International Journal of
INTELLIGENT SYSTEMS AND APPLICATIONS IN ENGINEERING
ISSN:2147-6799 www.ijisae.org Original Research Paper

Internet and Mobile Usage Patterns Among Students of The Nilgiri Kendriya Vidyalaya: A Survey-Based Study

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Submitted: 17/10/2024 **Revised**: 20/11/2024 **Accepted**: 16/12/2024

Abstract: The rapid expansion of digital technologies has significantly influenced the learning patterns of school students across India. This study investigates internet and mobile usage among students of Kendriya Vidyalaya (KV), focusing on Classes 7 to 9. Data were collected through a structured online survey comprising questions on device usage, time spent online, purpose of internet use, challenges faced, and students' preferences regarding digital learning. A total of *N = 195* responses were recorded from KV Aruvankadu , KV Willington and KV Ooty. Findings indicate high levels of digital adoption, with the majority of students using smartphones primarily for educational purposes as well as entertainment. While digital tools support learning, issues such as distractions, excessive screen time, and information overload are notable concerns. The study highlights the need for guided use of technology, digital literacy training, and structured online learning environments to support academic development.

Keywords: *Digital learning, mobile phone usage, Kendriya Vidyalaya, internet usage, school students, ICT in education, digital habits.*

1. Introduction

Digital technology has become an integral part of the learning ecosystem for school students in India. Computers, mobile phones, and internet-enabled devices have reshaped academic engagement, information access, and communication (Kumar & Mohanty, 2021). With the proliferation of online educational platforms—especially after the COVID-19 pandemic—students increasingly depend on digital tools for assignments, projects, and test preparation.

Kendriya Vidyalayas (KVs), known for their uniform curriculum and diverse student population, provide an ideal context to study technology adoption among young learners. Understanding how students use mobile devices and the internet can help educators develop targeted digital literacy programs and improve students' academic outcomes.

This study examines digital usage patterns among The Nilgiri KV students from Classes 7–9, focusing on access to digital devices, purpose and frequency of usage, perceived benefits, and challenges.

2. Objectives of the Study

2.1. To examine the extent of access to digital devices among KV students (Classes 7–9).

This objective focuses on identifying the types of devices students commonly use—such as mobile phones, tablets, laptops, or desktops—and determining the proportion of students who have personal or shared access to these devices. The aim is to understand the digital readiness of students and their ability to engage in technology-enabled education.

2.2. To analyse patterns of internet and mobile usage for academic purposes.

This includes measuring:

- Frequency of internet use for assignments or school projects
- Time spent per day on educational activities online
- Preference for online study tools, educational websites, apps, and video platforms
- Awareness and use of AI-based educational tools

By analysing these patterns, the study aims to understand how deeply students rely on digital technologies for learning.

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2.3. To investigate students' use of mobile phones and the internet for non-academic (entertainment) purposes.

This objective examines:

- Time spent on entertainment (gaming, videos, chatting)
- Most preferred entertainment platforms
- Awareness of social media platforms
- Daily time spent on social media

This helps compare academic usage vs. entertainment usage, highlighting the balance—or imbalance—in digital consumption.

2.4. To explore students' perceptions regarding the impact of digital technology on their academic performance.

This includes collecting student opinions on:

- Whether digital tools help improve their marks
- Whether internet use enhances understanding of concepts
- Whether digital resources make learning easier or more engaging

This objective addresses whether students feel that technology aids or distracts from learning.

2.5. To identify the challenges and problems students face while using the internet or mobile devices for studying.

The study investigates issues such as:

- Distractions from gaming or social media
- Excessive or confusing information
- Poor network connectivity
- Lack of structured online guidance
- Technical difficulties or device limitations

These insights help identify areas where interventions are needed.

2.6. To understand students' preferred mode of learning—online, offline, or blended.

This includes exploring:

- Which learning mode students find most comfortable
- Whether students prefer videos, live classes, textbooks, or physical classroom teaching
- Reasons behind their learning preferences

Understanding preferences helps educators design better instructional strategies.

2.7. To recommend measures for improving effective use of internet and mobile devices in education.

Based on student feedback and data analysis, this objective aims to propose actionable suggestions for:

- Schools
- Teachers
- Parents
- Educational policymakers

Possible areas include digital literacy training, structured online content, improved monitoring, and healthy screen-time habits.

3. Methodology

3.1 Research Design

A quantitative, descriptive survey design was employed.

3.2 Sample

Students from Classes 7–9 of Kendriya Vidyalaya Aruvankadu , Kendriya Vidyalaya Willington and Kendriya Vidyalaya Ooty participated in the study.

- **Total respondents:** $N = 195$
- Students voluntarily participated through a Google Forms questionnaire.

3.3 Instrument

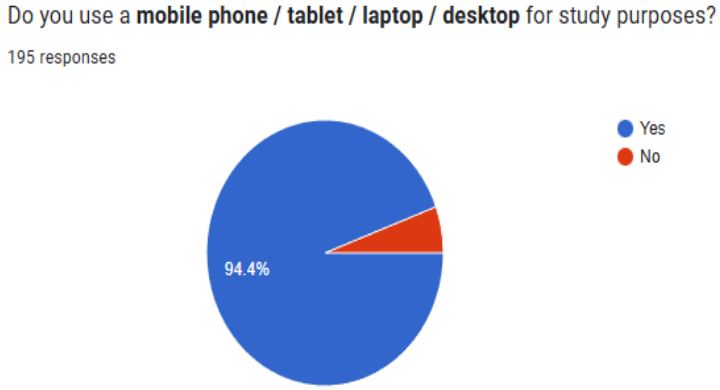
A structured questionnaire collected data on:

- Basic demographics
- Device ownership
- Frequency and purpose of internet/mobile use
- Preferred study modes (online, offline, hybrid)
- Challenges faced with digital learning

4. Results and Findings

4.1 Device Usage

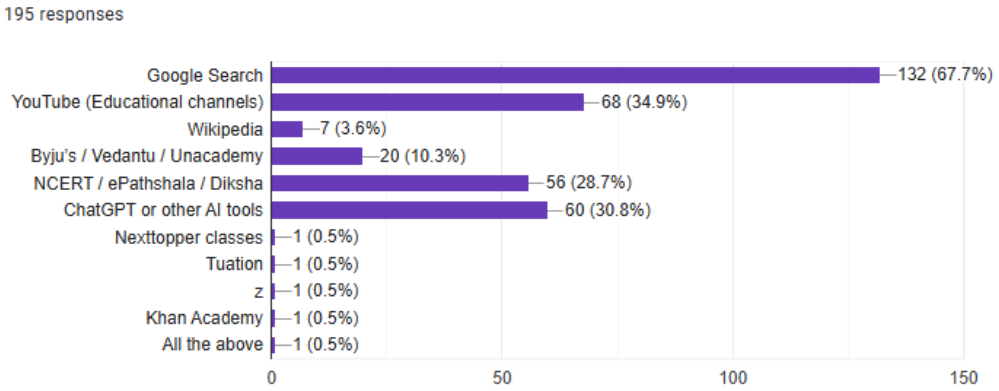
A vast majority of students reported using **mobile phones/tablet/laptop/desktop** for study-related activities. Less than 3% of students are not using any of such devices.



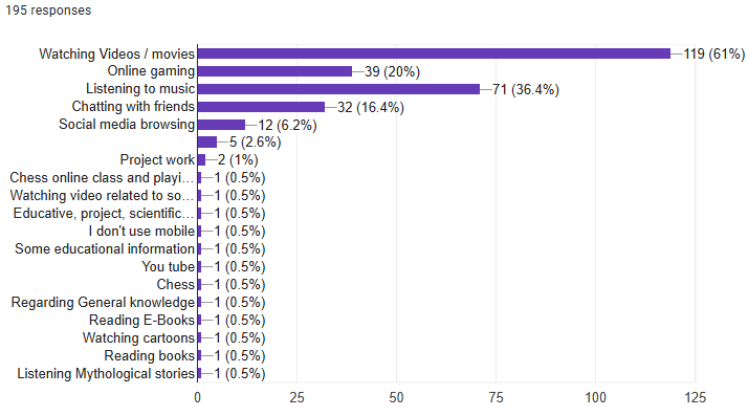
4.2 Purpose of Digital Use

Students primarily used the internet/mobile for:

- Online classes (10.3%)
- Watching explanatory videos (34.9%)
- Searching information for assignments (67.7%)

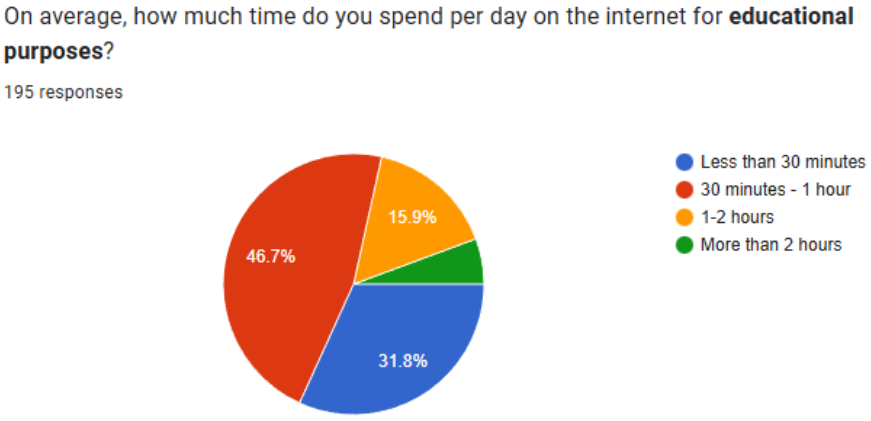


A significant number also reported using devices for entertainment such as games or social media. In which an alarming percentage of 61% of users are watching videos and movies. 20% of the students understudy are claiming that they are playing online games. 36.4% of students are considering chatting with their friends as entertainment.

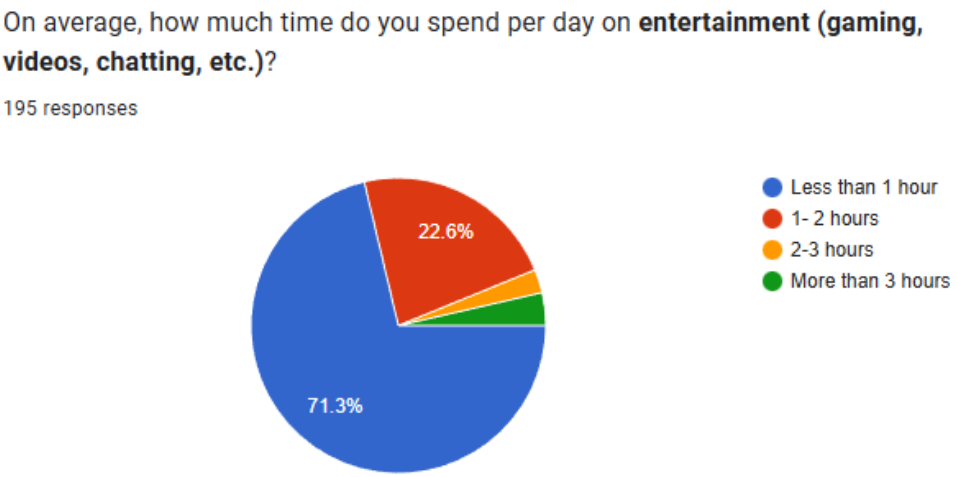


4.3 Time Spent Online

Most students reported **moderate usage**, typically between 30 minutes–1 hour per day. A small subset spent more than 2 hours, indicating high engagement with digital platforms for the purpose of education. Which is still indicating that average screen time of the child is still move than the permitted time limit.

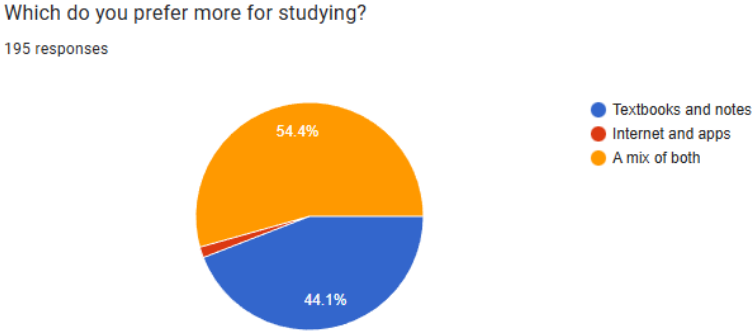


Majority of the students around 71.3% are claiming that they are using internet for less than one hour. It may seem reasonable but when we club the activity of education and entertainment the screen time is still alarming. Even in this a subset of students are using internet for more than three hours.



4.4 Preferred Mode of Learning

Many students chose a **blend of online and offline methods**, suggesting that hybrid learning remains appealing even after the reopening of schools. A notable group of students do not prefer coming to the regular classes they want to have only online classes.

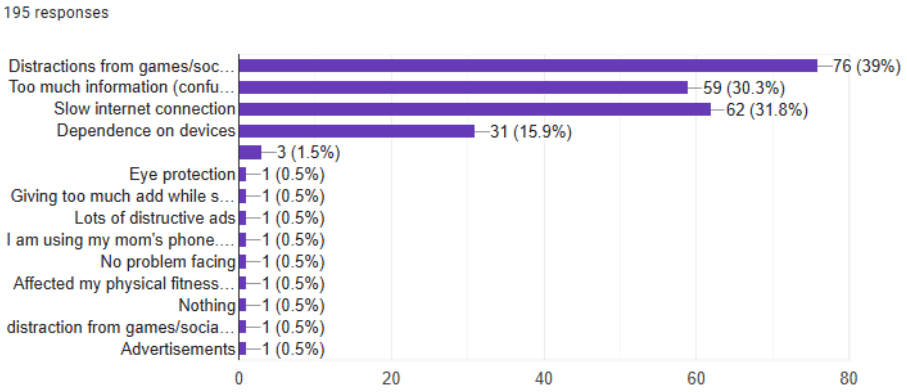


4.5 Challenges Faced

Common issues included:

- **Distractions** from games or social media
- **Information overload**, causing confusion
- **Slow or unstable internet connection**

- Lack of creativity and dependency on the device.



This shows that to an extent students are aware about the challenges they are facing on account of internet. They are admitting the fact that they are getting distracted and getting confused. In this light administration should take efficient steps to guide the students.

5. Discussion

The results confirm that digital devices are deeply embedded in the everyday learning practices of KV students. Mobile phones dominate as the primary learning tool, likely due to affordability and accessibility (Srinivasan, 2020). While digital access has greatly expanded learning opportunities, it also brings risks—overuse, reduced concentration, and exposure to distracting content.

The preference for a mixed-mode learning environment suggests students benefit from the flexibility of online resources combined with the clarity and discipline of classroom teaching. Schools must therefore promote guided digital literacy and responsible internet habits.

6. Conclusion

The study highlights a high level of digital engagement among KV students in Classes 7–9. While students use mobile and internet resources for educational purposes, distractions and information overload remain pressing issues. Schools should incorporate digital literacy training, enforce healthy screen-time habits, and develop structured digital content to improve learning outcomes.

This study contributes valuable insights into the contemporary technology habits of middle school students and emphasizes the need for balanced and responsible digital learning strategies.

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