**Research Question**: Does listening to music while studying enhance performance?

**Listening to music while studying has a majority negative result on performance.** The effects of music varies on the type of task being performed, the individual’s personality, and the genre of music being listened to.A majority of studies found when people engage in cognitively demanding tasks, their performance tends to be negatively affected when they listen to music simultaneously, compared to when they work in silence [(Banbury et al., 2001)](https://www.zotero.org/google-docs/?6p79Os). Reading comprehension is a demanding task to the brain, especially dense reading material, and when listening to music while reading, it makes reading comprehension less efficient. Listening to music while reading can lead to increased instances of needing to reread passages compared to reading without music [(Zhang et al., 2018)](https://www.zotero.org/google-docs/?AaQREC). When looking at the types of music, a study revealed that listening to lyrical music (such as pop music) significantly decreased reading comprehension performance among adolescents [(Anderson & Fuller, 2010)](https://www.zotero.org/google-docs/?GVbWxj).

**A person's personality and preference of genre influences the effect on music while studying.** The performance on cognitive tasks is influenced by whether an individual is an introvert or an extravert. Majority of studies shown that both introverts and extraverts were shown to have decreased immediate recall with music but when introverts exposed to music, particularly pop music had lower memory recall and reading comprehension performance compared to extraverts ([Goltz & Sadakata, 2021)](https://www.zotero.org/google-docs/?eGZeEg). It is hypothesized that since introverts need less external stimulation to reach optimal levels of arousal, overstimulation would decrease cognitive performance ([Goltz & Sadakata, 2021)](https://www.zotero.org/google-docs/?oKmOHt). Conversely, in the same article, another researcher proposed that music may enhance extraverts to reach their optimal level of arousal. TThere are varying opinions whether extraverts benefit from music while studying.

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