



Methods of Developing the Mentally Handicapped

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Abstract

Mental disability is a group of causes that lead to damage to the central nervous system, especially the cerebral cortex. Which includes the centers of speech and higher mental processes, visual-motor coordination, the sense of reading and hearing. These causes can occur before, during or after birth. Mental disability that has common characteristics into sub-categories, also has common characteristics among them. Most of the causes of mental disability are not yet known, as 25% of the causes are known and 75% of the causes are unknown. The causes of mental disability are divided as follows: the causes of the prenatal stage such as genetic causes and the environment, the causes of the intrauterine stage Childbirth, such as lack of oxygen, trauma, infections, etc., causes of the pre-birth stage, such as malnutrition, accidents, diseases, drugs and medications. The causes of mental disability are classified into groups, which are: a group of reasons for the prenatal stage, a group of reasons for the stage of childbirth, a group of reasons for the postpartum stage, as the subject of the curriculum and methods of teaching disabled persons is considered one of the important topics in the field of special education in general and mental disability in particular.

Key Words: Mental Disability, Visual-motor, Postpartum Stage, Childbirth.

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Introduction

Mental disability varies in its percentage from one society to another, and it also varies according to a number of variables in that society. In theory it is between 2.5%-3% of the population of the community. It is necessary to refer to key terms related to the issue of the prevalence of mental disability phenomenon in any society, which are: 5%.

Mental disability means a group of causes that lead to damage to the central nervous system, especially the cerebral cortex. Which includes the speech centers, higher mental processes, visual-motor coordination, the sense of reading and hearing.

The problem of mental disability is one of the obvious problems that can be observed in our Iraqi society, as this segment of society suffers from a lack of care and attention from all parties, whether governmental or at the level of parents, and

accordingly the research was divided into the following paragraphs:

Third - Methods of mental disability.

Fourth - Methods for the development of the mentally handicapped.

The research concluded with a summary and a list of sources.

First - The Concept of Mental Disability

Before we explain the concept of mental disability, we must clarify the concept of disability in general, as it is a physical, mental or psychological injury that causes harm to the child's physical or mental development, or both, and may affect his psychological state and the development of his education and training, thus the individual or the child becomes a person with special needs.

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He is less than his peers of the same age in physical functions or cognition or both. Disability is not a disease but a state of deviation or noticeable delay in development that is considered normal in terms of physical, sensory, mental, behavioral, linguistic, or educational, which results in special difficulties that I do not have other children. Several terms have appeared for the concept of mental disability, including: mental deficiency, mental retardation, mental weakness, stupid or dull child, the modern trend tends to use mental disability and this term is related to individuals' attitudes towards disability. Because it expresses a positive trend to this category, unlike the old terms.

Medical Concept of Mental Disability

It is a group of causes that lead to damage to the central nervous system, especially the cerebral cortex. Which includes the centers of speech and higher mental processes, visual-motor coordination, the sense of reading and hearing. These causes can occur before, during or after birth.

Social Concept

It measures the extent to which the individual interacts with his community and responds to social requirements and focuses on the extent of success or failure of these responses compared to his peers of the same age group.

These requirements vary depending on the age or age stage of the individual. These requirements include: independence, physical skills, language, numbers and time, simple professional skills, self-direction, responsibility, and socialization.

The definition of the American Association for Mental Retardation (AAMR)

The American Society combined the psychometric definition (the criterion of mental ability) and the social definition (the criterion of social validity).

This definition indicates that: The mental disability represents the level of mental functioning that is less than the average intelligence by two standard deviations, accompanied by a defect in adaptive behavior and appears in the stages of developmental age from birth to the age of 18.

4- The Concept of Mental Disability from the Psychological Point of View

The psychometric definition of mental disability emerged as a result of the criticisms leveled at the medical definition. The psychometric definition relied on the IQ as a test for the definition of mental disability. Individuals with an IQ of less than 75 were considered mentally handicapped.

Second - Classification of Mental Disability

The term classification means: dividing one group (mental disability) that has common characteristics into sub-categories that also have common characteristics among themselves.

Hence, mental disability can be classified into several sections, according to a number of variables, namely:

Classification of Mental Disability According to the External Appearance

Mental disabilities are divided according to the distinctive external appearance of each category, and these categories include:

A. Mongolian

This condition is called Down's symptom after the English doctor Lang Don Down. The Mongolian case accounts for about 85% of cases of mental disability. These children are characterized by physical characteristics such as: a round face, narrow eyes with a transverse direction, a small nose, large ears, the appearance of the tongue outside Mouth, short fingers.

As for their mental characteristics, their mental ability ranges between 45-70, so they can be classified with children who are able to learn and train.

As for their linguistic characteristics: Mongolians face problems in expressive language the speech apparatus, especially the tongue and teeth. It is easy for the Mongolian child to receive, hear, understand and implement language. This condition can be identified before birth by taking a sample of the amniotic fluid surrounding the fetus and genetically examining it Or by measuring the circumference of the head compared to normal children. As for the causes of this condition, it is due to disorders in the chromosomes and chromosomes 21, where this pair of chromosomes



appears in the fetus, so the fetus has 47 chromosomes, and the higher the age of the mother, the more likely the appearance of a Mongolian child, because This chromium and chromium are weak to have.

B. Cases of Metabolic Disorders (Pheny Keton Uria Pku)

The discovery of metabolic disorders goes back to the Norwegian doctor Folling. The explanation for this is that the cases of PUK are due to genetic causes that appear in the lack of efficiency of the liver to secrete the enzyme necessary for the metabolism of phenylene acid, due to poor digestion in the appropriate way, it appears in the blood at high levels as a toxic substance for the brain, so that It leads to disturbances in the neurons of the brain, and then to mental disability.

It is possible to treat PUK if it is detected early, especially in the first weeks of childbirth, and their mental capacity ranges between 25-50.

Their physical characteristics are soft, delicate, pale skin, blond hair, blue eyes, and a small head. And you must allocate a specific food in which the proportion of phenylene is low. And this group should be prevented from eating large quantities of meat, eggs, milk that convert phenylpropanolamine and thus mental disability can be avoided.

There are cases other than PUK for metabolic disorders such as: - *Galactosemia cases: liver disorders and malnutrition.

* Tay-Sach cases: difficulty in the manifestations of motor development.

This is all due to genetic reasons.

C. Cretinism

Curiosity is a manifestation of mental disability, and it means short stature compared to the age group to which he belongs, which is usually accompanied by mental disability, and the reasons for this condition are due to a deficiency in the secretion of the hormone thyroxine, which is secreted by the thyroid gland, and the most important characteristics of this condition are dry skin and hair and eruption of the abdomen, and mental retardation. Their intelligence ranges between 50-25 degrees.

D. Small Brain Size: - Micro Cephal

The manifestations of this condition appear in the small size of the circumference of the skull, which seems clear since birth, compared to the age group to which the individual belongs. They train in everyday life skills.

The cause of this condition appears in the consumption of alcohol and drugs during pregnancy and the exposure of the pregnant woman to radiation.

E. Cases of Large Brain Size Macro Cephal

The manifestations of this condition appear in the large size of the brain, and their mental capacity ranges between severe and very severe, and the manifestations of this condition appear clear since birth, and it is believed that the causes of this condition are taking drugs, alcohol, smoking, preeclampsia.

F. Cases of Hydrocephaly

The manifestations of this condition appear to be the large size of the skull compared to the age group to which it belongs, and this condition is accompanied by the presence of spinal cord fluid inside or outside the brain, and the degree of mental disability in this case depends on the time when this condition is discovered and treated, as the treatment includes withdrawing the excess fluid through surgery. The causes of this condition may be due to genetic or pathological factors.

Classification of Mental Disabilities According to the IQ Variable

Mental disability cases are classified according to the intelligence variable into simple mental disability, moderate mental disability and severe mental disability. As in the following table.

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	Mild mental disability	moderate intellectual disability	severe mental disability
Disability rate	80% of children are mentally handicapped	10% of children are mentally handicapped	5% of children are mentally handicapped.
IQ	Between 55-70 degrees	Between 55-40 degrees	Of 40 and under.
Physical characteristics	An approach to normal body growth corresponding to it in age, especially aspects related to head circumference, shape, height, weight, and high motor skills	There are many physical problems in height, weight, and general and fine motor skills, problems with walking, standing and running Trouble using everyday utensils, problems with writing and sensory health, such as visual and auditory	Obvious problems with height, weight, head shape, and general motor skills, such as walking, and extreme difficulty with fine motor skills, and they have health problems and diseases such as epilepsy, cerebral palsy or hydrocephalus and sensory problems
Social characteristics	Parallel or close performance to the performance of normal children corresponding to them in chronological age, on daily life skills, language skills and responsibility	Problems with adaptive behavior such as daily living skills such as eating, socializing, aggressive behavior, self-harm and socially unacceptable vocal habits.	Problems in adaptive behavior, as it is difficult for these children to have daily life skills, independence skills, or language, especially language reception. Such cases are accompanied by the emergence of childhood schizophrenia symptoms.
Educational features	Their ability to learn simple academic skills such as reading, writing, arithmetic, and they face problems in abstract education, not sensory education. As for the appropriate educational place for them, it is the special classes attached to regular schools or special education day centers	Difficulty learning basic skills such as reading, writing and arithmetic As for the appropriate educational place for them, it is the special classes attached to regular schools or special education centers during the day.	It is difficult to teach these children any academic skills due to their low mental abilities. Often the normal place for them is full-fledged accommodation centers or children's departments in hospitals. They need direct healthcare

Classification of Mental Disabilities According to the Educational Dimension Variable

Mental disabilities are classified according to the variable of the educational dimension or the ability to learn into three groups

- The cases of those who are able to learn: The cases of those who are able to learn according to this classification are parallel to the cases of simple mental disability according to the classification of the mental disability variable.
- The cases of those who are able to be trained: The cases of midwives according to this classification are parallel to the cases of

moderate mental disability according to the classification of the intelligence variable of mental disability.

- Dependent cases: Dependent cases according to this classification are parallel to cases of severe mental disability according to the classification of the intelligence variable of mental disability.

Classification of Mental Disabilities According to the Variables of Intelligence and Social Adjustment

The American Society for Mental Retardation has adopted this classification, as it is sometimes called



by its name, where mental disabilities are classified according to the variables of intelligence and social adaptive behavior together, due to the importance of all variables of intelligence and adaptive behavior.

The famous classification of the American Society on Mental Retardation of mental disabilities appeared

1. Mild mental disability
2. Moderate mental disability
3. Severe mental disability
4. Very severe mental disability

Third - the causes of mental disability

Most of the causes of mental disability are not yet known, as 25% of the causes are known and 75% of the causes are unknown

The causes of mental disability are divided as follows

- Prenatal causes such as genetic and environmental causes
- Causes of the during phase Childbirth, such as lack of oxygen, trauma, infections, and others.
- Causes of prenatal stage such as malnutrition, accidents, diseases, drugs and medications.

The causes of mental disability are interrelated, as genetic factors do not work alone without environmental factors, and vice versa i.e. no. one works without the other.

Classify the Causes of Mental Disability into

Causes of mental disabilities are classified into groups, namely:

1. Prenatal group
2. Group stage causes during childbirth
3. Postpartum group

1. Group of Prenatal Causes

This stage means to us the causes that occur from the moment of fertilization until before the stage of birth, and this group is divided into two groups of reasons

- a. Genetic factors
- b. Non-genetic factors

Genetic factors are hereditary factors, i.e. the transmission of genetic traits from parents to offspring during the fertilization process. The fertilized cell consists of 23 chromosomes, half of which are from the father and half from the mother.

Each chromosome works with hundreds of hereditary genes, and there are three forms of genes.

- a. Dominant genes are strong genes and carry desirable traits.
- b. Carrier genes are undesirable carrier traits that do not appear on the individual.
- c. Recessive genes are undesirable pathological traits.

Environmental Factors, Including

- a. Diseases affecting the mother: as there are diseases that affect the development of the fetus and the most serious diseases are rubella, especially in the first 3 months, where the virus affects the central nervous system, which leads to forms of disability, including mental, audio and visual disabilities or cerebral palsy. As well as syphilis, diabetes and other serious diseases that can pose a disability to the fetus.
- b. Malnutrition: A pregnant woman must eat well and her diet must include the basic elements necessary for the growth of the individual in terms of both physical and mental terms and these elements (proteins, carbohydrates, mineral salts and vitamins).
- c. X-rays and radiation: it is considered a major cause of disability in general, including mental disability and X-rays expose the fetus and children to types of leukemia, as well as abortion, especially if the woman is exposed in the first 3 months of pregnancy, congenital malformations, epilepsy, brain development and other matters and other disabilities desirable.
- d. Drugs and alcoholic beverages: It is a major cause of mental and other disabilities, and these drugs and alcohol affect the manifestations of abnormal growth in fetuses, including mental disability and cases of small or large brain size and other disabilities such as auditory and visual impairment, cerebral palsy, etc. Also, abortion and childbirth occur. Premature and non-disabilities.
- e. Air and water pollution: Air and water pollution indirectly affects the development of the fetus, especially if the mother is exposed to obvious pollution in water and air polluted by gases, the production of chemical plants, as these substances affect the central nervous system of the fetus.

It may be a mental disability or other disabilities.



3. Group of Causes during Childbirth

These are the reasons that occur during the birth process, and these reasons lead to the occurrence of mental and other disabilities, including:

- The lack of oxygen during the birth process
When the lack of oxygen during the birth process leads to damage to the brain cells, the brain needs an adequate amount of oxygen and food and continuously, and its lack of (oxygen) damages the nerve centers and then mental disability or other disabilities or death occur.
- Physical trauma: such as the forceps of the birth process in which the head is pulled or the use of tools for caesarean section. These factors, in one way or another, can cause damage to the fetus's cerebral cortex or central nervous system, resulting in a form of disability such as mental and others.
- Infections: that is, viral or bacterial factors are active contributors to causing damage to the central nervous system, meningitis, encephalitis and other infections.

4. Postpartum Causes Group

The reasons that occur after the postpartum causes of mental disability are

- Malnutrition because foodstuffs that contain (proteins, carbohydrates, salts, vitamins (A) (B6) (B12) (D) are a major factor in brain development and vice versa, and their deficiency leads to mental disabilities.
- Accidents and trauma are a major cause of mental disability, especially accidents and trauma usually cause a shortage of oxygen, which leads to damage to the central nervous system and thus to disability.
- Diseases and Infections: (Infections and diseases) are considered one of the causes of mental or other disabilities, and these diseases affect children diseases in their early years, especially if they are not vaccinated against diseases, especially mumps, measles, smallpox and meningitis. This leads to neurological disorders and cases of disability, such as mental disability.

Drugs and medicines: They are considered a major cause of mental and other disabilities and other mental and psychological disorders. Because drugs and medicines are considered toxic, especially if they are taken in exaggerated quantities, and this in turn leads to damage to the central nervous system, as well as to many mental and psychological diseases.

Fourth - Methods for Developing the Mentally Handicapped

The methods of development for the handicapped are one of the important matters, which is the learning and teaching of the mentally handicapped, as the subject of the curriculum and methods of teaching the handicapped is considered one of the important topics in the field of special education in general and mental disability in particular. We must first show what is the content of the curriculum for mentally handicapped children, specifically what are the subjects that we teach them, academic subjects or do we teach them skills directly related to their daily life, and also the methods of teaching mentally handicapped children, specifically how we teach them and what are the appropriate teaching methods for them.

Curriculum Content for Mentally Handicapped Children

The content of the curriculum for the mentally disabled includes a number of dimensions or skills represented in the educational material, which is the answer to the following question.

What should we teach the mentally handicapped.

The answer includes the dimensions of the curriculum, which are represented in a number of skills:

1. Independence skills:

Daily life skills

Self skills

2. Motor skills

General motor skills

fine motor skills

3. Language skills

Receptive language skills

Expressive language skills

4. Academic skills

Reading skills

writing skills

Math skills

Concept skills

5. Professional skills

6. Social skills

7. Safety skills

8. Economic skills

Strategies for Building a Curriculum for Mentally Handicapped Children

Building and teaching a curriculum for the mentally disabled requires a number of strategies



According to Gala Sir, it is as follows

3. Educational Characteristics of the Mentally Handicapped

A. Attention

Mentally handicapped children face problems and a clear lack of their ability to pay attention, and their attention can be easily distracted.

1. Use stimuli that have three dimensions.
2. Present the tasks in an orderly sequence, from easy to difficult.
3. To avoid the student's failure as much as possible, but rather provide him with the tasks that he succeeds in.
4. Provide appropriate positive reinforcement.
5. Create the appropriate conditions for attention, removing distracting stimuli.

The mentally handicapped child his past experiences are full of opportunities for frustration and a sense of failure, so the mentally handicapped child searches for opportunities for success and its signs, especially when he looks at the teacher's expressions, and focuses on that instead of focusing on the task required of him.

The steps for receiving and expressing information for a mentally handicapped child and how to take it into account are as follows

1. The child's adoption of the task to be taught (arousing interest).
2. The child's attention to the task to be taught focus
3. Receiving information.
4. Save information for a short period of time
5. Recall the information
6. Save information for a long period of time.
7. Recall information when necessary.

The disabled child finds it difficult to receive information, so it is appropriate to organize the information provided to the mentally disabled in a way that enables them to receive the information. Information can be organized by grouping similar objects and then presenting them to the mentally handicapped, and categorizing the objects and presenting them as similar or homogeneous groups by:

1. Similarity in outward appearance or colour.
2. The similarity in function between the stimuli.
3. Similarities in concepts between stimuli.

B. Transferring the Effect of Learning

One of the distinguishing characteristics of the mentally handicapped child's behavior is the

difficulty of transferring what he has learned from one situation to another, compared to the normal child who suits him at the chronological age. Learning ability depends on the degree of disability, the nature of the educational task, and the type of passive or active transition.

C. Remembering

One of the most severe educational problems in mentally handicapped children is the problem of remembering, whether it is related to names, shapes, or events, especially those that occur before a short or short-term period of remembrance. The degree of remembering is related to the way the learning process takes place.

D. Linguistic Features

The distinctive features of language performance in mentally handicapped children can be mentioned as follows:

1. Most of the language problems of mentally handicapped are represented in speech problems and difficulty forming sounds, or in pronunciation errors, excessive speed of speech, or the appearance of pauses during speech or inaudible sounds.
2. Lack of language yield among mentally handicapped children.
3. Absence of language among children with severe disabilities.

4. Measuring the Current Level of Performance of the Mentally Handicapped Child

The curriculum for the mentally disabled child is not developed in advance, but is developed after identifying the child's current performance. The measurement phase of the child's current abilities aims to identify the negative and positive points or strengths and weaknesses in the child's abilities, and then formulate the individual educational plan, which is about building special curricula for each child from Mentally handicapped children.

In the individual educational plan, two dimensions must be taken into account:

- Individual dimension: It means that each of these children has his own curriculum and is developed by identifying the current performance of the mentally handicapped child.
- The social dimension: It is intended that the curricula of the mentally handicapped cover the social requirements expected of them in order to help them adapt successfully with those around them.



Independence Skills of the Mentally Handicapped

It is considered one of the main skills in the curriculum for people with different degrees and types, especially for the mentally handicapped. These skills also form the basis for building other skills such as academic, social and professional skills.

As his performance of these skills leads to the development of a number of personal characteristics, such as self-reliance, developing self-confidence, and successful adaptation to those around him.

Some Independence Skills

1. Eating skills: The development of eating skills for the mentally disabled individual is represented in the child's self-reliance in feeding himself and in his appropriate social behavior patterns related to eating skills.
2. The skill of using the toilet: The development of toilet use skills for the mentally disabled individual is represented in his expression of his need to use the toilet by gesture or verbal way, and in reducing the percentage of accidents that occur to him when using the toilet, and in taking off his clothes, and in his use of healthy habits when using the toilet.
3. Dressing skills: The general goal of developing the skill of dressing is his self-reliance when wearing his clothes and taking them off whenever the need arises, and in choosing his appropriate clothes for different occasions and social situations.
4. Health skills: The general goal of developing health skills is to rely on himself and perform healthy skills such as washing hands and face, using drying tools, brushing his teeth, cutting his nails, and taking a shower. And his realization that these matters are important for social adjustment.
5. Safety skills: The general objective of developing safety skills for a disabled child is to avoid dangerous situations, use tools safely, whether at home or school, move safely and report dangers.

Motor and Sports Skills of Unusual Children

The curriculum includes several different dimensions, including the following:

The first dimension: the skills of controlling head movement.

The second dimension: the skills of lying down / turning / changing the position of the body.

The third dimension: rolling/crawling/crawling skills.

The fourth dimension: sitting skills.

The fifth dimension: standing skills.

The sixth dimension: walking skills.

The seventh dimension: jogging/running/running skills.

The eighth dimension: jumping skills.

The ninth dimension: Shyness skills.

The Tenth Dimension: Ball Capture Skills.

The eleventh dimension: the skills of throwing the ball.

The twelfth dimension: kicking the ball skills.

The thirteenth dimension: the skills of using the tennis racket.

The fourteenth dimension: swimming skills.

The objectives in this curriculum are a number of the main motor skills that the student is expected to master after teaching the curriculum. It was characterized by:

- The sequence of educational objectives in each of the dimensions of this curriculum according to the natural sequence of growth and continuity of motor skills of the average child.
- Provide a number of conditions in the educational objectives.
- Formulating educational goals in specific behavioral terms and according to certain conditions and specific criteria: It was formulated according to three main elements:

Formulate the final behavior in specific measurable behavioral procedural terms.

Determine the specific conditions under which the final behavior occurs.

Determine the criteria by which the final behavior occurs.

Conclusions

Mental disability is a group of causes that lead to damage to the central nervous system, especially the cerebral cortex. Which includes the centers of speech and higher mental processes, visual-motor coordination, the sense of reading and hearing. These causes can occur before, during or after birth. Mental disability that has common characteristics into sub-categories, also has common characteristics among them. Mental disability can be classified into several sections according to a number of variables, namely: Classification of mental disability according to the external form and is divided into (Mongolian, cases



of metabolic disorders, cases of cretinism, small brain size, cases of large brain size, cases of hydrocephalus) and classification of mental disabilities according to the IQ variable, and the classification of mental disabilities according to the variable of the educational dimension, and the classification of mental disabilities according to the variables of intelligence and social adaptation. Most of the causes of mental disability are not yet known, as 25% of the causes are known and 75% of the causes are unknown. The causes of mental disability are divided as follows: the causes of the prenatal stage such as genetic causes and the environment, the causes of the intrauterine stage Childbirth, such as lack of oxygen, trauma, infections, etc., causes of the pre-birth stage, such as malnutrition, accidents, diseases, drugs and medications. The causes of mental disability are classified into groups, which are: (a group of reasons for the prenatal stage, a group of reasons for the stage of childbirth, a group of reasons for the postpartum stage, as the subject of the curriculum and methods of teaching disabled persons is considered one of the important topics in the field of special education in general and mental disability in particular. As we must first show what is the content of the curriculum for mentally handicapped children, specifically what are the subjects that we study, academic subjects or do we teach them skills directly related to their daily life, and also the methods of teaching mentally handicapped children, specifically how we teach them and what are the appropriate teaching methods them.

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