## MIND TRICKS- APPLIED CHILD PSYCHOLOGY.

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### Learning Objectives



Psychology- Definition, Roots, Need to study Child Psychology.

Biology of the Mind- Neural Communication, Nervous System, Endocrine system and the Brain Theories of Personality

**Psychodynamic Approach** 

The study of psychology enhances our abilities to restrain intuition with critical thinking, judgmentalism with compassion, and illusion with understanding- David



### Learning Objectives



The study of psychology enhances our abilities to restrain intuition with critical thinking, judgmentalism with compassion, and illusion with understanding- David



## Developmental Psychology & Child Psychology

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Developmental psychology, also called Life-span Psychology, the branch of psychology concerned with the changes in cognitive, motivational, psychophysiological, and social functioning that occur throughout the human life span.



Child psychology is the study of the mental and emotional development of children and is part of developmental psychology, the study of changes in behavior that occur through the life span.

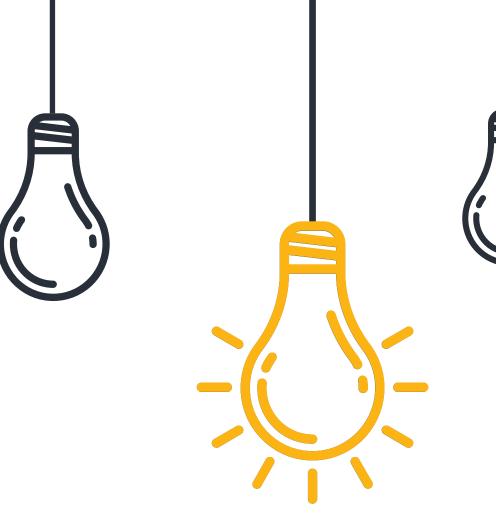
## DEFINITION

Child psychology is an understanding of basic the psychological needs of children and adolescents, and how the family and other social contexts influence the socio-emotional adjustment, cognitive behavioral development, adaptation and health status of children and adolescents.

American Psychological

Association

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"When we understand how a child's challenging behavior serves as communication, we can devise strategies that teach the child to communicate in more desirable ways."

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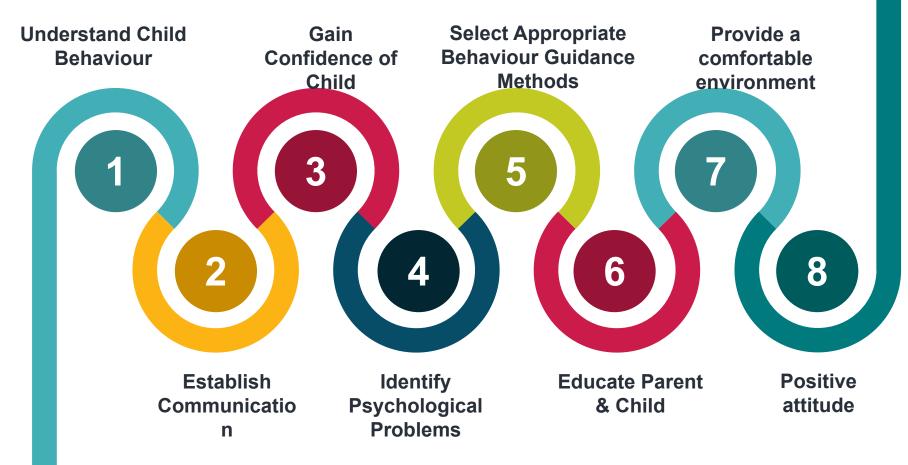
### not 'causing trouble' or 'being

### bad'. I am a child and I am

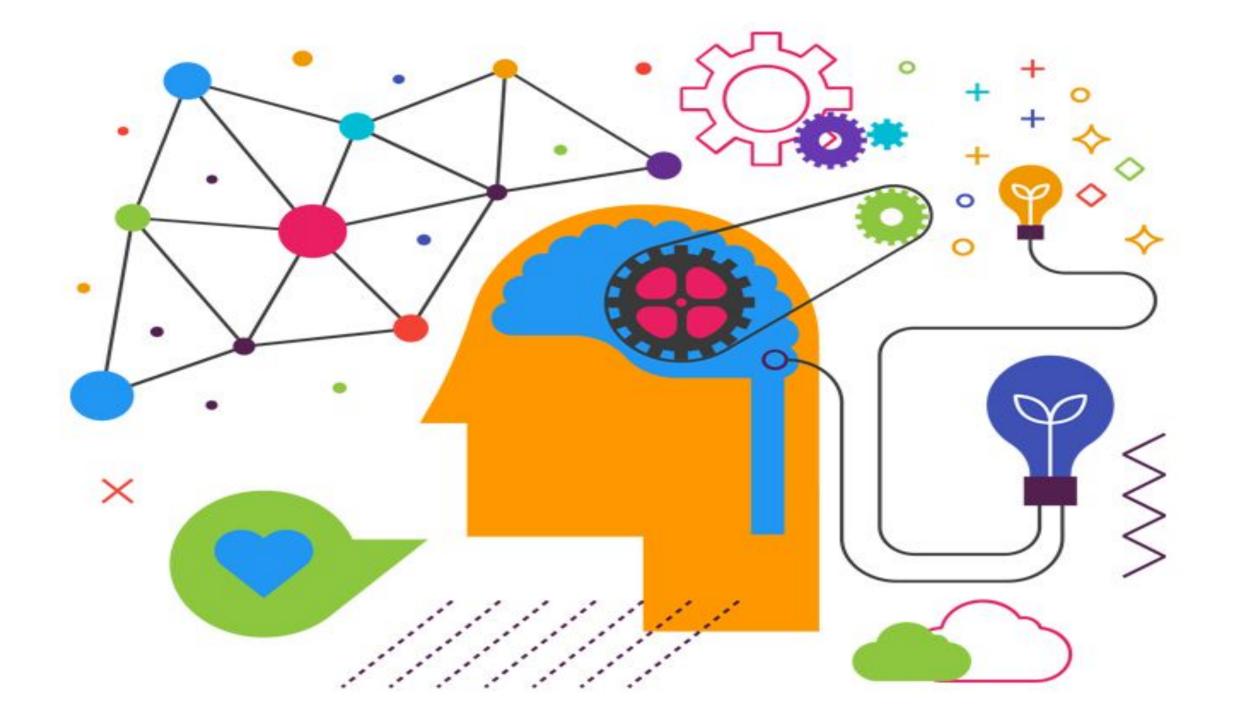
trying to communicate my

needs to you."

### Importance of Child Psychology



Need for Child Psychology 2 Effective and efficient Dental treatment

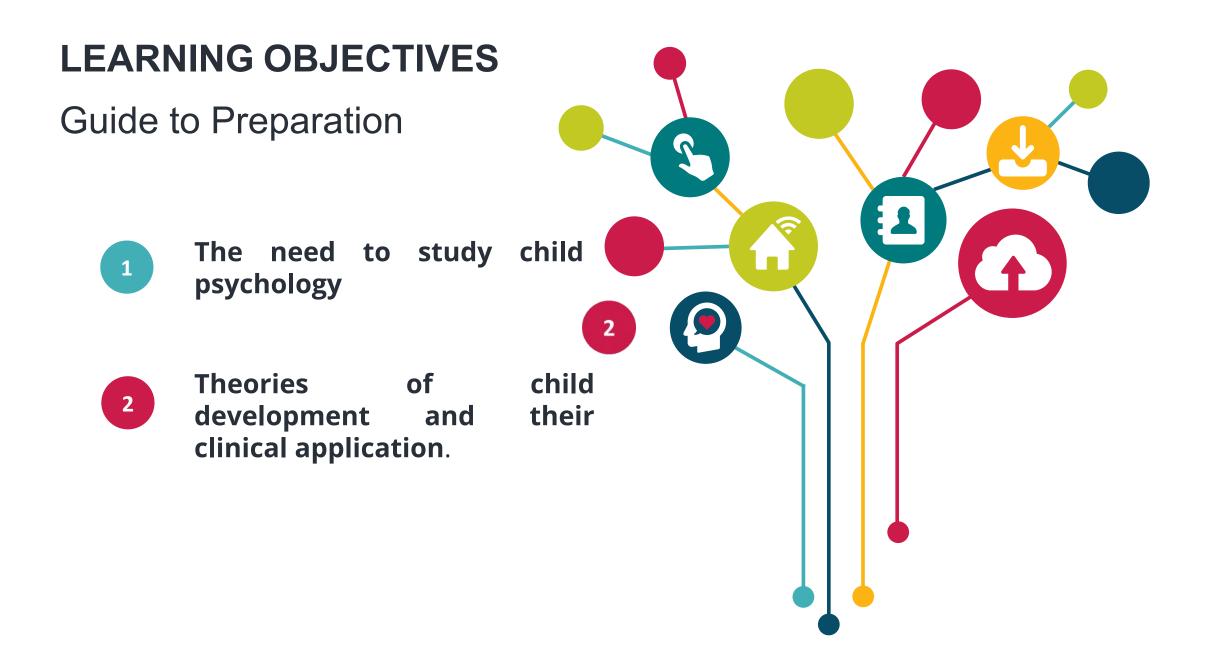




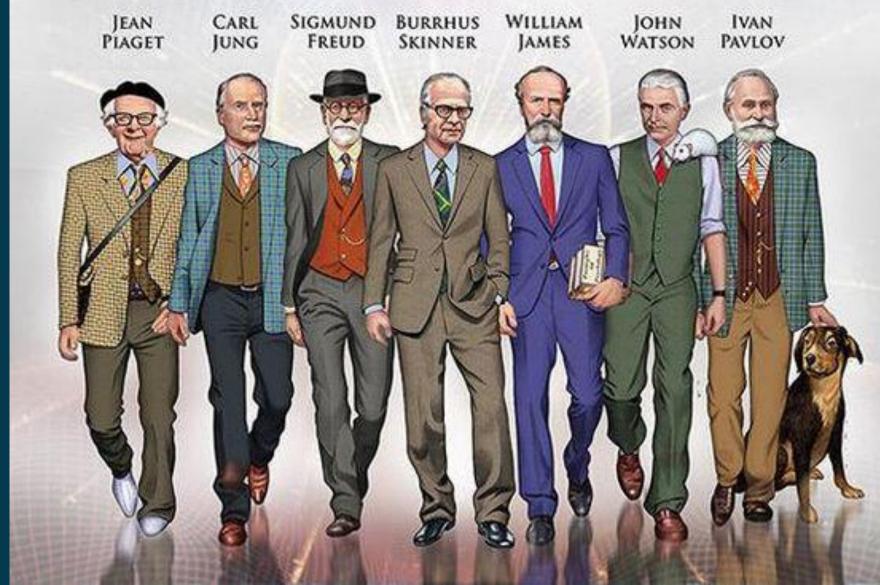


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# PSYCHOLOGY





REF:<u>https://ddceutkal.ac.in/Syllabus/MSW/PAPER-3.pdf</u>

# Sigmund Freud-Theories and concepts



### Topographic of the Mind

Freud used the analogy of an iceberg to describe the three levels of the mind's structure and function.

#### **The Psychic Triad**

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The Id, Ego and Super ego-Elements of personality.

### Defense

Mechanisms Defense mechanisms are psychological strategies that are unconsciously used to protect a person from anxiety arising from unacceptable thoughts or feelings.

### **Psychosexual stages** of **Development**

1.111.

Personality is critically shaped during childhood through a series of five psychosexual stages.

# Merits & Demerits

- Explains human behaviour and personality and seems to be a complete theory of personality.
- The role of early childhood experiences and the unconscious is emphasized.
- The dynamic nature of human behaviour also gets emphasized.
- □ The defence mechanisms of ego is also emphasized.
- Provides scope for a serious interest in psychological treatment of mental problems.
- Provides scope for further theoretical and research work in personality.

- Lacks empirical evidence and relies too much on therapeutic achievements.
- Freud's clinical data are also inaccurate, flawed and selective at best.
- □ The theory also does not have scientific proof.
- □ The role of sexual drive is over emphasized.
- □ The theory suggests that there is no free will.

# Erik Erikson-Theories and

## concepts



#### Stages Psychosocial

**Performent**y of development that expanded Freud's original five stages to encompass the years of life after early childhood.

of

#### **Ego Psychology**

Erikson regarded the ego as an *autonomous system* that dealt with reality through the conscious thought process, including perception, attention, and memory. Ego was not at the mercy of the id or super-ego.



#### **The Identity Crisis**

The failure to achieve ego **identity** during adolescence.

#### **Epigenetic Principle**

Optimal personality development involves a sequencing of life tasks that emerges according to a predetermined principle of readiness by the individual.



# MERITS & DEMERITS

### Strengths

- Provides a broad framework to view
  development throughout the entire
  lifespan.
- Emphasizes the social nature of human beings and the important influence that social relationships have on development.
- Evidence supporting Erikson's ideas
  about identity has been found.

Weaknesses Does not explain the mechanisms of crisis

resolution & the process of moving from one stage to the next.

- Focused too much on childhood, neglecting the development that occurs in adulthood.
- Criticized for using the male experience as
  the default template for human
  development.
- Erikson based much of his theory of biographical case studies.

# **Clinical Applications**



The Psychodynamic Approach:

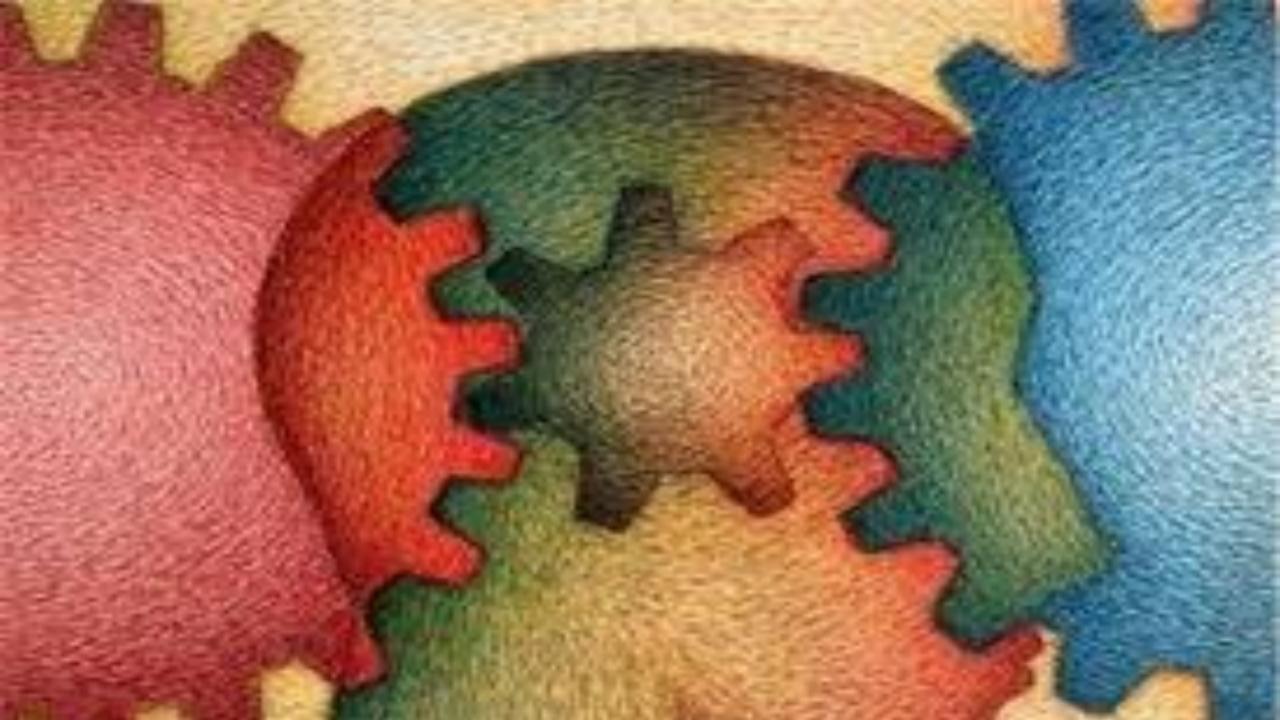


The concept of 'orality' helps understand the part played by the mouth in emotional development and body ego.-Cradle of Perception.

**Recognition of orally based anxieties.** 

**Employing defence mechanisms in behaviour guidance.** 

Role of Parental attitudes in influencing child behaviour.



# Jean Piaget-Theories and concepts



#### Genetic Epistomology

It explains the process of how people develop cognitively from birth throughout their lives. The study of child development as a means of answering epistemological questions.

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### Biological Model of Intellectual Development

Regarded as an extension of the biological process of adaptation which has also two on-going processes: assimilation and accommodation.



#### Schema

A Schema is a structured cluster of concepts, it can be used to represent objects, scenarios or sequences of events or relations.

### Stages of Cognitive Development

Fourdistinctstages:Sensorimotor,preoperational,concrete& formal.



# Merits & Demerits

- Shows that children think differently to adults
- Piaget's theory has improved the understanding of cognitive development.
- **Theory has had a huge impact on education**

- Piaget's research methods were not reliable and was formed from a biased sample.
- Doesn't consider that children learn at different rates.
- Both under and over estimates children's cognitive abilities.
- Doesn't consider the quality of a child's

informal and formal education.

# **Clinical Applications**



Short, Direct Commands are more effective in preoperational and concrete Operational stages-Limited reasoning skills & difficulty in understanding the effect of behavior on treatment. Hence long verbal explanations are not effective.



Constructivism- Cognitive Equilibrium-Animism-Centering-Egocentrism.

# Ivan Pavlov-Theories and

### concepts



#### Classical Conditionir

**Conditioning** A learning procedure in which a biologically potent stimulus is paired with a previously neutral stimulus & the learning process that results from this pairing.



Laws of Conditioning Acquisition; Extinction; Spontaneous Recovery; Generalization and Discrimination.



#### **Pavlov's Research**

Studied the physiology of digestion in dogs.



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A change in the environment is the stimulus; the reaction of the organism to it is the response.



# MERITS & DEMERITS



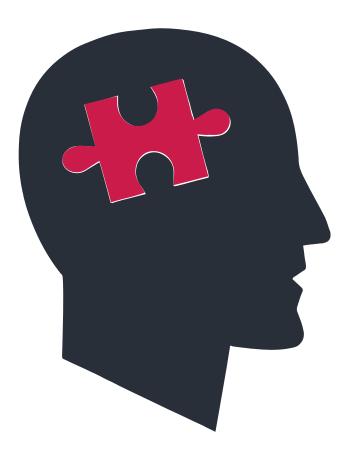
### Strengths

- Emphasizes learning from our environment.
- It is scientific; based on empirical evidence.
- **Can be demonstrated in real life.**
- □ It is useful- Real life applications.

- Classical conditioning does not account for the idea of free will. It is deterministic.
- This learning process underestimates how unique human beings really are.
- Supports nurture over nature. It is incomplete to present behavior solely in terms of nature or nurture.



# **Clinical Application**



Understanding certain emotional responses in the operatory- Dental Fear- Fear of White Coat.

Structuring Dental Treatment to prevent development of fear.

# **BF Skinner-Theories and**

### concepts

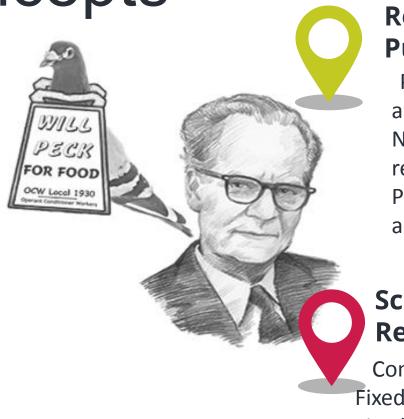


#### Operant Conditioning

**Conditioning** Referred to as instrumental **conditioning**) is a method of **learning** that occurs through rewards and punishments for behavior. Through **operant conditioning**, an association is made between a behavior and a consequence for that behavior

#### **Operants**

Skinner identified three types of responses, or operant, that can follow behavior: Neutral, Reinforcers, Punishers.



### Reinforcement & Punishment:

Positive reinforcement = adding reinforcement. Negative reinforcement = removing reinforcement. Positive punishment = adding punishment.

### Schedules Reinforcement

Of

Continuous Reinforcement, Fixed Ratio Reinforcement, Fixed Interval Reinforcement, Variable Ratio Reinforcement, Variable Interval Reinforcement

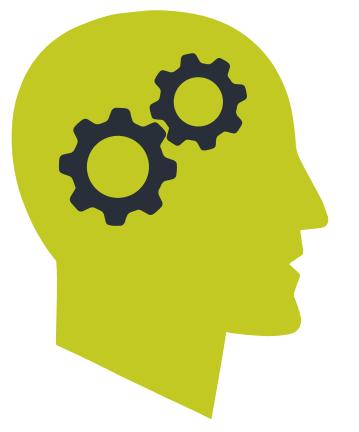
# Merits & Demerits

- Operant conditioning can be used to explain a wide variety of behaviours.
- It also has practical application (such as token economy).
- □ Fails to take into account the role of inherited and cognitive factors in learning.
- Also, <u>social learning theory</u> (Bandura, 1977) suggests that humans can learn automatically through observation rather than through personal experience.
- The use of animal research in operant conditioning studies also raises the issue of extrapolation.

McLeod, S. A. (2018, Jan, 21). Skinner - operant conditioning. Simply psychology: https://www.simplypsychology.org/operant-conditioning.html



### Clinical Applications- Behaviour Modification



**Behaviour Shaping:** Through successive approximation. Rewards and punishments are delivered in such a way as to encourage the subject to move closer and closer to the desired behaviour each time. [Contingency Management; Aversive Conditioning; Voice Control]



**Token Economy:** A system in which targeted behaviours are reinforced with tokens (secondary reinforcers) and later exchanged for rewards (primary reinforcers).

# Albert Bandura-Theories and concepts

People learn from one another, via observation, imitation, and modeling. The **theory** has often been called a bridge between behaviorist and **cognitive learning theories** because it encompasses attention, memory, and motivation.



#### **Mediational Processes**

Attention, Retention, Reproduction, Motivation



#### Reinforcement

External/Internal; Positive/ Negative; Vicarious Reinforcement

### Identification

Internalising observed behaviors, values, beliefs and attitudes of the person with whom you are identifying.



# MERITS & DEMERITS



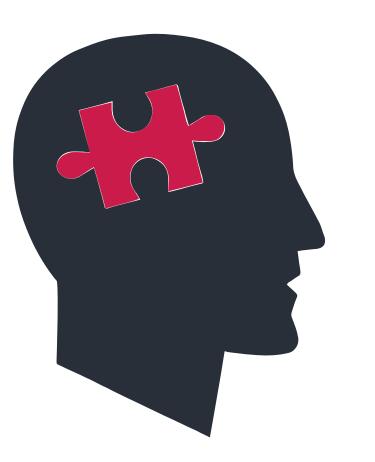
- It is a more comprehensive explanation of human learning by recognizing the role of mediational processes.
- Takes thought processes into account and acknowledges the role that they play in deciding if a behavior is to be imitated or not.

- It cannot adequately account for how we develop a whole range of behavior including thoughts and feelings.
- It is limiting to describe behavior solely in terms of either nature or nurture and attempts to do this underestimate the complexity of human behavior.

# **Clinical Applications**



### Modelling



- Filmed/In-vivo **Modeling:**Filmed/in-vivo modeling requires the child to watch another person (model) either on film or invivo (real life) going through, in this particular situation, dental treatment.
- **Modeling**Participant modeling Participant Ш involves active participation from the observer. Typically, the observer is asked to watch a model similar to that found in filmed or in-vivo modeling. In addition, the child is asked to practice or engage in the skills the model is demonstrating during the modeling.

Catherine Do, BS. Applying the Social Learning Theory to Children with Dental Anxiety The Journal of Contemporary Dental Practice, Volume 5, No. 1, February 15, 2004



### **Abraham Maslow-Theories** Hierarchy of Needs and concepts The



A motivational theory in psychology comprising a five-tier model of human needs, often depicted as hierarchical levels within a pyramid.



#### Deficiency **Needs Vs Growth** Needs

2

Deficiency needs arise due to deprivation and are said to motivate people when they are unmet.

Growth needs stem from a desire to grow as a person.

### **Expanded Hierarchy** of Needs

Includes cognitive and aesthetic needs (Maslow, 1970a) and transcendence needs

(Maslow, 1970b).

The Five Tier Model

Physiological needs-Safety needs-Love and belongingness needs-Esteem needs-Self-actualization needs.



McLeod, S. A. (2018, May 21). Maslow's hierarchy of needs. Simply psychology: https://www.simplypsychology.org/maslow.html

# Merits & Demerits

- Maslow's (1962) hierarchy of needs theory has made
  a major contribution to teaching and classroom
  management in schools.
- Maslow looks at the complete physical, emotional, social, and intellectual qualities of an individual and how they impact on learning.
- Maslow formulated the characteristics of self-actualized individuals from undertaking a qualitative method called biographical analysis. This method is extremely subjective and prone to bias.
  Population validity of Maslow's findings is questionable.
- It is extremely difficult to empirically test
  self-actualization in a way that causal relationships can
  be established.
- Maslow's assumption that the lower needs must be satisfied before a person can achieve their potential

# **Clinical Applications**





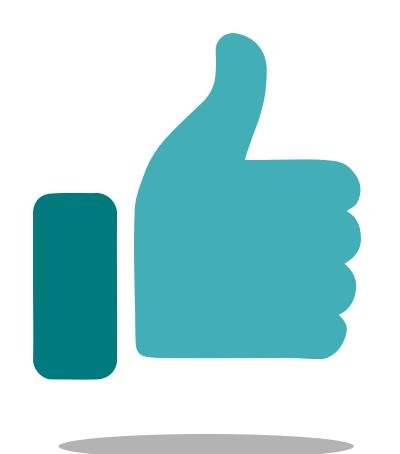
Ensuring patient feels secure in the Dental Operatory- satisfying safety needs. 2



Appealing to Esteem Needs to motivate.



WHEN LITTLE PEOPLE ARE OVERWHELMED BY BIG EMOTIONS, IT'S OUR JOB TO SHARE OUR CALM. NOT JOIN THEIR CHAOS. ~ L. R. KNOST



## THE BEST THING IN THE WORLD IS SEEING THEM SMILE BECAUSE OF

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## Questions

