

LET US KNOW

Growth and Development :

- Often used as synonymous terms.
- Important characteristics of a living organism.
- Growth refers to change in size.
- Development implies overall changes in the individual.
- The process of Growth and Development goes on simultaneously.



CHECK YOUR PROGRESS

Q.1. State whether the following statements are true or false.

- Growth is not different from development.
- Growth cannot be measured.
- Maturation involves qualitative change.
- Development implies overall changes in the individual.

3.4 RELATIONSHIP OF GROWTH AND DEVELOPMENT

After going through the meaning and concept of growth and development, now we are going to identify the relationship between the two, which are as follows:

- The term growth is used in purely physical sense. It generally refers to an increase in size, length, height and weight. Changes in the quantitative aspects come into the domain of growth. Development implies overall changes in shape, form or structure resulting in improved working or functioning. It indicates the



2.7 ANSWERS TO CHECK YOUR PROGRESS

Ans. to Q. No. 1 : Some of the methods of educational psychology are :-

a) Methods of Introspection,
b) Observation Method,
c) Experimental Method,
d) Case-study method, and
e) Interview Method.

Ans. to Q. No. 2 : The introspection method implies 'self observation' - i.e. looking into our own minds and recording what we thereby discover. Through this method one can discover one's own state of consciousness. Introspection examines inner behaviour and an individual knows about his own feelings or thoughts in a particular situation.Three merits of the introspection method are :-

a) It is the easiest of all methods of psychology.
b) It does not require any special tool or laboratory as one person is both the subject and the investigator.
c) Introspection is economical and has generated a lot of research.

Ans. to Q. No. 3 : A big drawback of the introspection method is that it cannot be applied by sick or abnormal people and children.

Ans. to Q. No. 4 : 'Observation' method means observation of an individual's behaviour – his bodily gestures facial expressions and other bodily actions. The observer makes systematic observation through recording in a natural situation. This method is very useful as psychologists accept the view that an individual's overt behaviour is the result of his internal mental conditions.

Ans. to Q. No. 5 : Three principles to be followed in the observation method are :-

a) Observation should be made not only of the individual's behaviour but of the whole situation.

b) Proper planning of the observation process should be made; objectives must be clear and proper tools must be used.

c) Time of observation should be fixed; too long time may make the observer distracted and tired and too short time will not provide the proper information.

Ans. to Q. No. 6 : In the interview method, there is direct face to face contact between the investigator and the subject. Through this method the interviewer collects information about the subject by asking question unknown facts of the subject, his inner feelings becomes known to the investigator.

Ans. to Q. No. 7 : Three ***advantages*** of the interview method are –

i) It can be applied on all people. Even illiterate and children provide proper in-depth information about their behaviour through the interview method.

ii) Again, the interview method is very flexible as the investigator can reframe and rephrase the questions as suitable for the subject.

iii) The interview method enables the investigator or interviewer to study the emotions of the subject well.

Three ***disadvantages*** of the interview method are :-

i) It is time consuming and costly.

ii) The whole process is strenuous as it involves meticulous planning.

iii) The subject may not reveal his true feeling and emotions.

The primary purpose of studying the growth and development of children is to understand them better. As a teacher or a parent, you, can manage children more effectively if you are aware of how they grow and develop in a systematic manner right from the moment of conception. An orderly pattern is found in the growth of every organ of the body and area of development.

Although the development process is continuous, the rate or speed of development varies at different ages of the child. For example, children grow most rapidly during the first three years of life. In their middle childhood, i.e., from 6 - 12 years, their rate of growth is comparatively slow whereas it is accelerated again when they approach adolescence. A knowledge of the trends and patterns of growth and development will enable you to know how children grow and develop; when and what to expect from them, how to guide them in each stage and provide the environment for their optimum development.

The purpose of this unit is to familiarise us with the fundamental facts and various characteristics of Growth and Development.

3.3 MEANING OF GROWTH AND DEVELOPMENT

Let us first understand the meaning of these two important terminologies. 'Growth' and 'Development' are often used as synonymous terms. But, in fact, growth is different from development. Growth means an increase in size, height, weight, length etc. which can be measured. Development, on the other hand, implies change in shape, form or structure resulting in improved working or in functioning. Improved functioning implies certain qualitative changes leading to maturity. Growth and Development are the important characteristics of a living organism. Development involves a series of progressive, orderly and meaningful changes leading to the goals of maturity. Normally Growth contributes to Development. In reality though 'Growth and Development' are different, but they are inseparable. Generally process of Growth and Development goes on simultaneously.

UNIT 3 : GROWTH AND DEVELOPMENT

UNIT STRUCTURE

3.1 Learning Objectives

3.2 Introduction

3.3 Meaning of Growth and Development

3.4 Relationship of Growth and Development

3.5 Principles of Development

3.6 Let Us Sum Up

3.7 Further Readings

3.8 Answers to Check Your Progress

3.9 Model Questions

3.1 LEARNING OBJECTIVES

After going through this unit you will be able to:

- identify and differentiate the meaning of growth and development.
- explain the relationship between growth and development.
- describe the principles of development.
- discuss about the developmental periods.

3.2 INTRODUCTION

This unit deals with general nature of growth and development. An understanding of growth and development will helps us to plan educational growth and development of the child.

Human life starts from a single ferlized cell. This cell is under constant interaction with the environment in the mother's womb and after birth with the outside world. This interaction leads to the Growth and Development of the child. The increasing of an organ or limb of the baby, in size and weight is Growth. Division of each cell and their growing into thousands in number, or their changing tissues, blood or bone, is part of the process of Development.

Ans. to Q. No. 8 : The experimental method is one of the most important and objective methods of psychology. Through this method attempts are made to establish cause and effect relationships through carefully planned and controlled observation of the subject's behaviour.

Ans. to Q. No. 9 : Some of the characteristics of the experimental method are :-

a) It essentially requires at least two persons, the experimenter and the subject.

b) In experimental method the conditions are always controlled.

c) The experimental method involves two different types of variables – independent and dependent.

d) The experimental method is applied on persons in a random order.

Ans. to Q. No. 10 : ***Two merits*** of the experimental method are :-

i) It is the systematic method and the conditions are completely controlled.

ii) The data can be analyzed in objective manner and so it is reliable.

Two demerits of the experimental method are :-

i) It deals with only the overt behaviour of the subject.

ii) The tools used in experiments may not be satisfactory and this definitely affects the reliability of the data.

Ans. to Q. No. 11 : The 'case-study' method is applied to study the special behavioural problems of an individual by specially trained teachers, psychologist and psychiatrist. The main objective of this method is to help the individual adjust better with the environment; basic information about the subject is obtained, and accordingly, the efforts are made so that the subject can adapt to the environment better.

Ans. to Q. No. 12 : Some steps of the 'Case-study' method are –

a) Basic preliminary information about the subject's name, age, sex as well as parents' age, education and social status should be obtained.

b) Proper physical check-up of the subject should be done.

c) The subject should be comfortable with the investigator and the latter must be properly trained to take care of the subjects.

d) The behaviour of the subject should be observed in a natural setting.

e) Special care must be taken in the post treatment period so that there is no recurrence of the problem.

Ans. to Q. No. 13 : The two advantages of the case study method are :-

a) The case study method is very effective in understanding an individual's anxiety, worry or any kind of maladjustment of an individual.

b) Proper guidance and counselling can be provided to the subject to help the latter adjust with the environment letter.

Ans. to Q. No. 14 : Three drawbacks of the case study method are :-

a) In most cases the investigators are not technically proficient and so the data obtained may not be reliable.

b) There is a possibility of the investigator of becoming involved with the problems of the individual and so the guidance and counseling may not be effective.

c) The possibility of errors in understanding the problems as well as in treatment is high.

Ans. to Q. No. 15 : The methods of educational psychology help to study all aspects of the child's behaviour. The different methods and techniques enable the teacher to gather facts about the different stages of development of the

child, his adjustment with the environment by learning from experience.



2.8 MODEL QUESTIONS

A) Short Questions (Answer each question within 150 words)

Q.1. What is the derivative meaning of the word 'introspection'? Explain the importance of introspection method in educational psychology.

Q.2. Point out the merits and drawbacks of the introspection as a method of educational psychology.

Q.3. Mention the principles of observation method.

Q.4. Explain briefly the case study method

Q.5. Mention some characteristics of experimental method.

B) Long Questions (Answer each question within 300-500 words)

Q.1. Explain the introspection and observation methods of educational psychology.

Q.2. What is meant by Interview method? What are its advantages and disadvantages?

Q.3. Explain the experimental method of educational psychology with its merits and demerits.

Q.4. Explain how the case-study method of educational psychology helps the teacher to modify the behavioural problems of a child.

Q.5. Discuss the importance and application of educational methods in the teaching-learning process.