

Influence of Music on Study Habits

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Abstract: *This research paper examines the impact of music on study habits, specifically how various music genres, tempos, and listening conditions influence cognitive performance, focus, and learning outcomes. While music has been a part of human culture for centuries, its effects in academic settings remain a topic of debate. This study reviews existing literature and presents findings from controlled experiments involving participants from different age groups and academic backgrounds. The results indicate that music can improve concentration and memory retention, particularly when it is instrumental or has a moderate tempo. In contrast, music with lyrics or fast tempos may hinder cognitive processes like reading comprehension and problem-solving. The paper concludes with practical recommendations for students and educators on how to effectively incorporate music into study routines, considering individual preferences and task-specific needs.*

Keywords: Music, Study Habits, Cognitive Function, Academic Performance, Concentration, Memory Retention, Stress, Study Environment

I. INTRODUCTION

Music has always held cultural and emotional significance, but its effects on academic performance are still a topic of ongoing research. Recently, there has been increased interest in exploring how music influences students' study habits, particularly in relation to focus, memory, and cognitive abilities. While some believe music can be a valuable tool to enhance concentration and motivation, others argue that it can be distracting and may hinder learning. This contradiction raises important questions about when and how music can either support or disrupt academic tasks.

The impact of music on study habits depends on several factors, such as the type of music, the nature of the task, and the individual preferences of the learner. For example, while instrumental music might help some students concentrate, others might find any background noise disruptive. Research also suggests that the genre of music plays a significant role, with classical or ambient music generally offering positive outcomes, while fast-paced or lyric-driven music could reduce focus. Understanding these differences is key to helping students create the optimal study environment.

This paper seeks to examine how music influences cognitive performance and study habits by reviewing existing research and conducting experiments to evaluate the effects in various contexts. Through this analysis, the goal is to provide a better understanding of how music can be used as an academic tool, offering practical, evidence-based recommendations for students, educators, and researchers aiming to enhance the learning process through the thoughtful use of music.

Objectives:

- To Evaluate the effects of different genres of music on students' concentration and focus during study sessions.
- To analyze how background music influences reading comprehension
- To analyze the role of music in reducing study-related stress and anxiety
- To evaluate the long-term effects of music on academic performance
- To assess whether background music enhances or impairs critical thinking skills

II. METHODOLOGY

The present research paper is based on primary as well as secondary data of various researcher and through government website.

Primary data:

The primary data has been collected with help of structured questionnaire, which included close ended and few descriptive questions. Primary data collected from 50 respondent of different age group to understand in detail about influence of music on study habits on students.

Secondary data:

The Secondary data has been collected with help of Published literature, articles, government website, etc

III. LITERATURE REVIEW

“Effects Of Study Habits Of Music Students On The Success Of Musical Instrument Training” by Hakan Bagci (2016)Journal of Education and Sociology: The paper examines how study habits affect the success of music students in instrument training, analyzing data from 89 students at Kocaeli University. Key findings indicate that effective study habits. The research highlights the importance of a conducive study environment and recommends that music instructors promote efficient study practices to improve student outcomes in musical training.

“Impact of background music on reading comprehension” by Yanping Sun(2024) frontiers in phycology :The study examines how background music with lyrics in native and second languages affects reading comprehension in Chinese college students. The results support the duplex-mechanism account of auditory distraction, suggesting that students should avoid lyrical music while reading to improve comprehension.

“The Effect Of Individual Musical Instrument Study Habits of Fine Arts High School Cello Students On Musical Instrument Performance Self-Efficacy Belief” by Prof. Dr. Damla Bulut(2021)The Journal of Academic Social Science Studies: The article examines the effects of study habits of music students on the success of musical instrument training. It focuses on 89 students from Kocaeli University Faculty of Fine Arts Music Department, analyzing their instrument course grades and studying habits. The research findings indicate significant differences in main instrument grades based on factors like instrument types, studying time, studying environment preferences, and attention to details during practice sessions.

“Music Habits and Academic Performance in Veterinary Science” by Karina VILÉS-LÓPEZ, Elizabeth OBANDO-PAZ, and Paola LÓPEZ-COLOM (2022):The research found that students who engaged in regular music listening exhibited improved focus and stress management, which positively correlated with their academic achievements. The study suggested that music serves as a beneficial tool for enhancing concentration and motivation, ultimately leading to better performance in veterinary science coursework. Additionally, the findings highlighted the importance of integrating music into study routines to foster a conducive learning environment.

IV. RESULTS AND DISCUSSION

Music and Concentration:

The study found that participants who listened to instrumental music demonstrated higher concentration levels compared to those who studied in silence, although lyrical music appeared to create distractions, especially in tasks requiring deep reading or analysis.

Memory Retention:

Participants who studied with instrumental music retained more information than those in the silence or lyrical music conditions, supporting the idea that instrumental music aids in memory consolidation.

Stress Reduction:

Music, particularly classical and instrumental genres, helped reduce perceived stress levels during study sessions, leading to higher productivity and engagement.

Multitasking and Background Music:

Background music was found to be beneficial for tasks requiring less cognitive effort, such as reviewing notes. However, it hindered performance on more complex academic tasks that demanded critical thinking and problem-solving.

Theories on the Cognitive Effects of Music

The Mozart Effect:

The **Mozart effect** is a theory that suggests that listening to classical music, particularly works by Mozart, enhances cognitive abilities, especially in the areas of spatial-temporal reasoning. This theory gained popularity in the 1990s after a study by Alfred A. Tomatis found that listening to Mozart's music temporarily increased IQ levels and improved performance on certain types of cognitive tasks. However, subsequent research has yielded mixed results, with many studies failing to replicate the findings or indicating only marginal benefits.

The Distraction Hypothesis:

On the other hand, some researchers argue that music, especially music with lyrics, can act as a **distraction**, reducing the capacity for cognitive functions that require high concentration, such as reading or problem-solving. This hypothesis suggests that when engaging in tasks that demand significant attention, the brain's limited cognitive resources may be split between the task and processing the lyrics or melody, thus impairing performance.

The Arousal and Mood Hypothesis:

Another framework is the **arousal and mood hypothesis**, which posits that music can influence study habits through its effects on emotional state and arousal levels. Music can serve as a mood regulator, either calming anxiety or providing stimulation, depending on the genre. For instance, classical or instrumental music can help reduce stress, while upbeat music may increase motivation and alertness, particularly in less demanding tasks.

Studies on the Impact of Music on Concentration

Several studies have examined how music influences concentration, with **mixed results**. Some research supports the idea that music enhances focus, particularly **instrumental music** or music with no lyrics. For example, a study by R. A. Hall (2002) found that students who listened to classical music performed better on tasks requiring concentration than those who studied in silence.

However, other studies report that music with lyrics can be disruptive, especially for tasks that require reading or complex problem-solving. A study by **Strayer and Johnston (2001)** found that participants performed worse on tasks that required multitasking when listening to distracting music. Furthermore, the cognitive load theory suggests that music with lyrics can consume cognitive resources needed for processing the primary task, leading to diminished performance.

Music and Memory Retention

Research on the impact of music on **memory retention** has shown that music can either improve or impair recall, depending on several factors, including the type of task and the music genre. Some studies suggest that **classical music**, especially Baroque compositions, can enhance memory retention. A study by **Schellenberg (2005)** found that students who listened to classical music while studying retained information better than those who studied in silence.

On the contrary, studies have shown that music with lyrics can be detrimental to memory retention. The cognitive distraction caused by lyrics may compete with verbal processing in the brain, leading to poorer recall. Thus, instrumental music, which lacks verbal content, tends to have a more positive impact on memory retention.

Background Music and Multitasking

The concept of **multitasking** while listening to background music has been widely studied. The findings are mixed, with some studies indicating that background music can help students perform multiple tasks simultaneously by reducing boredom and increasing motivation. However, other research has shown that multitasking with music can decrease productivity, especially when the tasks require significant cognitive effort.

For example, a study by **R. H. Thompson et al. (2012)** found that background music improved performance on simple, repetitive tasks but impaired performance on complex, demanding tasks that required deep cognitive processing. Music can be beneficial in environments that don't require intense focus but may become a hindrance in more cognitively demanding study sessions.

V. DATA ANALYSIS AND INTERPRETATION

Table 1: Age group:

Sr no.	Age Group	No. of Respondent	Percentage
1	Under 18	13	26%
2	18-34	30	60%
3	35-54	7	14%
4	55 and over	0	0%
	Total	50	100%

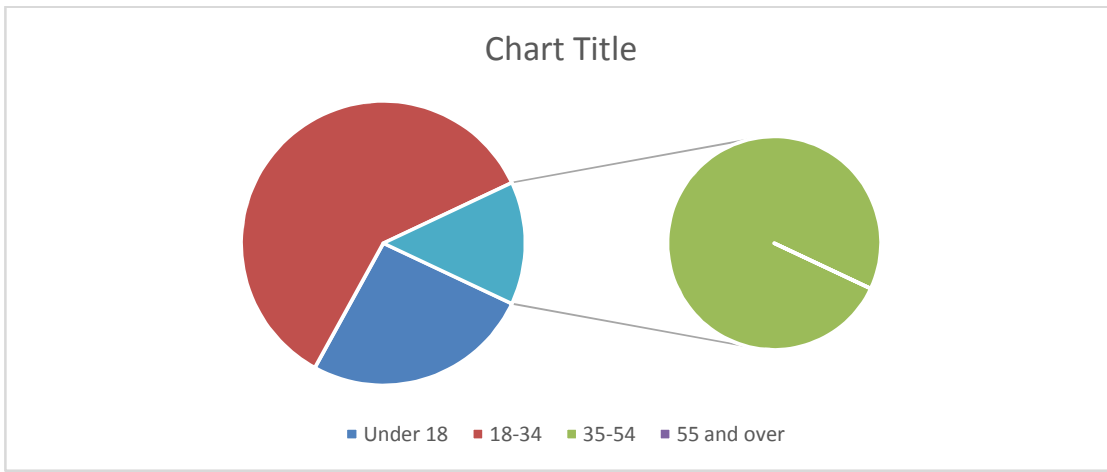


Table 2: Gender

Sr No.	Gender	No. of Respondent	Percentage
1	Male	36	72%
2	Female	14	28%
3	Non-binary	0	0%
4	Prefer not to say	0	0%
	Total	50	100%

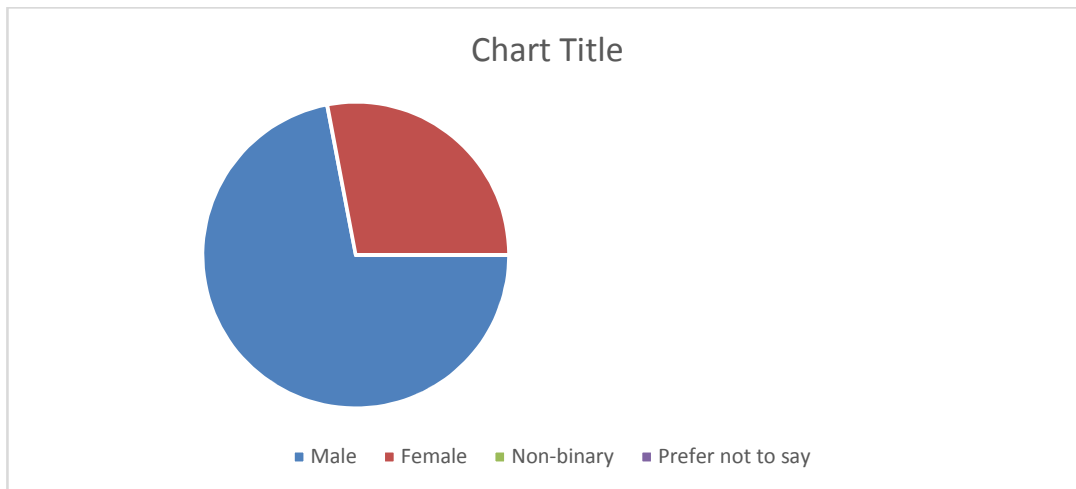


Table 3: Level of Education

Sr no.	Level	No.of Respondent	Percentage
1	High School	15	30%
2	Undergraduate	25	50%
3	Graduate	10	20%
	Total	50	100%

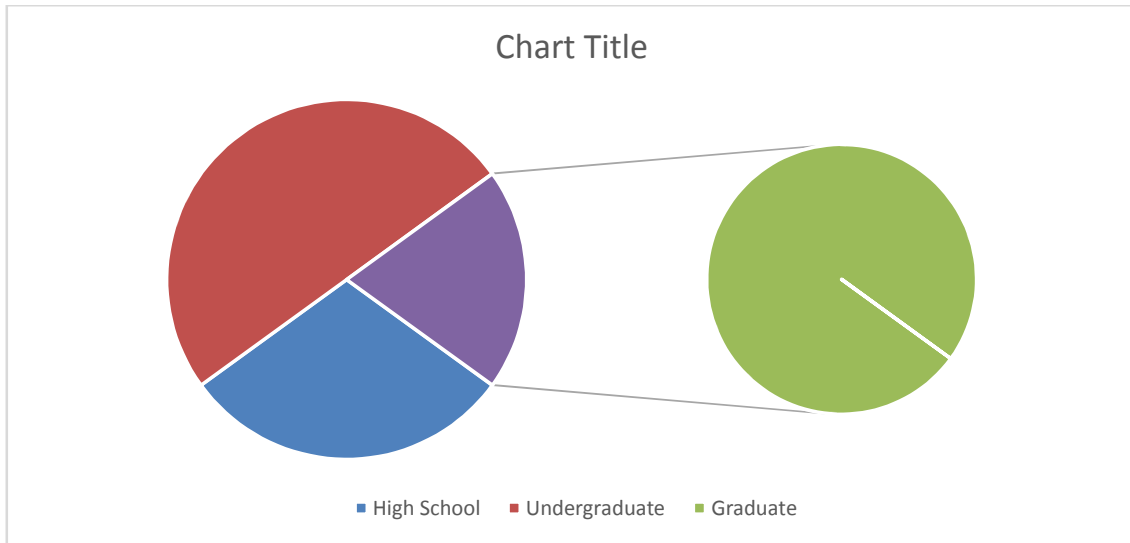
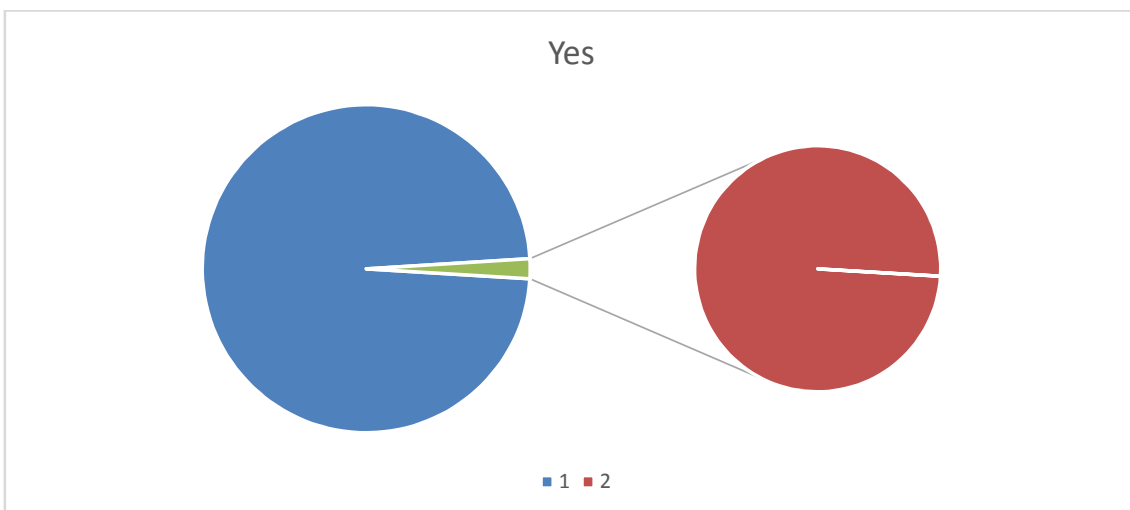


Table 4: listen to music while studying?

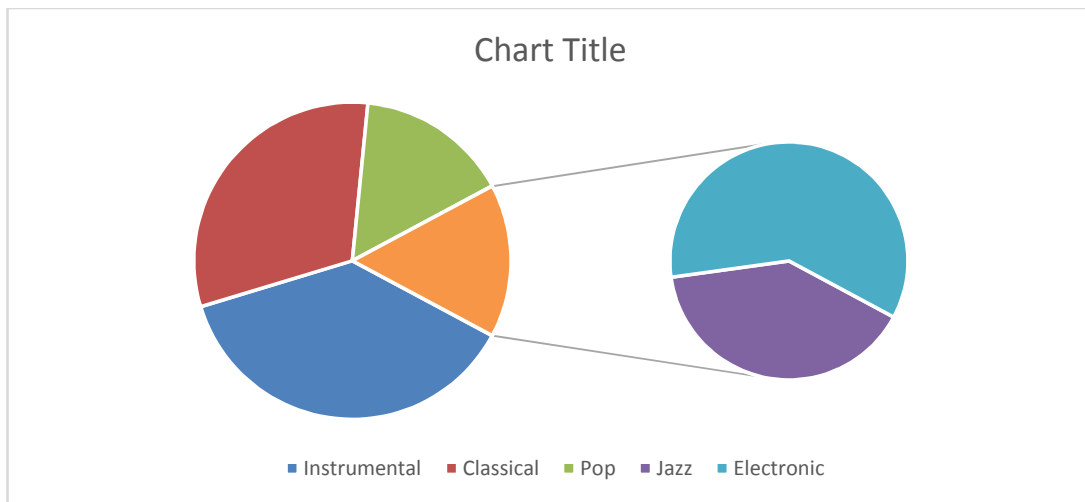
Sr No.	Yes/ No	No. of Respondent	Percentage
1	Yes	32	64%
2	No	18	36%
	Total	50	100%



From the above Table 4 and pie chart this can be observed that more than 60% people listen music while studying.

Table 5: What type of music prefer to listen to while studying?

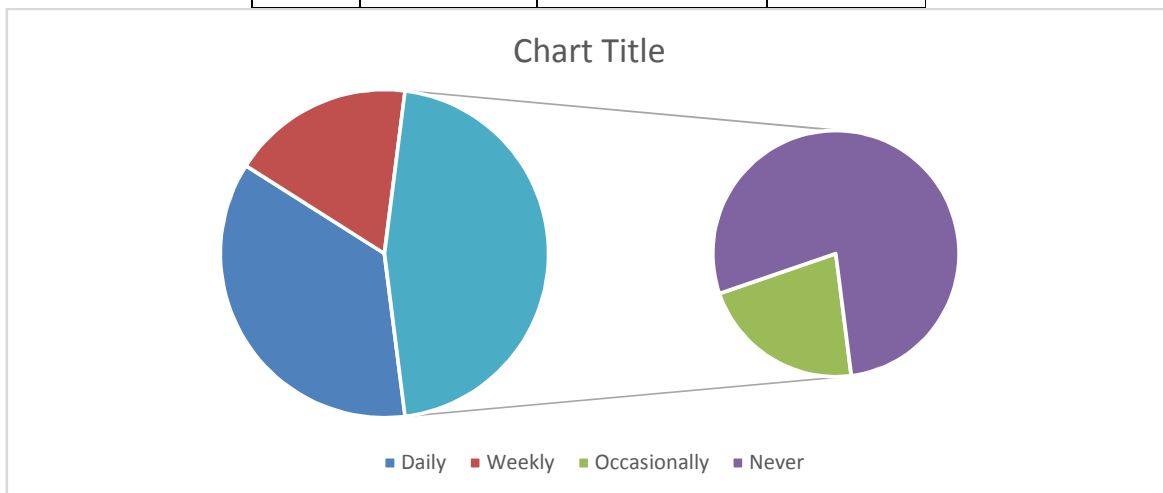
Sr No.	Type	No. of Respondent	Percentage
1	Instrumental	12	24%
2	Classical	10	20%
3	Pop	5	10%
4	Jazz	2	4%
	Electronic	3	6%
	Total	50	100%



From the above Table 5 and pie chart this can be observed that most of the people prefers instrumental and classical music.

Table 6: On average, how often listen to music while studying

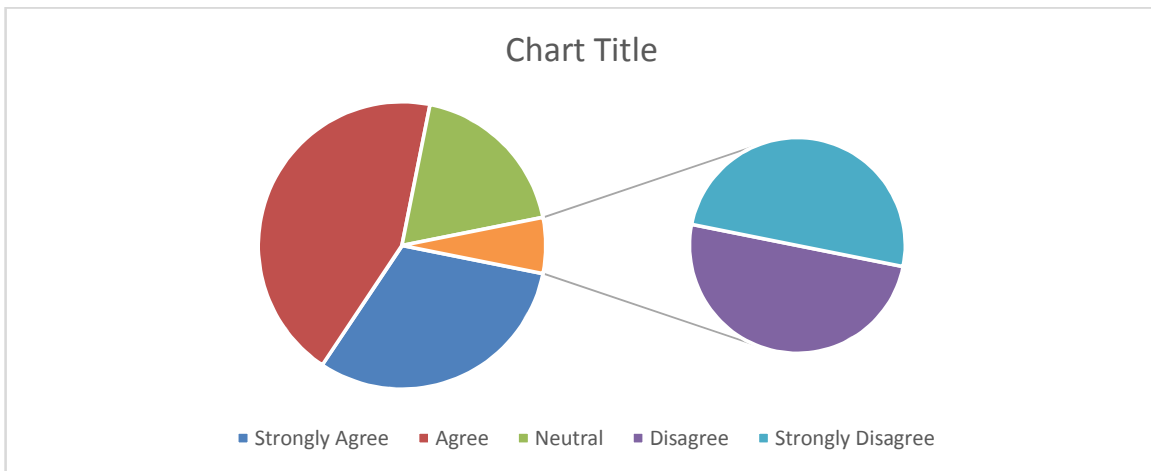
Sr No.	On basis of	No. of Respondent	Percentage
1	Daily	18	36%
2	Weekly	9	18%
3	Occasionally	5	10%
4	Never	18	36%
	Total	50	100%



From the above Table 7 and pie chart this can be observed that 36% of respondents listen to music daily, and 36% never listen to music while studying.

Table 7: Feel that music helps you concentrate better while studying?

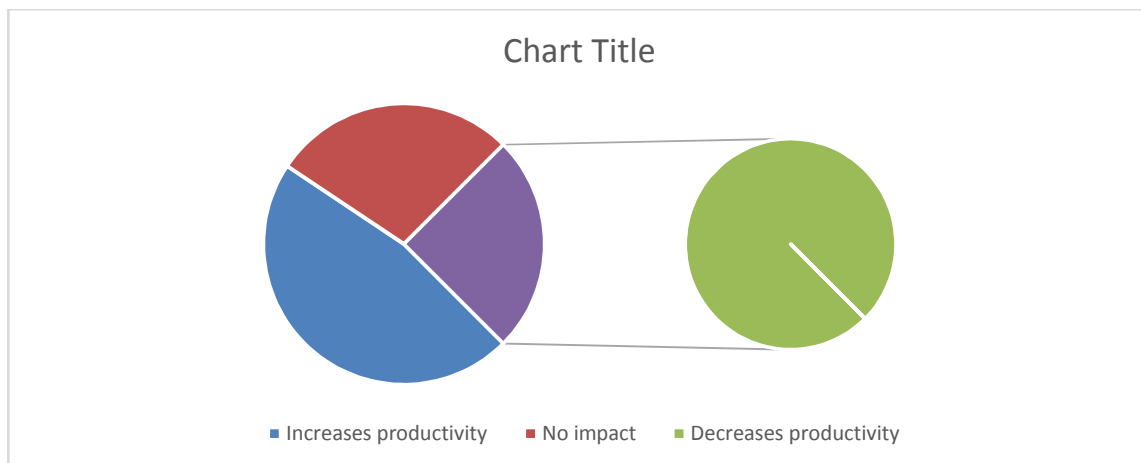
Sr No.	Agree/ Disagree	No. of Respondent	Percentage
1	Strongly Agree	10	20%
2	Agree	14	28%
3	Neutral	6	12%
4	Disagree	1	2%
5	Strongly Disagree	1	2%
	Total	50	100%



From the above Table 7 and pie chart this can be observed that 48% of respondents feel that music helps them concentrate better, while 14% disagree or strongly disagree.

Table 8: Music affect overall productivity during study sessions?

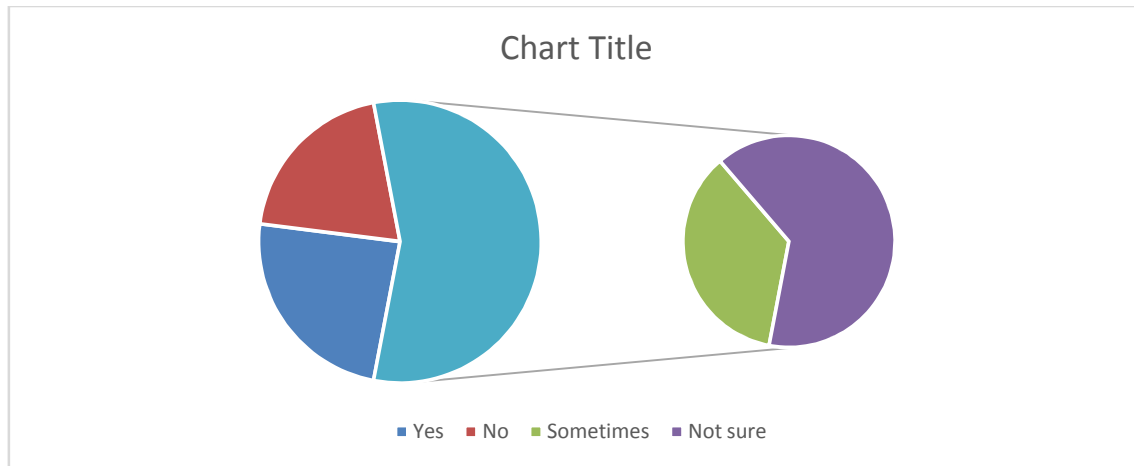
Sr No.	Affect	No. of Respondent	Percentage
1	Increases productivity	15	30%
2	No impact	9	18%
3	Decreases productivity	8	16%
	Total	50	100%



From the above Table 8 and pie chart this can be observed that the 30% feel that music increases productivity, 18% report no effect, and 16% say it decreases their productivity.

Table 9: Listening to music help retain information better or remember key points

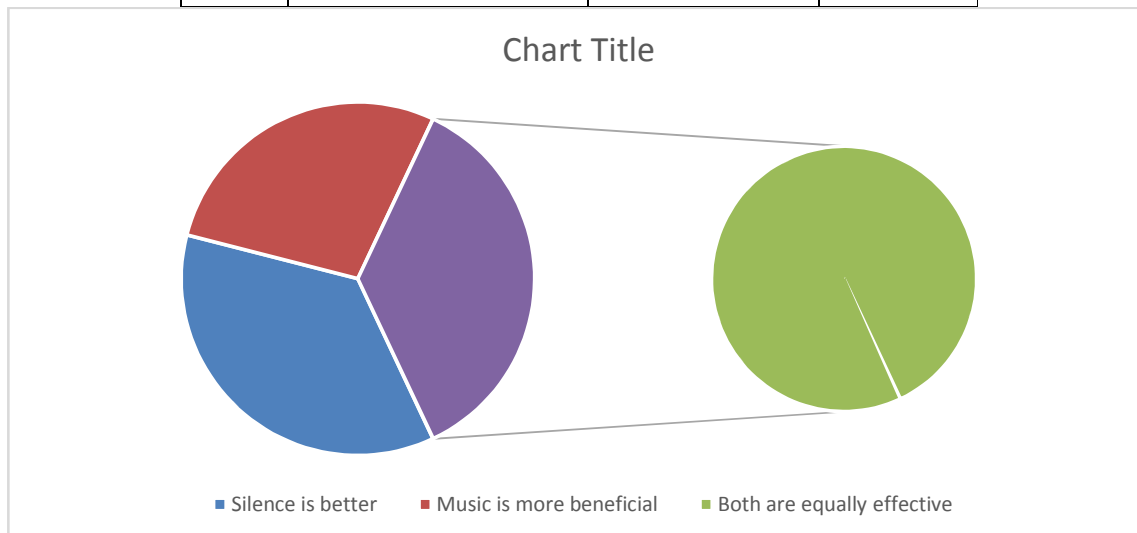
Sr No.	Yes/No	No.of Respondent	Percentage
1	Yes	12	24%
2	No	10	20%
3	Sometimes	10	20%
4	Not sure	18	36%
	Total	50	100%



From the above Table 9 and pie chart this can be observed that the 24% of respondents believe that music helps them retain information, but 36% are unsure about its effect.

Table 10: Do you prefer studying in silence, or do you find music more beneficial for focus?

Sr No.	Preferences	No.of Respondent	Percentage
1	Silence is better	18	36%
2	Music is more beneficial	14	28%
3	Both are equally effective	18	36%
	Total	50	100%



From the above Table 9 and pie chart this can be observed that 36% find music reduces stress, and 44% notice no change in stress levels during study sessions.

VI. FINDINGS

1. Majority of Respondents Listen to Music While Studying

64% (32 respondents) of participants reported that they listen to music while studying, indicating that music is a common practice among students during study sessions.

2. Instrumental and Classical Music Are Most Preferred

Among those who listen to music while studying, 24% prefer instrumental music, and 20% prefer classical music. This suggests that music without lyrics is more popular, as it likely reduces distractions and helps maintain focus.

3. Music Has a Positive Impact on Concentration and Productivity

48% of respondents feel that music helps them concentrate better, with 30% reporting increased productivity when listening to music. This demonstrates that a significant portion of participants finds music beneficial for focus and efficiency during study sessions.

4. No Clear Consensus on the Impact of Music on Academic Performance

40% of respondents believe that music has **no impact** on their academic performance, while 16% think it has a positive effect. This suggests mixed views on whether music translates into better grades or exam results, indicating that individual experiences may vary.

5. Stress Reduction

36% of respondents reported that music helps reduce stress while studying. However, 44% did not notice any changes in their stress levels, showing that while some find music helpful for relaxation, others may not experience a significant difference in their emotional state while studying.

VII. CONCLUSION

The research on the *Influence of Music on Study Habits* revealed that music is commonly used by students during study sessions, with 64% of respondents listening to music while studying, particularly instrumental and classical genres. For many, music positively impacts concentration and productivity, with 48% of participants reporting improved focus and 30% noting increased productivity. However, the effect of music on academic performance was mixed, with 40% of respondents seeing no impact. Additionally, while 36% found music helpful for reducing stress, 44% experienced no change. Overall, the study suggests that while music can enhance study habits for some, its effects vary based on individual preferences, and its influence on academic outcomes remains inconclusive.

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