Comparing autobiographical memories evoked by different sensory cues for younger and older adults

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Abstract
In this study, we aimed to determine whether autobiographical memories evoked by music may be cued more involuntarily than memories evoked by other types of cues, and if those memories contain more episodic detail and/or are more emotionally salient. Younger adults ages 18-35 (N=30) and older adults ages 65-85 (N=30) were randomly presented with music clips, movie clips, images of famous persons from significant periods in their lives, as well as verbal prompts as a control condition. Participants verbally recalled any memories that were evoked, and self-reported their familiarity with the cue, memory retrieval effort, vividness of the memory, and affective content of their memory. We predict memories evoked by music will be more involuntarily retrieved and contain more episodic detail.

Introduction
Previous research indicates our ability to voluntarily recall detailed autobiographical memories declines with age, and this common age-related decline can reduce quality of life. Pictured to the right is a visual representation of the scientific phenomenon known as the “reminiscence bump,” which describes the tendency of people to remember their youths with more clarity. This informed our selection of famous person cues based on the birth year of the participant.

Methods
Participants were exposed to 20 trials presented on a desktop computer with a research assistant present. Trials consisted of short clips of music and movies that were popular during the participant’s youth, as well as pictures of era-appropriate celebrities. There are also verbal memory prompts, e.g. “Tell me about an event from when you were 11-18 years old.” If a participant experiences a spontaneous autobiographical recollection, then they are recorded giving a detailed narrative description. Memory recordings were later coded for the type and quantity of episodic detail. The quantities of detail, combined with the self-report data from during the experiment, will make up our data set.

Expected Results
Because this experiment is ongoing, the results presented will be informed by an incomplete data set. I apologize for having turned in an incomplete representation of my poster, I am presently working with my advisor in order to pull a graph together. As of now, data suggests that participants self-report a lower retrieval effort on average for memories evoked by music, even for songs which they rate lower in familiarity.

Citations