

Dr.Suresh Kumar Murugesan PhD





### **About the Presenter**



- Dr.Suresh Kumar Murugesan is a passionate Professor, researcher and Positive Mental Health Practitioner from Madurai, Tamil Nadu, India
- At present he is heading the PG Department of Psychology, The American College, Madurai
- He is very keen in research studies and open to learn.
- His ultimate aim is to make impression in the field of Knowledge
- His area of specializations are Psychomentry, Psychotherapy, etc.
- He has published 30 journal articles, 50 Conference and seminar proceedings
- Organised more than 500 webinars and acted as a resource person for 250 + webinar session
- Received 4 Awards and delivered 25+ Radio Talks
- Qualified UGC NET in Psychology and Education, Central Teacher Eligibility Test
- Published three books

### **Disclaimer**

- This presentation is prepared for learning purpose only and all the images and pictures used in this presentation are taken from google image search.
- Due recognition was given to all the material collected from the various sources.
- Any name or reference is missed kindly bring it to the notice of the presenter for inclusion.
- Email -<u>sureshkumar800@yahoo.com</u>
   Thank you





DISCLAIMER



## **Meaning and Definition of ID**







- Intellectual disability (ID), once called mental retardation.
- The term "mental retardation" is no longer used, as it's offensive and has a negative tone.

Intellectual disability is characterized by below-average intelligence or mental ability and a lack of skills necessary for day-to-day living.





People with intellectual disabilities can and do **learn new skills**, but they learn them **more slowly**.

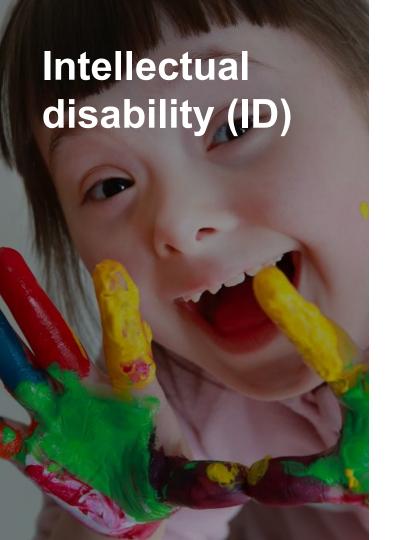
There are varying degrees of intellectual disability, from mild to profound.





Intellectual disability is a disability characterized by significant limitations in both intellectual functioning and in adaptive behavior, which covers many everyday social and practical skills.





According to the American Association of Intellectual and Developmental Disabilities, an individual has intellectual disability if he or she meets three criteria:

- 1. IQ is below 70-75
- There are significant limitations in two or more adaptive areas (skills that are needed to live, work, and play in the community, such as communication or self-care)
- 3. The condition manifests itself before the age of 18





Intellectual disability affects about **one percent** of the population, and of those
about **85 percent** have **mild** intellectual
disability.



Males are more likely than females to be diagnosed with intellectual disability.







### **Intellectual Functioning**

- **Intellectual functioning**—also called intelligence—refers to general mental capacity, such as learning, reasoning, problem solving, and so on.
- One way to measure intellectual functioning is an IQ test. Generally, an IQ test score of around 70 or as high as 75 indicates a limitation in intellectual functioning.





## **Adaptive Behavior**

Adaptive behavior is the collection of conceptual, social, and practical skills that are learned and performed by people in their everyday lives.

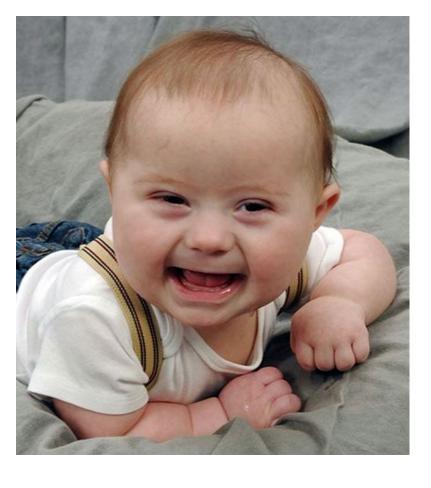
- Conceptual skills—language and literacy; money, time, and number concepts; and self-direction.
- Social skills—interpersonal skills, social responsibility, self-esteem, gullibility, naïveté (i.e., wariness), social problem solving, and the ability to follow rules/obey laws and to avoid being victimized.
- Practical skills—activities of daily living (personal care), occupational skills, healthcare, travel/transportation, schedules/routines, safety, use of money, use of the telephone.

Standardized tests can also determine limitations in adaptive behavior.



## Signs and Symptoms of ID





#### Signs of ID in children

Some of the most common signs of intellectual disability are:

- Rolling over, sitting up, crawling, or walking late
- Talking late or having trouble with talking
- Slow to master things like potty training, dressing, and feeding themselves
- Difficulty remembering things
- Inability to connect actions with consequences
- Behavior problems such as explosive tantrums
- Difficulty with problem-solving or logical thinking



# Symptoms of intellectual disability

- failure to meet intellectual milestones
- sitting, crawling, or walking later than other children
- problems learning to talk or trouble speaking clearly
- memory problems
- inability to understand the consequences of actions
- inability to think logically
- childish behavior inconsistent with the child's age
- lack of curiosity
- learning difficulties
- IQ below 70
- inability to lead a fully independent life due to challenges communicating, taking care of themselves, or interacting with others





### **Behavioural Issues of ID**

If child has ID, they may experience some of the following behavioral issues:

- 1. aggression
- dependency
- 3. withdrawal from social activities
- 4. attention-seeking behavior
- 5. depression during adolescent and teen years
- 6. lack of impulse control
- 7. Passivity
- 8. tendency toward self-injury
- 9. stubbornness
- 10. low self-esteem
- 11. low tolerance for frustration
- 12. psychotic disorders
- 13. difficulty paying attention

Some people with ID may also have specific physical characteristics. These can include having a short stature or facial abnormalities.





## **Causes of ID**





# Causes of Intellectual Disability

- A wide variety of medical and environmental conditions can cause intellectual disability.
- Some conditions are genetic.
- Some are present before or at the time of conception, and others occur during pregnancy, during birth, or after birth.
- The common factor is that something interferes with the growth and development of the **brain**.
- Even with recent advances in genetics, especially techniques of chromosome analysis, a specific cause of ID often cannot be identified.



# Causes of ID - before or at conception

Some causes that can occur **before or at conception** include

- Inherited disorders
  - o phenylketonuria,
  - o <u>Tay-Sachs disease</u>,
  - o <u>neurofibromatosis</u>,
  - hypothyroidism, and
  - Fragile X syndrome)
- Chromosomal abnormalities
  - o <u>Down syndrome</u>







### Causes of ID

Some causes that can occur during pregnancy include

- Severe maternal <u>undernutrition</u>
- Infections with <u>human immunodeficiency virus</u>, <u>cytomegalovirus</u>, <u>herpes simplex virus</u>, <u>toxoplasmosis</u>, <u>rubella</u>, or <u>Zika virus</u>
- Toxins (such as lead and methylmercury)
- Alcohol (<u>fetal alcohol spectrum disorder</u>)
- <u>Drugs</u> (such as phenytoin, valproate, isotretinoin, and cancer chemotherapy drugs)
- <u>Abnormal brain development</u> (such as porencephalic cyst, gray matter heterotopia, and encephalocele)
- Preeclampsia and multiple births (such as twins or triplets)





### **Causes of ID**

Some causes that can occur during birth include

- Insufficient oxygen (hypoxia)
- Extreme <u>prematurity</u>



# Causes of Intellectual Disability

#### Some causes that can occur after birth include

- Brain infections (such as <u>meningitis</u> and encephalitis)
- Severe head injury
- Undernutrition of the child
- Severe <u>emotional neglect or abuse</u>
- Poisons (such as <u>lead</u> and mercury)
- Brain tumors and their treatments

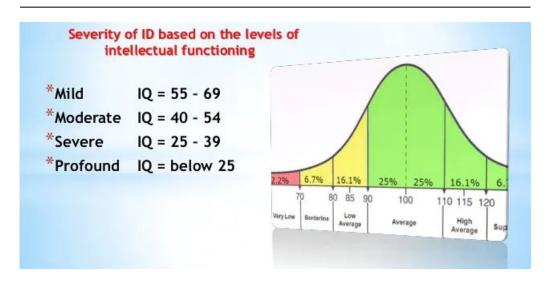




### **Levels of ID**



# Levels of intellectual disability



ID is divided into four levels, based on our child's IQ and degree of social adjustment.





# Mild intellectual disability

Some of the symptoms of mild intellectual disability include:

- taking longer to learn to talk, but communicating well once they know how
- being fully independent in self-care when they get older having problems with reading and writing
- social immaturity
- increased difficulty with the responsibilities of marriage or parenting
- benefiting from specialized education plans having an IQ range of 50 to 69





# Moderate intellectual disability

- are slow in understanding and using language
- may have some difficulties with communication
- can learn basic reading, writing, and counting skills
- are generally unable to live alone
- can often get around on their own to familiar places
- can take part in various types of social activities
- generally having an IQ range of 35 to 49





# Severe intellectual disability

Symptoms of severe ID include:

- noticeable motor impairment
- severe damage to, or abnormal development of, their central nervous system
- generally having an IQ range of 20 to 34



# Profound intellectual disability

#### Symptoms of profound ID include:

- inability to understand or comply with requests or instructions
- possible immobility
- incontinence
- very basic nonverbal communication
- inability to care for their own needs independently
- the need of constant help and supervision
- having an IQ of less than 20





# **Diagnosis of ID**







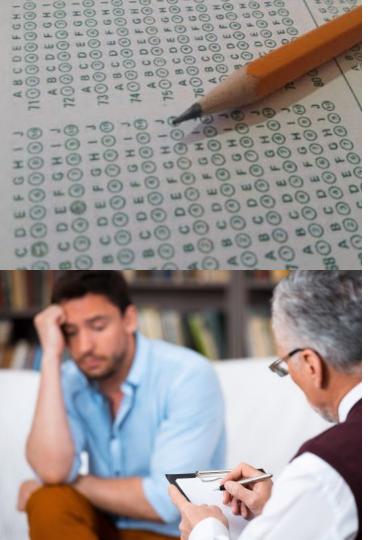
# Diagnosis of Intellectual Disability

- Prenatal screening
- Developmental screening
- Formal intellectual and skills testing
- Imaging tests
- Genetic and other laboratory tests
- Psychometric tests



## Who can diagnose ID





## Who can diagnose?

The following specialists can help to diagnosis:

- Psychometricians
- psychologist
- speech pathologist
- social worker
- pediatric neurologist
- developmental pediatrician
- physical therapist



### **Prevention of ID**





### **Prevention of ID**

- Certain causes of intellectual disability are preventable.
- Pregnant women shouldn't drink alcohol (fetal alcohol syndrome)
- Getting proper prenatal care, taking a prenatal vitamin, and getting vaccinated against certain infectious diseases can also lower the risk that your child will be born with intellectual disabilities.
- In families with a history of genetic disorders, genetic testing may be recommended before conception.
- Certain tests, such as ultrasound and amniocentesis, can also be performed during pregnancy to look for problems associated with intellectual disability.
- Although these tests may identify problems before birth, they cannot correct them.

### **Role of Parents of ID Child**



### **Role of Parents**

Steps to help intellectually disabled child include:

- Learn everything we can about intellectual disabilities. The more we know, the better advocate we can be for our child.
- Encourage the child's independence. Let the child try new things and encourage the child to do things by themselves.
   Provide guidance when it's needed and give positive feedback when child does something well or master something new.
- Get child involved in group activities. Taking an art class or participating in Scouts will help the child build social skills.
- Stay involved. By keeping in touch with child's teachers, we'll be able to follow their progress and reinforce what the child is learning at school through practice at home.
- Get to know other parents of intellectually disabled children.
   They can be a great source of advice and emotional support.





## **Treatment for ID**



### **Treatment of ID**

Multidisciplinary support

A child with ID is best cared for by a multidisciplinary team consisting of the following:

- Primary care doctor
- Social workers
- Speech pathologists
- Audiologists
- Occupational therapists
- Physical therapists
- Neurologists or developmental pediatricians
- Psychologists
- Nutritionists
- Teachers
- Orthopedists







# Treatment options for intellectual disability

The main goal of treatment is to help the child reach their full potential in terms of:

- education
- social skills
- life skills

Treatment may include:

- behavior therapy
- occupational therapy
- counseling
- medication, in some cases



## **Tips to Parents of ID Child**



# Tips for parents

- Learn about the child's disability
- Connect with other parents of children with disabilities
- Be patient; learning may come slower for your child
- Encourage independence and responsibility
- Look for opportunities in community for social, recreational and sports activities (such as Best Buddies or Special Olympics)





### References

- 1. Ranna Parekh (July 2017). What is Intellectual Disability? <a href="https://www.psychiatry.org/patients-families/intellectual-disability/what-is-intellectu
- SODBP (12/18/2015). Children with Intellectual Disabilities.
   <a href="https://www.healthychildren.org/English/health-issues/conditions/developmental-disabilities/Pages/Intellectual-Disability.aspx">https://www.healthychildren.org/English/health-issues/conditions/developmental-disabilities/Pages/Intellectual-Disability.aspx</a>
- 3. Shannon Johnson (August 14, 2019). What You Should Know About Intellectual Disability. <a href="https://www.healthline.com/health/mental-retardation">https://www.healthline.com/health/mental-retardation</a>
- 4. Stephen Brian Sulkes (*May 2020*). Intellectual Disability.

  <a href="https://www.msdmanuals.com/en-in/home/children-s-health-issues/learning-and-developmental-disorders/intellectual-disability">https://www.msdmanuals.com/en-in/home/children-s-health-issues/learning-and-developmental-disorders/intellectual-disability</a>
- **5.** <a href="https://www.aaidd.org/intellectual-disability/definition">https://www.aaidd.org/intellectual-disability/definition</a>
- 6. <a href="https://www.webmd.com/parenting/baby/child-intellectual-disability#1">https://www.webmd.com/parenting/baby/child-intellectual-disability#1</a>
- 7. <a href="https://www.asha.org/practice-portal/clinical-topics/intellectual-disability/">https://www.asha.org/practice-portal/clinical-topics/intellectual-disability/</a>
- 8. <a href="https://www.specialolympics.org/about/intellectual-disabilities/what-is-intellectual-disability">https://www.specialolympics.org/about/intellectual-disabilities/what-is-intellectual-disability</a>