

Cog Psych Test 2

Chapter 4 Working Memory

- Memory
 - retention of information over time
- Three Different Aspects
 - encoding
 - paying attention
 - storage
 - keeping information
 - retrieval
 - recalling information
- Traditional view
 - short term memory
 - brief memory for material that you are currently processing
 - keeps information active and accessible
 - long term memory
 - memory for experiences & information that have accumulated during your life
- Sensory Memory
 - extremely brief sensory activation
 - much sensory input never enters conscious processing
 - types of sensory memory:
 - iconic memory (visual)
 - echoic memory (auditory)
- Rehearsal
 - repetition strategy that maintains information in short term (working) memory

- without rehearsal, items are quickly forgotten
- Short-term memory: Capacity
 - the capacity of short-term memory is typically limited to 7 (+/-2) items
 - in the absence of rehearsal, "pure capacity" is probably closer to 3-5 items
- Long Term Memory
 - memory for experiences & information accumulated over your lifetime
 - large capacity
 - anything other than what we are currently processing in STM (or working memory)
 - keep in mind LTM does not mean it has to be a long time ago
- Evidence fo STM/LTM: Serial Position Effect
 - position in the list
 - primacy effect
 - better recall for items at the beginning of list
 - more rehearsal
 - stored in LTM
 - menus!
 - recency effect
 - better recall for items at end of list
 - still in WM with less interference
- Limitations with Atkinson and Shiffrin
 - sensory memory: a part of perception rather than actual memory
- Baddely and Hitch
 - thought that STM would have to be used for reasoning, comprehension, thinking
 - new ideas of STM
 - digit span is not everything to STM
 - think of a "working memory" a temporary mental workspace

- Short Term vs. Working Memory
 - often used interchangeably...but not quite the same
 - ex.
 - short term memory
 - memory span (digit span)
 - working memory
 - memory span + complex span tasks
 - often more interesting
 - very predictive of other cognitive abilities: intelligence, problem solving, etc.
- The Turn to Working Memory
 - working memory approach-our immediate memory is a multipart system that temporarily holds and manipulates information while we perform cognitive tasks
 - central executive
 - integrates information from the phonological loop, the the visuospatial sketchpad, the episodic buffer, and long term memory
 - plays a role in: focusing attention, selecting strategies, transforming information, and coordinating behavior
 - suppressing irrelevant information
 - characteristics
 - plans and coordinates, but does not store information
 - executive supervisor
 - decides which issues deserve attention
 - selects a strategy
 - decided how to tackle a problem
 - limited ability to perform simultaneous tasks
 - BOSS OF WORKING MEMORY
 - recent views