Learning Theories

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ED 504 Educational Psychology

Why Learning Theories Matter

- To completely understand the context in which students learn, we must understand the psychological factors that influence learning
- Having a coherent and complex understanding of the learning process allows individuals to understand how to best tailor their classroom environment to benefit their students
- Full understanding of the frameworks and principles best enable teachers to adapt their stylistic choices to best benefit their students learning.
  - Different then above, as student learning and student learning environment are apples to oranges in difference
- Coherent understanding of the basics, if not a deeper understanding of learning theories creates a better educator, and in turn builds better students in the classroom! You should strive to best understand learning theories.

Where do we start?

- There are half a dozen or more learning theories that are actively studied in the modern era
  - More are being developed and understood as the world keeps turning
- Certain terms help benefit teachers and learners best. Lets define some key terms that tend to appear more then once throughout all learning theories
  - Constructivism: often known as building on previous knowledge (like a construction site).
  - Behaviorism: Learning by the observing of actions from individuals around them.
  - Humanism: Based on meeting human needs in order to promote learning.
  - Connectivism: (new) the attachment of knowledge between learners and sources.
- These are just a few, there are more! Follow along to learn more

Behaviorism

- Primarily developed by John Watson (1878-1958) , B.F. Skinner (1904-1990), and Ivan Pavlov (1849 - 1936)
- Each behaviorist had their own "version" but they all follow the same idea: learners gain knowledge by observing actions from others.
  - Watson believed that, "human development should be based on observation of overt behavior,"(Brown, Zhou, 2015). Essentially that observable behavior is the behavior that learners learn from
  - Skinner had deep rooted ideals that individuals being exposed to a stimulus gets a response. Essentially the thought that when a learners will reinforce their own behavior (Main, 2023). Also known as operant conditioning
  - Pavlov developed his theory around a "neutral stimulus with an unconditioned stimulus to elicit a conditioned response."(Main, 2023). Also known as classical conditioning
- Consider how you learned to wake up to your alarm clock in the morning. Did you one day just wake up to it, or has it taken time to get use to?

Cognitivism

- Primarily developed by Jean Piaget (1896-1980). Piaget had a large focus on the "stages" that individuals go through during their growth. Each stages has an age range, and with it a "goal" that the individual should reach by the end of the age.
    - Sensorimotor (0-2): Reaching object permanence. Essentially learning Cause and Effect
    - Preoperational (2-7): Reaching Symbolic Thought. They learn to imitate, as well as engaging in memory/imagination.
    - Concrete Operational (7-11): Reaching Operational Thought. At this age range they start to problem solve, and understand conservation.
    - Formal Operation (12+): Abstract Thoughts. Individuals understand theories, hypothesis, and other non-concrete ideals.
- Piaget argued that these are hard cutoffs, however individuals can stray from these age gaps. It's very individual specific.
- Consider students in third grade versus students in sixth. Can you ask a third grader to write a question/follow the scientific thought process?
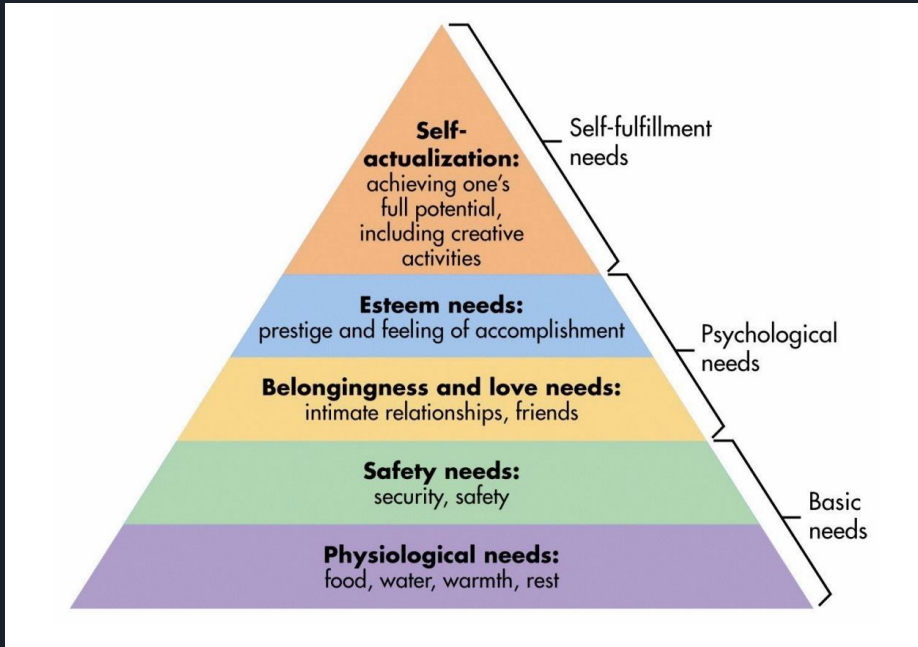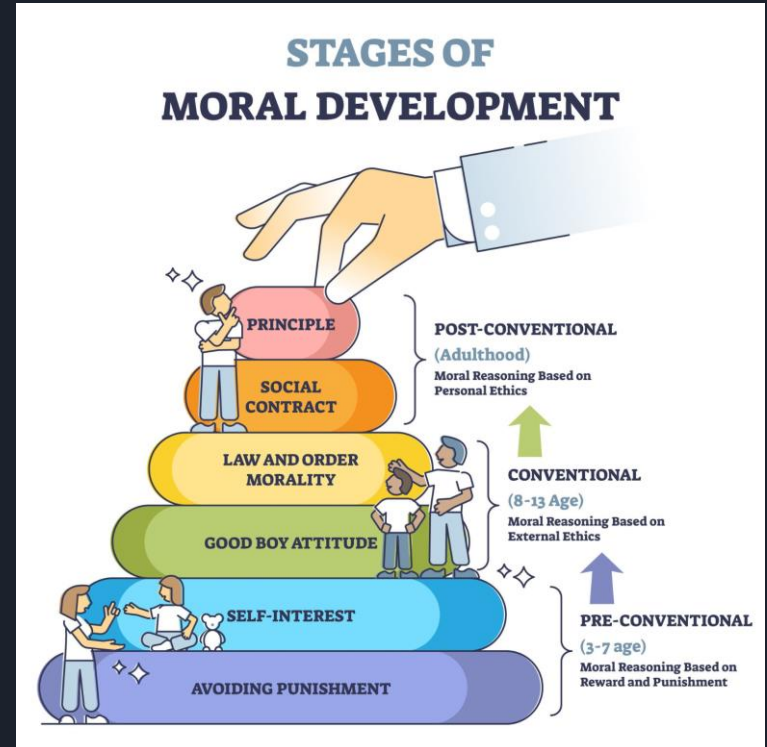
Humanism

- Primarily developed by Lawrence Kohlberg (1929-1987) and Abraham Maslow (1907-1970).
- Both Maslow and Kohlberg had different methods of thinking, but both were in the same relative area.
  - Maslow believed for learners to learn, they must have their needs met. He developed the hierarchy of needs (see next slide) to best define when needs are met. Once these are met, he believes that learners (and individuals) can properly engage themselves in content and grow
  - Kohlberg developed six "stages" of moral development for students. It primarily focuses on the development of morality for children. View the graphic on the next slide.
- The primarily limitation with these theories of learning/development are the human element. Each student/individual grows on their own time, and as a result can be subject to their own reality. No two individuals grow on the same schedule.

Humanism, Continued

Self-actualization: achieving one's full potential, including creative activities — Self-fulfillment needs

Esteem needs: prestige and feeling of accomplishment — Psychological needs

Belongingness and love needs: intimate relationships, friends

Safety needs: security, safety — Basic needs

Physiological needs: food, water, warmth, rest

STAGES OF MORAL DEVELOPMENT

PRINCIPLE — POST-CONVENTIONAL (Adulthood) Moral Reasoning Based on Personal Ethics

SOCIAL CONTRACT

LAW AND ORDER MORALITY — CONVENTIONAL (8-13 Age) Moral Reasoning Based on External Ethics

GOOD BOY ATTITUDE

SELF-INTEREST — PRE-CONVENTIONAL (3-7 age) Moral Reasoning Based on Reward and Punishment

AVOIDING PUNISHMENT

Experiential / Transformative / Connectivism

- Three of the more modern theories, Experiential, Transformative, and Connectivism
    - Experiential Learning Theory: Developed by David Kolb. It has a large attachment to Experiencing , Reflecting (Institute of Experiential Learning, 2024), Thinking, and Acting. Each aspect is primarily focused around experiencing situations/related in order to gain knowledge/learn. Often it's considered experience gained from internships/hands on training/related.
    - Transformative Learning Theory: Developed by Jack Mezirow. A little bit different, in the steps of learning through the theory, but the key focus surrounds a dilemma or situation that causes a change in thinking/requires a change in thinking in order to best understand a new topic.
    - Connectivism: Developed by George Siemens and Stephen Downes. A very modern take, in the sense that individuals are considered "nodes" that link to the appropriate information. It's a unique measure, however it's a modern take. This learning theory has had a large focus as a result of the COVID-19 pandemic.
- Each of these learning theories have a more modern take/attachment making them more relatable.

Experiential / Transformative / Connectivism Continued

- **A disorienting dilemma**: A learner undergoes an experience that has the potential to shake up their understanding of how the world works.

- **A self examination with feelings of guilt or shame**: The learner reacts to the dilemma emotionally, often in a negative way.

- **A critical assessment of epistemic, sociocultural, or psychic assumptions**: The learner stops to think through what they believed before the dilemma and how that belief has been challenged by that dilemma.

- **Recognition that one's discontent and the process of transformation are shared and that others have negotiated a similar change**: The learner realizes they are not alone in these negative feelings. Others have experienced similiar events and feelings.

- **Exploration of options for new roles, relationships, and actions**: The learner begins the process of "learning the new rules" that have come about because of the initial dilemma and their reaction to it.

- **Planning a course of action**: The learner takes control of their own experience and begins imagining a different future, one where they can benefit from the change in viewpoint.

- **Acquisition of knowledge and skills for implementing one's plan**: The learner seeks what they need to be successful in on their new path.

- **Provision trying of new roles**: The learner begins to see themselves in a different light and tries on new identies in that new world.

- **Building of competence and self-confidence in new roles and relationships**: The learner masters the new skills.

- **A reintegration into one's life on the basis of conditions dictated by one's perspective**: The process completes with the learner fully incorporating the full journey into their life story.

Wichita State University, 2024

Experiential Learning Institute, 2024

Non-Western Theories of Learning / Non-Traditional Learning Theories

- It's worth acknowledging that there are learning theories that don't fall into our traditional "view point"
  - Asian Learning Theory is a great example
    - Focuses a large amount of attention on the educator, with large respect to them. Not a lot of question/concern, lots of trust in the wise/experienced. Less student engagement, as the teacher is considered the head of the class.
    - This does vary outside of just countries like China, as there are different versions of ALT.
- Other Non-Traditional Learning theories exist
  - LGBTQ+
    - Focuses on power structures with a understanding of seeking to dismantle traditional opposition forces (UW Tacoma, 2024)
  - There are a garden variety

Further Considerations/Applications to Learning

- How might this apply to your classroom?
- Consider how being informed may make you a better educator?

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