

Psychology 2301  
Study guide  
Exam 2

**Synaptogenesis:** the process of creating new synapses which happens very quickly in the first couple of years after birth

**Myelination:** a process in neuronal development in which sheaths made of a substance called myelin gradually cover individual axons and electrically insulate them from one another to improve the conductivity of the nerve

**Cortex:** part of the brain responsible for higher thought and function

**reticular formation:** the part of the brain that regulates attention

**babinski reflex:** 2 years old, big toe goes up, not down when foot is stroked. Sign of a brain or nervous system disorder

**moro reflex:** infantile reflex normally present in all infants/newborns up to 4 or 5 months of age as a response to a sudden loss of support, when the infant feels as if it is falling. It involves spreading out the arms (abduction), unspreading the arms (adduction), crying (usually)

**breastfeeding:**

- Only breastfeed for first 6 months

- Supplement+ breastfeed first year

- Benefits: low likelihood of diseases (diabetes, cancer, asthma, etc.), lower rate of infant mortality, less likely to die of SIDS

- Benefits to mother: less likely to develop post-delivery bleeding, increased spacing between kids, stop ovulating, return to pre-pregnancy weight sooner, low risk of disease (ovarian cancer, breast cancer, and osteoporosis).

**Malnutrition:**

**Micronutrient:** not enough vitamins and minerals, anemia, motor development delays, food insecurity, low birth weight, low-iron formula

**Macronutrient:** Too few calories for growth, marasmus (underweight, chronic diarrhea, neurological damage), Kwashiorkor (protein deficient, swollen bellies and feet, thin hair, irritable, brain damage, weened from mother/no breastfeeding)

**SIDS:** Sudden Infant Death Syndrome. Random death of apparently healthy infant within 1<sup>st</sup> year, think it's caused by neurological and brain problem, 2500/year, 2-9 mos., "crib death"

**mortality rates:**

- Highest group in US: blacks, poor, boys

- Lowest group in US: whites, wealthy, girls

**Immunization:** Vaccination shots within the first few years of life. Shows access to care, how adequately kids are cared for. Hepatitis DTP, flu, polio, measles, chicken pox.

**Habituation:** form of learning in which an organism decreases or ceases to respond to a stimulus after repeated presentations

### **Piaget, sensorimotor stage:**

- Substage 1: Infants develop reflexes
- Substage 2: coordination of senses, primary circular reaction: (look at baby, baby look at hand. Reaction that focuses on self. sticks anything in his mouth that he can get his hands on. He has also started looking in the general direction of sounds that he hears.)
- Substage 3: secondary circular reactions (child explores outside world and does actions to get a reaction from adults)
- Substage 4: means-end behavior (actions with a goal to produce effect and accomplish something)
- Substage 5: Tertiary circular reactions (experiment on environment with behaviors, see what happens)

### **challenges to Piaget's work:**

- Activity? On environment
- Object permanence late
- Deferred imitation
- Underestimate what kids can do
- Kids don't appear to grow in stages
- Egocentrism?

### **language development**

**behaviorist (Skinner):** learn language through operant conditioning and reinforcement, kids are pressured to communicate clearly to get needs met

**nativist (Chomsky):** language is biologically based, critical period for learning language is 2 years old-puberty

**interactionist (Vygotsky):** language development is both biological and social.

Interactionists argue that language learning is influenced by the desire of children to communicate with others. The Interactionists argue that children are born with a powerful brain that matures slowly and predisposes them to acquire new understandings that they are motivated to share with others

### **theories of attachment;**

**Freud:** feeding serves as basis for attachment, oral activities

**Erikson:** feeding not crucial, mother's responsiveness and warmth

**Bowlby:** adults and children actively involved in attachment

Internal Working Model: How a child views long-term and future relationships based on mother's response and relationship with child

**stranger anxiety:** fear of people the child is not familiar with. 8-9 months.

**separation anxiety:** fear of being away from caregiver. 8 months. Crying

### **attachment (Ainsworth)**

**secure:** mother is responsive and acts as the basis for information

**insecure/avoidant:** overly independent, anxious. Mothers who didn't want to be mothers

**insecure/ambivalent:** anxious, never comfortable, mother doesn't calm anxiety and is not a secure base. Mother is inconsistent.

**insecure/disorganized:** trauma

### **temperament (Kagan)**

**easy:** secure kids, adaptive in new situations

**difficult:** insecure, nervous in a new situation

**slow-to-warm up:** in new situation, nervous and uncomfortable at first, but eventually is ok with the difference

### **characteristics of high quality day care**

Ratio:

Under 2- 1:4

2-3: 1:4-1:10

Group size:

Infants: 6-8

1-2: 6-12

3+: 15-20

-Large, colorful, age appropriate space with activities

-Structured day

### **patterns of physical growth early childhood**

-2.5 inches/year

-Gain 6 pounds

**lateralization:** Localization of function attributed to either the right or left side of the brain

**diet and nutrition:** lower appetites that vary from meal to meal

**eating patterns; overweight:** The longer a child is obese in childhood, the more likely it is that the child will be obese in adulthood. Factors include obese parents, high responsiveness to sweet taste, heightened response to unwanted stimuli (distress, stress eating), rate at which kids eat, kids who watched more television

### **Piaget, preoperational stage**

Accomplishments:

Semiotic (symbolic) function: Think by using symbols, pretend play, one object represents another, represents world in head, think in words

-Deferred imitation: A child sees how an adult solves a problem, remembers it, and uses it later

-Gaps

-Conservation (don't understand): object is the same despite changing number, mass, and volume

Centration: Child captured by one aspect of a problem

Egocentrism: child only cares about self and thinks everyone see world through his/her eyes

### **Theory of Mind**

- Awareness of mental states and emotions of others and self

- 2 yr olds understand that infants don't understand speech as well

**false belief principle:** A box said it had one thing but had something else. Kids can be fooled