled ones. Investment on human capital formation enhances the productivity of labour force and thus accelerates the path of economic growth.
- **(b)** <u>Innovative skills</u> Larger the number of skilled and trained personnel, greater the possibilities of innovations in different areas and sectors. Innovations are required in the economy from time to time to make better utilisation of scarce resource.
- (c) <u>Higher rate of participation and employment</u> By enhancing production capacities of the labour force, human capital formation induces greater employment.

This increases the rate of participation i.e. percentage of labour force participating in the process of production.

Higher the rate of participation, greater is the degree of economic and social equality in the society.

PROBLEMS OF HUMAN CAPITAL FORMATION IN INDIA

Main problems of human capital formation in India are:

- (a) <u>High poverty levels</u> A large proportion of population lives below poverty line and they do not have access to basic education facilities and health care facilities. This creates hindrances in their development and thus affect overall growth and development of the economy.
- **(b)** <u>Rising population</u> A large population requires huge investment in education and health. Increase in population affects the quality of human capital formation in the country as it reduces per capita availability of existing facilities.
- (c) <u>Brain Drain</u> Migration of skilled labour from rural to urban areas or from backward areas to developed areas or from one country to another affects the overall economic development of the country and development of backward areas of the country.
- **(d)** <u>Insufficient on-the-job training</u> In many sectors productivity level of labourers in not up to par with current technology because sufficient on-the-job training is not provided to them.

(e) <u>Deficient man power planning</u> – Enough efforts have not been made from the government side to maintain a balance between demand and supply of labour in the economy.

In India there is a huge stock of graduate labour who is ready to work but is unable to do so because of less demand in the market. Thus, there is huge wastage of man power in India.

DIFFERENCE BETWEEN HUMAN CAPITAL AND PHYSICAL CAPITAL

Human capital	Physical capital	
1. Human capital is intangible in nature	1. Physical capital is tangible in nature and	
and it cannot be sold in the market; only	it can be easily sold in the market.	
the services of human capital can be sold in the market.		
2. Human capital is inseparable from the owner.	2. Physical capital is separable from its owner.	
3. Human capital creates both private and social benefits.	3. Physical capital creates only private benefits.	
4. Human capital depreciates due to ageing but the rate of depreciation can be reduced through investment in education and health.	4. Physical capital depreciates due to passage of time, obsolescence, continuous usage etc.	

TERMS

- **1.** <u>Physical capital</u> Physical capital refers to stock of fixed assets which is used during the production process. Greater the stock of physical capital, greater the production capacity.
- **2.** <u>Brain-Drain</u> It refers to migration of skilled manpower to developed countries of the world.

HUMAN CAPITAL AND HUMAN DEVELOPMENT

Human capital and Human development are **related concepts** but **they are different.**

Human capital treats human beings as a medium to an end; the end being increase in productivity. As per human capital view, any investment in

education and health is unproductive if it does not enhance output of goods and services.

Human development treats human beings as ends in themselves. According to this view, every individual has a right to get basic education and basic health care. Thus, human welfare should be increased through investment in education and health even if such investments do not lead to increase in labour productivity.

EDUCATION

Education implies the process of teaching, training and learning especially in schools and colleges. It improves knowledge and develops skills.

According to Census 2011, 74.04% of the population is literate.

Education and literacy are not identical terms. While all educated people are literate, all literate people are not necessarily educated.

Literacy is ability to read and write. Education consists of three parameters i.e. primary, secondary and tertiary education.

IMPORTANCE (OBJECTIVES) OF EDUCATION

- 1. It helps **economic development** through greater participation of the people in the production process.
- 2. It facilitates better and efficient utilisation of human and natural resources.
- 3. It tends to bring down birth rates, which helps in **reducing the population growth rate.**
- 4. It promotes rational and scientific thinking of the people.

GOVERNMENT EXPENDITURE ON EDUCATION

Expenditure done by the government on education can be measured in two ways:

- (a) <u>as a percentage of total government expenditure</u> (It expresses expenditure on education as a percentage of total government expenditure). **It indicates** importance of education in the government objectives and policies.
- (b) <u>as a percentage of GDP</u> (It expresses expenditure on education as a percentage of GDP). It expresses how much of our income is being committed to development of education in the country.

- During 1952-2014, expenditure on education as a percentage of total government expenditure increased from 8% to 16% (approx.) and as a percentage of GDP increased from 0.6% to 4.13%.
- Throughout this period expenditure on education has not been uniform and there has been irregular rise and fall.
- Government spends a large sum of money on development of elementary education whereas per capita expenditure in tertiary education is maximum.

Reports of government organizations

- (a) Education commission (1964-66) recommended that at least 6% of GDP be spent on education over the years. But government's current level of expenditure is less i.e. around 4%.
- (b) Tapas Majumdar Committee, appointed by the government of India in 1998, estimated an expenditure of 1.37 lakh crores over a period of 10 years (1998-2009) to bring all Indian children in the age group of 6-14 years under the purview of school education.

SOME STEPS TAKEN BY THE GOVERNMENT

(a) RTE (Right to Education)

In the year 2009 government of India has brought an act called RTE which promises free and compulsory education to all.

It makes education a right for all children in the age group of 6-14 years.

- (b) Government of India has started levying a **2% education cess on all union taxes.** Government spends revenue from education cess on elementary education.
- (c) Government sanctions a large sum of money for the promotion of higher education and it also encourages banks to announce new education loan schemes for students so that they can pursue higher education.

FUTURE PROSPECTS

- (A) <u>Education for all still a distant dream</u>: Though the literacy rates have increased over time, still the absolute number of illiterates in India is very high. Around 36% of the total population is illiterate.
- **(B)** <u>Gender Equity Better than Before</u> There is significant gender-bias in providing education opportunities to male and female children. The enrolment ratio is relatively low for female candidates and their drop out ratio is considerably high.
- (C) <u>Higher Education a few takers</u> In India no. of students going in for higher education is very less as compared to the developed nations. Thus government should increase its expenditure on higher education and also improve the standard of higher education institutions so that students are imparted employable skills in such institutions.

NCERT QUESTIONS

- 1. What are the two major sources of human capital in a country? Ans. Investment in education and health
- **2. What are the indicators of educational achievement in a country?** Ans. Adult literacy rate, primary education completion rate and youth literacy rate.
- (a) <u>Adult Literacy Rate</u> This rate indicates the <u>percentage of the literate adult</u> population who are aged 15 years and above. Higher the literacy rate, higher the educational achievement in a country. This is the most important rate as it indicates the percentage of the population that can participate in the economic activity of the country.
- (b) <u>Youth Literacy Rate</u> This rate indicates the **percentage of literate people** between the age of 15-24 years. Youth literacy rate tends to be higher than adult literacy rate as many individuals leave their education after primary education or secondary education.

It is an important indicator because it gives an idea about the percentage of population who has completed studies till higher education.

(c) <u>Primary Education Completion Rate</u> – This rate indicates the <u>percentage of students who have completed the last year of primary school</u>. Lower primary

education completion rate leads to lower youth literacy rate and thus lower adult literacy rate.

3. Why do we observe regional differences in educational attainment in India?

Ans. There exists a difference in the pattern of education in India. Some states such as Kerela, Tamil Nadu etc. have higher literacy rates than national average and some states such as Bihar, Orissa, Rajasthan have lower literacy rates.

In many occasions it has been observed that states where employment opportunities are less and where standard of living is very low and level of poverty is high, education is given less importance. People living in backward regions prefer so send their children to work at farm or at factories rather than sending them to schools and colleges in order to enhance their skills and knowledge.

Similarly, expenditure made by governments in various states on education is less as compared to the required investment. Thus, these states tend to lag behind in terms of growth and development.

4. Bring out the difference between Human Capital and Human Development. Ans.

Basis of difference	Human Capital	Human Development
1. Concept	It is a narrow concept.	It is a broader concept .
2. Means of productivity	It considers education and health as a means to increase labour productivity.	It considers that education and health are integral to human wellbeing since only when people have the ability to read and write and the ability to live a long and healthy life then they will be able to make better choices.
3. Welfare	In human capital, investment in education and health is unproductive if it does not enhance production of goods and services.	In human development, human welfare should be increased through investments in education and health care even is such investments do not result in high labour productivity and production.

5. How is human development a broader term as compared to human capital?

Ans. Human capital is a narrow concept which treats human beings as a means to achieve an end which is higher productivity, failing which the investment in human beings is not considered to be productive.

Human development is a broader concept which considers human beings as end in themselves. Human welfare can be achieved through investment in education and health. According to this view, every individual has a right to get basic education and basic health care. Thus, human welfare should be increased through investment in education and health even if such investments do not lead to increase in labour productivity.

6. What factors contribute to Human capital formation? [NOTES]

7. How government organisations facilitates the functioning of schools and hospitals in India?

Ans. The Union Ministry of education and Ministries of education at state level and various organisations such as NCERT, UGC AND AICTE facilitate the functioning of schools and institutions related to education.

- (A) <u>NCERT (National Education Research and Training)</u> It is a government organization which is basically engaged in designing text material upto the senior secondary level.
- (B) <u>UGC (University Grants Commission)</u> It is a govt. organization which frames rules and regulations for higher education in the country. It is the organization which primarily funds education at university level.
- **(C)** <u>AICTE (All India Council of Technical Education)</u> It is a govt. organization which frames rules and regulations for technical / engineering colleges and institutes in the country.

Similarly, the ministries of health at the Union and State level, Departments of health and various organizations such as ICMR look after the functioning of schools and hospitals in India.

<u>ICMR (Indian Council for Medical Research)</u> – It frames rules and regulation relating to education and research in the health sector.

8. Education is considered to be an important input for the development of a nation. How?

Ans. Education is an essential element of human resource development. Education refers to the process of teaching, training and learning that is provided in schools or colleges in order to improve knowledge and develop skills.

Importance of education for an individual and nation:

- (a) <u>Higher Productivity</u> Educated and skilled labour force will be more productive and efficient in using the scarce resources. This will lead to an increase in level of productivity and thus an increase in level of GDP Growth rate.
- **(b)** <u>Decrease in population growth rate</u> Educated people are aware of the negatives of population explosion. As per empirical evidence, an increase in level of education leads to decrease in the birth rate and thus a decrease in population growth rate. Thus it per capita availability of resources increases.
- (c) An educated and skilled labour force is in a better position to adopt to modern techniques.
- (d) <u>One solution for other economic problems</u> Various macro economic problems like poverty, income inequality, underutilisation and inefficient utilisation of resources can be solved if we have a educated labour force.
- 9. Discuss the following as a source of human capital formation:
 (a) Health Infrastructure
 (b) Expenditure on Migration
 Ans. Refer notes
- 10. Establish the need for acquiring information relating to health and education expenditure for the effective utilisation of human resources.

 Ans. Refer notes.

11. How does investment in human capital contribute to growth?

Ans. Human capital and economic growth goes hand in hand. Human capital formation accelerates the economic growth whereas economic growth facilitates human capital formation. The relationship between human capital and economic growth can be explained with the help of following points:

(a) <u>Efficient utilisation of Physical capital</u> — Physical capital refers to stock of machines, plants, tools and equipments that are used during the production process. Skilled worker can make better and efficient utilisation of the physical

capital in comparison to an unskilled worker. As productivity increases, the pace of economic growth automatically increases.

(b) <u>Greater stock of healthy labour force</u> – By proper investment in health care facilities we can create a larger stock of healthy labours who will be more productive and more efficient and thus it will further stimulate the economic growth.

12. There is a downward trend in inequality world-wide with a rise in the average education levels. Comment.

Ans. Generally there is a negative correlation (relationship) between level of education and level of inequality in the society. This has been observed worldwide in the past few decades.

Education not only enhances the technical skills and knowledge of an individual but it also provides an opportunity to earn higher incomes through creation of self-employment and wage-employment. This leads to reduction in the gap between the rich and the poor. Thus governments of different countries have started to invest heavily in education sector.

15. Bring out the need for on-the-job training for a person.

Ans. On-the-job training is the most effective way to train a trainee whereby training is provided to trainees at the actual work site. In this type of training, a trainee is assisted and trained by an experienced trainer at the work place when the trainee is actually performing the work. This type of training helps the trainees to acquire the theoretical and practical skills simultaneously.

From company's perspective also this is a cost-effective method as benefits in terms of higher productivity outweighs the expenditure incurred on such training.

Thus, the expenditure on such training improves the quality of human capital by enhancing their productivity, efficiency and income earning capacity.

17. Discuss the need for promoting women's education in India.

Ans. In India, women have always been neglected in the field of education. The weaker and lower status of women in India can be attributed to the negligence of their education.

With the rise in the educational levels and modernisation, people have realised the importance of female education. Following are some points that promotes women education –

- (a) Women education is important in order to make them economically independent.
- (b) Women education is important in order to raise social status of women.
- (c) Health care of women and children can be enhanced if the women is educated.
- (d) An educated women can give good moral values and can provide quality education to her children.

18. Argue in favour of the need for different forms of government intervention in education and health sectors.

- Ans. (a) In India, the education and health sectors services are provided by both the private institutions and public institutions. While the private institutions works with a motive of earning profits, the public institutions work with welfare motive. As the cost of education and health facilities provided by private institutions is higher, so it is difficult for maximum population to avail these services because of their economic inability. Thus it is important for government to provide quality education and health facilities to those who cannot afford them at market rates.
- (b) In rural areas people lack initiative for education and health. Thus it is the role of government to literate them about benefits of education and health and encourage them to avail these services.
- (c) There are various underprivileged sections in the society like SC, ST, OBC, the interests of whose can only be protected by the interference of the government.

19. What are the main problems of human capital formation in India? Ans. Refer notes