

Candidate 3 evidence

4)a) long term memory (STM) is encoded by semantic coding, you can encode things into your long term memory into your long term memory by rehearsal, rehearsal is when you keep repeating what you want to remember over and over again e.g if you are going to the shops and need to buy three things you keep repeating the three things over and over again until encoded into your LTM.

In the MSM it states that the capacity of LTM is unknown, however some say it is an unlimited capacity. However the multistore model also states that memory is linear going from store to store while that is not true as LTM can affect STM supported by KF brain damaged patient who still had long term, memories and could still play piano however couldnt form new short term memories

in the MSM the duration of LTM is also quite unknown,however some people say 50 years or more,while it could also even be limitless.

the WMM states that there is an episodic buffer which is our minds way of mixing sights and sounds into a coherent episode which can be encoded into our episodic LTM.

the central executive in WMM recieves info from sensory register or long term memory, and decides which slave system deals with it.

b) trace decay theory is when a period of time passes and memories start to fade/ decay when not rehearsed or revisited in the LTM,, e.g if you revised for a test and you dont revise for it again and then eventually when the test comes you have forgotten all that you revised,this is due to not revisiting it, therefore is lost from new/old information taking over, past information taking over new is known as proactive interference, an example of this could be you got a new phone number however you keep mixing it up and instead remembering your old phone number, retroactive interference is recently learned information taking over your past learned experiences, an example of this being you moved house and and forget your old adress overtime completely and only remember your new one. Failure of retrieval is when you do have the memory in your long term, however the context cues make you forget it, e.g having a memory that was encoded in a psychology classroom you need to be in the psychology classroom to be able to retrieve the memory again. Another example of trace decay is, e.g your parent asking you to buy some milk and butter of a certain brand, and while you are walking to go get the items, you may be rehearsing the brand names in your head, to encode them from your stm to ltm, and ensure you remember the brands, however you see a friend and you start speaking to them instead, therefore you stopped rehearsing and started talking to your friend and after the period of time passes, you will have eventually

forgotten the brand names as new information from talking to your friend has now overtaken the old information (retroactive interference) of the brands which were lost to trace decay and faded.

c) One study that supports the WMM is the Baddeley word length effect study

aim: the aim of this study was to see if the length of words impacted ability to recall, trying to support the idea in the WMM that the phonological loop is encoded acoustically based on real time.

method: participants were shown numerous words of varying lengths some longer some shorter e.g longer one being "university", then after this the participants were asked to recall the words they remembered the results were then analysed.

result: in conclusion Baddeley found that length of does impact ability to recall, as the longer the word the less the participants could recall, showing that the phonological loop acoustic encoding is based on real time, encoded based on how long it would take you to say the word in real life out loud.

A weakness of this study is that it doesn't take into account the many other factors that go into memory, e.g some people in this study may just have better memory than others, or some may have had caffeine which would manipulate the results of this study drastically making the results less reliable and less accurate.

A strength of this study is that it was a lab study, meaning that most variables were highly controlled, e.g the words shown and for what length of time, making this study much easier to replicate and for other researchers to gather more info and expand on this study increasing validity.

this study can be applicable to real life as we can make it easier for people to recall longer words/sentences by breaking them up into chunks to make it easier to encode the info.

This study also helps other researchers expand and understand the WMM better as we now know more about the phonological loop and its capacity and duration making the study more valid.

This study could help with memory enhancement strategies, i.e trying to manipulate what we are trying to memorise to be the most efficient for our phonological loop.

a weakness is that this study lacks ecological validity as it isn't a common real life scenario asking people what words they remember depending on length making results potential less applicable to real life, less accurate and reliable.

supports the WMM as the working memory model has a phonological loop based on real life acoustic/auditory encoding, and consists of an articulatory process and phonological store.