

# Social Media usage and its Correlation with Adolescent mental health.

Submitted by  
**G. Gnana Pavithra**  
Under the guidelines of  
**Dr. Saptarshi Senugupta,**  
Assistant Professor

## Abstract

The impact of social media on adolescent mental health has garnered significant attention in recent years. This study explores the correlation between social media usage patterns and mental health outcomes among adolescents, focusing on variables such as screen time, content engagement, and platform preferences.

Key findings indicate that excessive usage correlates with increased risks of anxiety, depression, and low self-esteem, particularly when driven by negative social comparisons or exposure to harmful content.

Conversely, positive interactions and support networks on social media may enhance well-being. This research highlights the need for balanced usage, digital literacy education, and targeted interventions to mitigate adverse effects while promoting healthy online behaviors among adolescents.

Adolescents increasingly find it difficult to picture their lives without social media. Practitioners need to be able to assess risk, and social media may be a new component to consider.

Although there is limited empirical evidence to support the claim, the perception of the link between social media and mental health is heavily influenced by teenage and professional perspectives.

Privacy concerns, cyberbullying, and bad effects on schooling and mental health are all risks associated with this population's usage of social media. However, ethical social media use can expand opportunities for connection and conversation, as well as boost self-esteem, promote health, and gain access to critical medical information.

Despite mounting evidence of social media's negative effects on adolescent mental health, there is still a scarcity of empirical research on how teens comprehend social media, particularly as a body of wisdom, or how they might employ wider modern media discourses to express themselves.

Youth use cell phones and other forms of media in large numbers, resulting in chronic sleep loss, which has a negative influence on cognitive ability, school performance, and socio-emotional functioning.

# CHAPTER 1

## INTRODUCTION

### INTRODUCTION

"The more time adolescents spend on social media, the more likely they are to report symptoms of anxiety, depression, and loneliness."

— **Jean M. Twenge**, *iGen: Why Today's Super-Connected Kids Are Growing Up Less Rebellious, More Tolerant, Less Happy—and Completely Unprepared for Adulthood* (2017)

Humans are naturally social species that depend on the companionship of others to thrive in life. Thus, while being socially linked with others helps alleviate stress, worry, and melancholy, a lack of social connection can pose major threats to one's mental health.

Over the past 10 years, the rapid emergence of social networking sites like Facebook, Twitter, Instagram, and others has led to some significant changes in how people connect and communicate (Table 1).

Over one billion people are currently active users of Facebook, the largest social networking website, and it is anticipated that this number will grow significantly over time, especially in developing countries.

Facebook is used for both personal and professional interaction, and its deployment has had a number of positive effects on connectivity, idea sharing, and online learning. Furthermore, the number of social media users globally in 2019 was 3.484 billion, a 9% increase year on year.

**Table 1. List of social media applications available on the internet.**

#### **Social media applications Examples**

**Social networks** Facebook, Twitter, Instagram, Snapchat **Media sharing** WhatsApp, Instagram,

**YouTube, Snapchat, TikTok** **Messengers** Facebook Messenger, WhatsApp, Telegram, Viber, iMessage

**Blogging platforms** WordPress, Wikipedia

**Discussion forums** Reddit, Twitter

#### **Fitness & lifestyle** Fitbit

Mental health is represented as a state of well-being in which individuals recognize their potential, successfully navigate daily challenges, perform effectively at work, and make a substantial difference in the lives of others.

There is currently debate over the benefits and drawbacks of social media on mental health. Social networking is an important part of safeguarding our mental health. Mental health, health behavior, physical health, and mortality risk are all affected by the quantity and quality of social contacts.

Social media use and mental health may be related, and the displaced behavior theory could assist in clarifying why. The displaced behavior hypothesis is a psychology theory that suggests people have limited self-control

and, when confronted with a challenging or stressful situation, may engage in behaviors that bring instant gratification but are not in accordance with their long-term objectives.

In addition, when people are unable to deal with stress in a healthy way, they may act out in ways that temporarily make them feel better but ultimately harm their long-term goals and wellness. In the 1990s, social psychologist Roy Baumeister initially suggested the displaced behavior theory.

Baumeister suggested that self-control is a limited resource that can be drained over time and that when self-control resources are low, people are more likely to engage in impulsive or self-destructive conduct.

This can lead to a cycle of bad behaviors and outcomes, as individuals may engage in behaviors that bring short respite but eventually add to their stress and difficulties. According to the hypothetical terms, those who participate in sedentary behaviors, including social media, engage in fewer opportunities for in-person social interaction, both of which have been demonstrated to be protective against mental illnesses.

Social theories, on the other hand, discovered that social media use influences mental health by affecting how people interpret, maintain, and interact with their social network.

Numerous studies on social media's effects have been conducted, and it has been proposed that prolonged use of social media sites like Facebook may be linked to negative manifestations and symptoms of depression, anxiety, and stress.

A distinct and important time in a person's life is adolescence. Additionally, risk factors such as family issues, bullying, and social isolation are readily available at this period, and it is crucial to preserve social and emotional growth. The growth of digital technology has affected numerous areas of adolescent lives.

Nowadays, teenagers' use of social media is one of their most apparent characteristics. Being socially connected with other people is a typical phenomenon, whether at home, school, or a social gathering, and adolescents are constantly in touch with their classmates via social media accounts.

Adolescents are drawn to social networking sites because they allow them to publish pictures, images, and videos on their platforms.

It also allows teens to establish friends, discuss ideas, discover new interests, and try out new kinds of self-expression. Users of these platforms can freely like and comment on posts as well as share them without any restrictions.

Teenagers now frequently post insulting remarks on social media platforms. Adolescents frequently engage in trolling for amusement without recognizing the potentially harmful consequences.

Trolling on these platforms focuses on body shaming, individual abilities, language, and lifestyle, among other things. The effects that result from trolling might cause anxiety, depressive symptoms, stress, feelings of isolation, and suicidal thoughts.

The authors explain the influence of social media on teenage well-being through a review of existing literature and provide intervention and preventative measures at the individual, family, and community levels.

In recent years, the proliferation of social media has dramatically reshaped the social landscape, especially for adolescents. With the advent of smartphones and widespread internet access, platforms such as Instagram, WhatsApp, Snapchat, Facebook, and TikTok have become deeply embedded in the daily lives of young individuals.

While social media facilitates communication, social networking, identity exploration, and access to

information, it has also raised significant concerns regarding its impact on adolescent mental health.

Adolescence is a crucial period of psychological and emotional development, marked by identity formation, heightened sensitivity to peer feedback, and an increased need for social belonging. During this transitional stage, individuals are particularly susceptible to external influences, including those derived from digital interactions.

The ubiquity and immersive nature of social media have introduced new challenges, such as cyberbullying, social comparison, body image dissatisfaction, and sleep disruption—factors that can significantly affect mental health outcomes.

Adolescence is a sensitive developmental period marked by physical, emotional, cognitive, and social changes. It is a time of identity exploration, emotional vulnerability, and increased peer influence. The adolescent brain is still developing, particularly the prefrontal cortex, which is responsible for decision-making and emotional regulation.

These neurobiological factors make adolescents more susceptible to the influences of social environments, including virtual ones. Consequently, social media—while offering platforms for self-expression and connection—can also expose adolescents to harmful content, peer judgment, and psychological stressors that impact their mental health.

## **Importance of the Topic**

In recent years, researchers and mental health professionals have expressed concern over the growing correlation between excessive social media usage and adverse psychological outcomes in adolescents. Mental health problems such as depression, anxiety, low self-esteem, social withdrawal, emotional dysregulation, and internet addiction are increasingly being reported among this age group.

While social media may not be the sole cause of these disorders, it is believed to act as a significant contributing or exacerbating factor.

Understanding this complex relationship is crucial, as adolescence is also the period where most lifetime mental disorders begin. Early identification of risk factors and implementation of preventive strategies can mitigate long-term psychological consequences.

This project aims to examine the patterns of social media usage among adolescents and evaluate how these patterns are associated with various indicators of mental health.

## **Factors Influencing the Relationship Between Social Media and Mental Health**

A number of mechanisms have been proposed to explain the link between social media usage and mental health challenges in adolescents:

### **1. Time Spent on Social Media**

Spending prolonged periods on social media has been associated with poor academic performance, disrupted sleep cycles, reduced physical activity, and lower levels of face-to-face social interaction. These factors are known to negatively affect mood and emotional stability.

### **2. Cyberbullying**

One of the most damaging aspects of online interaction is cyberbullying. Unlike traditional bullying, it can occur anonymously and 24/7, leaving victims feeling helpless and constantly targeted. Victims of

cyberbullying often report higher levels of anxiety, depression, and suicidal ideation.

### 3. Social Comparison

Adolescents are particularly prone to comparing themselves to peers and celebrities online. Idealized images of others' lives may create feelings of inferiority, inadequacy, and dissatisfaction with one's own body, lifestyle, or achievements, which are all precursors to low self-esteem and depressive symptoms.

### 4. Fear of Missing Out (FOMO)

FOMO refers to the anxiety that others are having more rewarding experiences. Adolescents who constantly check their social media to stay "in the loop" may suffer from restlessness, anxiety, and attention difficulties.

### 5. Need for External Validation

Many adolescents rely on social media likes, comments, and shares for self-worth. This can develop into a dependency on external approval, which undermines intrinsic self-esteem and emotional resilience.

### 6. Sleep Disruption

Using electronic devices late at night can lead to delayed sleep onset, poor sleep quality, and sleep deprivation. Lack of proper rest has well-documented links with irritability, mood swings, concentration issues, and depressive symptoms.

## Common Mental Health Conditions Associated with Social Media Usage

Based on empirical findings, the following disorders and psychological difficulties have shown a significant correlation with problematic social media use:

- **Depression:** Often linked with passive consumption of content, social comparison, and feelings of loneliness or exclusion.
- **Anxiety Disorders:** Particularly social anxiety, due to constant online self-presentation and fear of negative evaluation.
- **Low Self-Esteem:** Reinforced by cyberbullying and body image concerns.
- **Eating Disorders:** Exposure to idealized body images and "fitspiration" content can trigger disordered eating behaviors.
- **Internet and Social Media Addiction:** Characterized by compulsive use, withdrawal symptoms, and loss of control over usage.
- **Suicidal Ideation and Self-Harm:** Increased risk is observed especially in adolescents who are cyberbullied or socially isolated online.
- **Sleep Disorders:** Due to late-night usage and screen-induced melatonin suppression.

## Problem Statement

In the modern digital age, social media has emerged as a dominant force in shaping the behaviors, attitudes, and mental well-being of adolescents. While it provides platforms for connection, creativity, and identity exploration, increasing evidence suggests that excessive and unregulated use of social media can have detrimental effects on adolescent mental health.

Mental health disorders such as depression, anxiety, low self-esteem, body image issues, and sleep disturbances are becoming increasingly prevalent among adolescents who are highly engaged with social networking platforms.

Despite growing awareness, there remains a gap in understanding the specific patterns and mechanisms through which social media usage influences psychological well-being during adolescence.

Furthermore, the impact of variables such as duration of use, type of content consumed, online peer interactions, and susceptibility to cyberbullying has not been fully explored in diverse sociocultural contexts.

This project seeks to address the critical need to explore the correlation between social media usage and adolescent mental health, to identify risk factors, and to contribute to the development of informed interventions that can promote healthier digital habits and psychological resilience among adolescents.

## Need for the Study

The adolescent period is a window of vulnerability as well as opportunity. As mental health challenges become increasingly prevalent among the youth, understanding modifiable risk factors—such as social media habits—can serve as a gateway for timely intervention. Despite the existing body of research, the context-specific dynamics of social media use, such as cultural background, gender, personality traits, and types of platform engagement, require deeper exploration.

This study seeks to:

- Assess patterns and frequency of social media usage among adolescents.
- Evaluate the emotional and psychological outcomes associated with such usage.
- Investigate gender or demographic differences in psychological vulnerability.
- Offer evidence-based recommendations for responsible digital behavior.

By systematically studying the correlation between social media engagement and mental health indicators, this project aims to contribute to academic literature, clinical awareness, and preventive strategies that promote adolescent well-being in a digital age.

## Research Questions

1. What are the patterns of social media usage among adolescents?
  - (e.g., frequency, duration, platforms used, types of content engaged with)
2. Is there a significant correlation between the duration of social media use and symptoms of depression, anxiety, or low self-esteem among adolescents?
3. How does social media use affect adolescents' sleep patterns and overall emotional regulation?
4. What role does social comparison on social media play in shaping adolescents' body image and self-esteem?
5. To what extent does exposure to cyberbullying or negative online interactions impact the mental health of adolescents?
6. Are there gender differences in the psychological effects of social media usage among adolescents?
7. Does the purpose of social media use (e.g., socializing, entertainment, validation-seeking, information gathering) influence its psychological impact?

## Objectives of the Study

### General Objective:

To examine the correlation between social media usage and adolescent mental health, focusing on its positive and negative impacts.

### Specific Objectives:

1. To analyze usage patterns of social media among adolescents, including screen time and platform preferences.
2. To identify the mental health outcomes associated with excessive or harmful social media engagement, such as anxiety, depression, and low self-esteem.
3. To explore the potential benefits of social media, such as fostering social connections and support networks.
4. To evaluate moderating factors, such as content type, personality traits, and parental guidance, in the relationship between social media usage and mental health.
5. To propose intervention strategies and recommendations for promoting healthy and balanced social media use among adolescents.

## Statement of Hypothesis

Based on the research problem and questions, the following hypotheses are proposed: **1. Hypothesis on Overall**

### Correlation

#### · $H_0$ (Null Hypothesis)

There is no significant correlation between social media usage and adolescent mental health outcomes.

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#### · $H_1$ (Alternative Hypothesis):

There is a significant correlation between social media usage and adolescent mental health outcomes.

### 2. Hypothesis on Depression

#### · $H_0$ :

Social media usage is not significantly associated with levels of depression among adolescents.

#### · $H_1$ :

Increased social media usage is significantly associated with higher levels of depression among adolescents.

### 3. Hypothesis on Anxiety

#### · $H_0$ :

Social media usage has no significant relationship with anxiety symptoms in adolescents.

#### · $H_1$ :

Adolescents who spend more time on social media experience significantly higher levels of anxiety.

### 4. Hypothesis on Self-Esteem

· **H<sub>0</sub>:**

There is no significant relationship between social media usage and self-esteem among adolescents.

· **H<sub>1</sub>:**

Increased social media usage is significantly associated with lower self-esteem among adolescents.

## 5. Hypothesis on Gender Differences

· **H<sub>0</sub>:**

There is no significant difference between male and female adolescents in the psychological impact of social media use.

· **H<sub>1</sub>:**

There is a significant difference between male and female adolescents in the psychological impact of social media use.

## Significance of the Research Problem and Justification for Investigating It

The emergence of social media as a central part of daily life has drastically transformed the way adolescents interact, communicate, and perceive themselves. As digital natives, adolescents today are growing up in a hyper-connected environment where social media usage is not merely an activity but a lifestyle.

While these platforms offer numerous benefits such as global connectivity, peer support, and access to information, increasing empirical evidence highlights the detrimental psychological effects associated with excessive and unregulated use, especially during the vulnerable period of adolescence.

Adolescence is a critical developmental stage characterized by heightened emotional sensitivity, identity formation, and increased social awareness. During this phase, individuals are more susceptible to peer influence, social comparison, and external validation—factors that are amplified in the digital space.

Exposure to idealized images, cyberbullying, online harassment, and pressure to maintain an appealing online presence can have severe implications for mental health, including depression, anxiety, low self-esteem, sleep disturbances, body dissatisfaction, and even suicidal ideation.

Despite widespread concern among parents, educators, and mental health professionals, there remains a gap in context-specific research, especially within developing countries like India, where digital access has expanded rapidly but psychological support systems have not kept pace.

Most existing studies are Western-centric, leaving a need to examine cultural, social, and behavioral differences that may influence how adolescents in different contexts experience and are affected by social media.

This research is significant for the following reasons:

1. **Public Health Relevance:** With rising rates of adolescent mental health disorders globally, identifying modifiable risk factors such as social media use is crucial for early intervention and prevention.
2. **Educational and Parental Guidance:** The findings can inform parents, teachers, and school counselors about healthy digital practices and guide them in monitoring adolescents' online behavior constructively.
3. **Policy and Program Development:** This study can provide data to support the formulation of age-appropriate digital literacy programs, mental health awareness campaigns, and school-based interventions.

4. Psychological Theory and Practice: Understanding the psychosocial mechanisms linking social media and mental health can contribute to theoretical models of adolescent development and help clinicians develop more effective therapeutic strategies.

5. Academic Contribution: The study adds to the growing body of literature on cyberpsychology and adolescent well-being, especially in under-researched populations and contexts.

In conclusion, the rising mental health concerns among adolescents necessitate a deeper understanding of how modern digital environments contribute to emotional and psychological distress. Investigating the correlation between social media usage and adolescent mental health is both timely and essential for developing effective preventive and interventional strategies that support positive youth development in a digitally driven world.

# CHAPTER 2

## REVIEW OF LITERATURE

### REVIEW OF LITERATURE

Social media usage among adolescents has been extensively studied, given its profound implications for mental health. This section reviews key literature on the topic, examining both positive and negative correlations.

#### 1. Prevalence and Patterns of Social Media Use

Adolescents are among the heaviest users of social media platforms, with studies reporting daily usage averaging 2-3 hours (**Twenge et al.**, 2018). Popular platforms like Instagram, TikTok, and Snapchat are often used for social interaction, entertainment, and self-expression. However, excessive screen time has been associated with disturbances in sleep patterns, academic performance, and physical health (**Rideout et al.**, 2018).

#### 2. Negative Impacts on Mental Health

Numerous studies highlight the detrimental effects of social media on adolescent mental health. Research by **Keles et al.** (2020) identifies increased risks of depression, anxiety, and loneliness, often exacerbated by cyberbullying, social comparisons, and unrealistic portrayals of life. High social media engagement, particularly passive browsing, has been linked to feelings of inadequacy and reduced self-esteem (**Verduyn et al.**, 2017).

#### 3. Positive Effects of Social Media

Conversely, some studies underscore the benefits of social media when used constructively. Adolescents can build support networks, find communities that align with their interests, and seek information on mental health resources (**Naslund et al.**, 2020). Positive reinforcement and social connectedness on these platforms have been shown to improve self-esteem and reduce isolation.

#### 4. Moderating Factors

The relationship between social media use and mental health is influenced by moderating factors, such as the type of content consumed, individual personality traits, and the presence of parental guidance. **Valkenburg et al.** (2022) emphasize that active, purposeful engagement is less harmful than passive consumption.

#### 5. Policy and Intervention Strategies

Evidence suggests that digital literacy programs, time management tools, and parental monitoring can mitigate adverse effects. Encouraging balanced usage and promoting mental health awareness are crucial in fostering a healthier online environment for adolescents.

## Models or theories relevant to research questions

### 1. Uses and Gratifications Theory (UGT)

Originators: Katz, Blumler & Gurevitch (1973)

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Relevance:

This theory explains why individuals use media and what they gain from it. Adolescents may use social media for various psychological needs such as social interaction, identity expression, validation, entertainment, or information-seeking.

· Implication for Research: The type and purpose of social media usage (e.g., passive scrolling vs. active posting) can influence its psychological effects—like loneliness, anxiety, or self-esteem.

### 2. Social Comparison Theory

Originator: Leon Festinger (1954)

Relevance:

This theory states that people evaluate themselves by comparing to others, especially in the absence of objective standards.

· Implication for Research: Adolescents exposed to idealized images and lifestyles on social media may experience negative self-perception, body dissatisfaction, and low self-esteem due to upward social comparisons.

### 3. Self-Determination Theory (SDT)

Originators: Deci & Ryan (1985)

Relevance:

SDT emphasizes the importance of satisfying three basic psychological needs: autonomy, competence, and relatedness. Social media can either support or frustrate these needs.

· Implication for Research: When social media use fails to meet these needs (e.g., seeking validation instead of genuine connection), it can lead to mental distress and reduced well being.

### 4. Cognitive-Behavioral Model of Problematic Internet Use

Originators: Davis (2001); expanded by Caplan and others

Relevance:

This model explains that individuals with pre-existing emotional or cognitive vulnerabilities (e.g., social anxiety, low self-esteem) are more likely to engage in problematic internet or social media use, which in turn exacerbates their symptoms.

· Implication for Research: This helps explain how overuse or compulsive use of social media may be both a symptom and cause of mental health issues.

## 5. Ecological Systems Theory

Originator: Urie Bronfenbrenner (1979)

Relevance:

This theory emphasizes that adolescent development is influenced by multiple layers of environment—family, peers, school, media, and cultural systems.

- Implication for Research: Social media functions as part of the exosystem and macrosystem, influencing adolescent development even when not directly interactive (e.g., societal beauty standards, trends).

## 6. Media Dependency Theory

Originators: Ball-Rokeach & DeFleur (1976)

Relevance:

This theory posits that individuals become dependent on media to understand their social world and for personal identity formation.

- Implication for Research: Adolescents' dependency on social media for self-worth or social acceptance may increase vulnerability to emotional disturbances, especially if feedback is negative or absent.

## 7. General Strain Theory (Adapted to Cyberbullying)

Originator: Robert Agnew (1992)

Relevance:

Although originally developed for criminology, the theory applies here as online strain (e.g., bullying, exclusion, comparison) leads to negative emotional responses (like anger, sadness, anxiety) that can manifest in maladaptive coping or mental health issues.

## Summary of the contributions of the authors / experts of the field

**Jean Twenge (2017)**, in her influential book *iGen*, asserts that the dramatic increase in screen time correlates with rising rates of depression, anxiety, and suicidal ideation among adolescents. Her longitudinal studies revealed that adolescents who spend more time on digital devices report significantly lower levels of happiness and mental well-being. She cautions that overexposure to social media may lead to emotional isolation and heightened insecurity.

**Festinger (1954)**, has been adapted to explain how adolescents evaluate themselves based on curated content and idealized images on social media.

**Kaveri Subrahmanyam and Patricia Greenfield (2008)** highlight that while social media allows self-expression and identity exploration, it can also foster **body dissatisfaction and low self esteem**, especially among adolescent girls.

**Elizabeth Englander (2012)** explores the **psychological harm caused by cyberbullying**, noting that online harassment can be more emotionally damaging than traditional bullying due to its **persistent, inescapable, and anonymous nature**. Victims of cyberbullying often exhibit symptoms of depression, anxiety, PTSD, and suicidal ideation. Her work emphasizes the **traumatic effects** of digital aggression and the need for school-based intervention programs.

**Rosen et al. (2013)** developed the concept of "**TechnoStress**", linking the overuse of digital devices to anxiety, cognitive overload, and sleep disorders. They emphasize how persistent notifications and social

validation-seeking behavior create an unhealthy cycle of compulsive usage among adolescents.

Self-Determination Theory (**Deci & Ryan, 1985**) further explains how social media may support or undermine basic psychological needs (autonomy, competence, relatedness). When adolescents use social media for meaningful connections, it may enhance well-being. However, using it for comparison or external validation may lead to emotional exhaustion and disconnection.

**Sonia Livingstone's (2014)** research from the EU Kids Online project provides critical insights into the online risks faced by adolescents, such as exposure to harmful content, privacy breaches, and addiction. Her work emphasizes the importance of digital literacy, parental mediation, and policy-making in creating safer online environments.

Research by **Levenson et al. (2017)** highlights how excessive social media use—especially during nighttime—can lead to sleep disturbances, which in turn are associated with irritability, emotional dysregulation, and depressive symptoms in adolescents. Blue light exposure from screens and fear of missing out (FOMO) contribute to poor sleep hygiene, exacerbating mental health challenges.

**Przybylski et al. (2013)** introduced the concept of **FOMO**, a psychological phenomenon wherein individuals fear being left out of rewarding experiences others might be having. This leads to constant checking behaviors, digital dependence, and ultimately increased anxiety and lower life satisfaction among adolescents.

**Nesi & Prinstein (2015)** emphasize that social media affects adolescents differently based on gender and social contexts. Girls are more likely to internalize emotions and suffer from body image concerns, while boys are often drawn to competitive or aggressive content. Moreover, cultural factors such as societal expectations, beauty standards, and online peer norms can exacerbate the pressure to conform.

**Collin et al. (2016)** explore how digital platforms can also be used to promote mental health literacy, self-help tools, and peer-led support networks. They argue that fostering digital resilience—the ability to manage online risks and recover from setbacks—should be a goal of public health strategies targeting adolescents.

## Research Gap

Despite a growing body of literature exploring the relationship between social media use and adolescent mental health, several significant gaps remain in the current research landscape:

### 1. Lack of Context-Specific Research

Most existing studies have been conducted in Western contexts (e.g., United States, UK, Australia), with limited empirical research focusing on adolescents in South Asian cultures, particularly India. Given the cultural, familial, and educational differences in these regions, it is essential to examine how cultural factors mediate the effects of social media on mental health outcomes.

### 2. Overgeneralization of Effects

While some studies conclude that social media use causes mental health problems, others argue that moderate or positive use may not be harmful. However, few studies differentiate between types of social media usage—such as passive scrolling vs. active engagement, content creation vs. consumption, or social vs. entertainment use—and their differential psychological impacts.

### 3. Inadequate Focus on Individual Differences

There is a lack of in-depth analysis on how individual traits such as personality, resilience, emotional regulation, or pre-existing mental health conditions interact with social media usage. These moderating and

mediating variables are crucial for understanding why some adolescents are more vulnerable to negative outcomes than others.

#### 4. Limited Longitudinal and Experimental Research

Much of the available evidence is cross-sectional, making it difficult to establish causality between social media use and mental health. There is a need for longitudinal and experimental studies to determine the direction and strength of these relationships over time.

#### 5. Neglect of Positive Psychological Outcomes

While many studies emphasize the negative effects (depression, anxiety, cyberbullying), fewer have examined positive psychological outcomes, such as enhanced social support, identity exploration, self-expression, or connectedness. This creates a skewed narrative, potentially overlooking the benefits of moderated and meaningful online engagement.

#### 6. Insufficient Research on Psychological Interventions

Despite the increasing use of digital platforms, very few studies evaluate the effectiveness of mental health interventions delivered through social media or mobile apps targeting adolescents. There is a pressing need for research on digital well-being programs, coping skills, and media literacy education tailored to young people.

## CHAPTER 3

# RESEARCH METHODOLOGY

## RESEARCH METHODOLOGY

Methodology is a framework or the blueprint of the entire study. This includes parts such as the hypothesis, the details about the sample, the sampling methods, the tools used to collect data from the sample, the procedure followed to conduct the study and the statistical tools that will be used to analyse the result obtained from the sample.

Each one mentioned above has rationale why it is been chosen and the explanations are based on the research questions that has been arrived at, and the methods to obtain the answers for those questions, or to test the hypothesis that has been arrived at.

Methodology is in detail, in each step, and act as a guide to the researcher, as to how to go about, in conducting this particular study. Like mentioned above, the various topics provide more information about the details and tools used in the research study.

### Research Design

This study will employ quantitative method to gain a comprehensive understanding of the relationship between social media usage and adolescent mental health.

The present study aims to explore the correlation between **social media usage patterns** and **mental health**

**outcomes** among adolescents. A well-structured research design is crucial to ensure that the objectives of the study are systematically and accurately addressed.

## Research Approach

This study adopts a quantitative correlational research design. The goal is to statistically examine the relationship between the independent variable (social media usage) and dependent variables (mental health indicators such as depression, anxiety, and self-esteem) among adolescents.

## Research Type

- Non-experimental
- Cross-sectional in nature (data collected at a single point in time)
- Descriptive and analytical (describing patterns and analyzing associations) **Variables**
- **Independent Variable:**
  - Frequency and duration of social media use
  - Type of engagement (active vs. passive)
  - Platforms used (Instagram, WhatsApp, Snapchat, etc.)
- **Dependent Variables:**
  - Levels of depression
  - Levels of anxiety
  - Self-esteem scores
  - Sleep quality (optional/additional)

## Sampling Design

The sampling design outlines the process through which participants are selected for the study. A carefully chosen sample ensures that the data collected is representative, relevant, and adequate to address the research objectives.

### 1. Target Population

The target population for this study comprises:

- Adolescents aged between 13 and 18 years
- Who actively use social media platforms such as **Instagram, WhatsApp, YouTube, Snapchat, and Facebook**
- Enrolled in secondary or higher secondary schools or pre-university colleges. **2. Sampling Frame**

- The sampling frame includes adolescents from educational institutions, such as schools or colleges in a city or region.

- Data may be collected from the participants directly.

### 3. Sampling Technique

This study will use a **non-probability sampling method**, specifically **convenience sampling** or **stratified random sampling**, depending on access to participants:

#### a) Convenience Sampling

- Participants will be selected based on **ease of access and availability**. · Suitable for online surveys.

### 4. Sample Size

- An estimated **sample size of 20-30 adolescents** will be targeted.
- The sample size is determined based on:
  - Scope of study
  - Feasibility of data collection
  - Statistical adequacy for correlation analysis
- A larger sample ( $n > 150$ ) is ideal to increase the power and generalizability of the findings.

### 5. Inclusion Criteria

- Adolescents between **13 and 18 years** old
- Regular users of at least one social media platform
- Capable of reading and understanding the questionnaire (English)
- Willing to participate voluntarily.

### 6. Justification for Sampling Technique

- **Convenience sampling** is practical and cost-effective, especially when dealing with school-going adolescents and limited resources.

### Data Collection Methods and their Procedures

#### Quantitative Data:

- Survey/Questionnaire: A structured questionnaire will collect data on social media usage patterns (e.g., screen time, platform preferences), mental health and emotional responses and moderating factors (e.g., parental guidance).

#### Questionnaire (Data Collection Instrument)

To collect relevant and structured data for this study, a **standardized questionnaire** approach was used. The questionnaire consisted of both **self-constructed items** to ensure the measurement of key variables such as **social media usage patterns** and **mental health**.

## Procedure

1. Formal permission will be obtained from educational institutions.

Participants will be briefed about the research **Structure of the Questionnaire** The questionnaire comprised **four sections**:

### Section A: Demographic Information

This section collected basic background details of participants to understand the context of responses.

#### Items included:

- Age
- Gender
- Educational level (Grade/Year)
- Type of institution (public/private)
- Urban/rural residence

### Section B: Social Media Usage Pattern (Self-Constructed Scale)

This section aimed to understand the frequency, nature, and context of social media usage among adolescents. It included questions such as:

- Whether or not the participant uses social media.
- Time spent on social media per day (less than 1 hour to 5+ hours).
- Platforms used most frequently (e.g., Instagram, WhatsApp, YouTube, Facebook).
- Time of day when social media is mostly used (morning, afternoon, evening, night).
- Primary purpose of using social media (e.g., social interaction, entertainment, academic use, sharing content).
- Frequency of comparing oneself to others on social media.

The responses were either multiple-choice or on a 5-point Likert scale ranging from "Never" to "Always." This section was intended to measure the independent variable — the adolescent's social media usage behavior.

### Section C: Mental Health and Emotional Responses

This section examined the psychological and emotional impact of social media on adolescents. It included statements related to their emotional states, sleep habits, feelings of anxiety or loneliness, and general well-being associated with social media usage. Sample items included:

- I feel happy and cheerful most of the time.

- I feel stressed or anxious without my phone or internet.
- I compare myself with others I see online.
- I feel sad or lonely after using social media.
- I sleep less because I stay on my phone at night.
- Social media makes me feel more connected with people.
- I feel better when I take a break from social media.

Most items in this section used a 5-point Likert scale (e.g., Never to Always or Strongly Disagree to Strongly Agree). This section helped assess the dependent variable — the adolescent's emotional and mental health status.

**Section D: General Perceptions, Digital Well-being, and Social Influence** This section differed based on the participant's social media use.

For **non-users**, a different set of questions was presented using branching logic. These included: · Reasons for not using social media (e.g., parental restrictions, lack of interest). · Feelings of exclusion when others talk about social media.

- Exposure to peer pressure to join social media.
- Whether they believe social media impacts mental health.
- Whether parents or teachers talked to them about using social media safely. · An open-ended question to freely express how social media affects them.

This final section provided additional qualitative and perceptual insights into adolescents' digital experiences and self-awareness regarding their social media habits.

Overall, the questionnaire was self-administered, user-friendly, and structured to ensure a smooth flow of relevant questions for both users and non-users of social media. The responses were collected digitally via Google Forms, and anonymity was maintained throughout the process.

## Administration of Data Collection Instrument

### Purpose of Administration:

The primary goal of administering the data collection instrument (questionnaire) is to gather accurate, relevant, and reliable data from adolescent participants regarding their social media usage patterns and associated mental health and emotional responses and collecting data from the non - users of social media.

### Mode of Administration:

The questionnaire was administered through Google Forms, a digital tool that allows participants to respond

easily and securely using mobile phones, tablets, or computers.

### **Procedure:**

#### · Step 1: Participant Recruitment

Adolescents aged 13–18 were selected from schools, colleges, and online platforms using convenience sampling. Permission was obtained from institutions where necessary.

#### · Step 2: **Informed Consent**

Before starting the questionnaire, participants (and guardians where applicable) were informed about the purpose, confidentiality, voluntary nature, and anonymity of the study. A consent statement was included on the first page of the Google Form.

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#### · Step 3: Instructions Provided

Clear instructions were given at the beginning of each section (Demographics, Social Media Use, Mental Health). Participants were encouraged to answer honestly.

#### · Step 4: Response Collection

The form was made live for a specific data collection period (e.g., 2–3 weeks). Participants accessed it via a shared Google Form link on WhatsApp, school networks, email, and social platforms.

### **Ethical Considerations:**

· Participation was voluntary and participants could withdraw at any time without penalty. · No personal identifiers (name, contact details) were collected to maintain anonymity. **Duration:**

On average, the questionnaire took 10–15 minutes to complete.

### **Tools Used:**

· Google Forms for data collection

### **Pilot Study**

Before conducting the full-scale data collection, a pilot study was undertaken to assess the feasibility, clarity, reliability, and effectiveness of the research instruments and procedures. A pilot study also ensures that the questionnaire is understandable to the target age group and helps refine any ambiguities or technical issues in the research design.

### **Objectives of the Pilot Study**

1. To evaluate the clarity and comprehensibility of the questionnaire items for adolescents.
2. To check the time required for completing the questionnaire.
3. To identify any ambiguous or confusing questions.
4. To assess the internal consistency and reliability of the self-constructed and standardized scales.

5. To test the administration process (online or offline) for any logistical issues. **Sample of the Pilot Study**

· A total of 5 adolescents aged 13 to 18 years participated in the pilot study. · The sample was selected using convenience sampling from one local school or institution.

· Participants shared similar characteristics with the target population for the main study (i.e., age, social media use habits, and educational background).

### **Procedure**

1. Participants were briefed about the purpose of the pilot study and informed consent (and parental consent) was obtained.

2. The entire questionnaire was administered either through a Google Form. 3. Participants were asked to provide feedback on:

- Question clarity
- Length of the questionnaire
- Any confusing or repetitive items
- Level of difficulty in responding

4. Based on the feedback, minor modifications were made to:

- Rephrase unclear items
- Ensure logical sequencing of questions
- Optimize the layout for easier navigation

### **Findings and Modifications**

- Most participants understood the questions clearly.
- Some adolescents suggested simplifying certain psychological terms, which were revised accordingly.
- A few items were merged or removed to reduce redundancy and improve flow.
- The average time taken to complete the questionnaire was 10 minutes, which was considered manageable.

### **Conclusion**

The pilot study proved valuable in refining the questionnaire and validating its applicability to the adolescent population. It confirmed that the research tools were both appropriate and reliable for the main study. The feedback and statistical results from the pilot study guided necessary improvements, thereby enhancing the overall quality of the final data collection process.

# CHAPTER 4

## RESULTS AND DISCUSSIONS

### RESULTS AND DISCUSSIONS

The present study examined social media usage and its correlation with adolescent mental health among adolescents aged 13–18 years. The questionnaire consisted of 25 closed-ended questions covering demographic characteristics, patterns of social media usage, emotional responses, social comparison, academic and family-related effects, sleep patterns, and digital well-being.

A total of 25 responses were obtained and included in the present analysis. Frequencies and percentages were calculated for the responses to each question. For questions where one or more responses were missing, percentages were calculated based on the number of valid responses. For multiple-response questions, each selected option was considered separately.

#### SECTION A: Demographic Details

##### 1.AGE

The findings show that the largest proportion of participants were **14 years old (28%)**, followed by 18-year-olds (24%) and 15-year-olds (20%). Participants aged 13 years constituted 16%, while 16- and 17-year-olds constituted 8% and 4%, respectively.

##### Discussion

The age distribution indicates that the study included adolescents from different stages of the 13–18-year age range. The greater representation of 14-year-olds provides useful information about social-media experiences during early adolescence. The inclusion of older adolescents, particularly those aged 17 and 18 years, also allows the findings to represent experiences during later adolescence. However, because the sample was relatively small and unevenly distributed across ages, age-specific comparisons should be interpreted cautiously.

##### 2.GENDER

The sample consisted of 60% female participants and 40% male participants. **Discussion**

The sample had a somewhat greater representation of female adolescents. This distribution should be considered when interpreting findings related to emotional responses, social comparison, and other psychological experiences. Since the study did not include equal numbers of males and females, the findings should not be interpreted as demonstrating gender differences unless a separate statistical comparison is conducted

### 3. EDUCATIONAL LEVEL

The largest group was from Class 9 (28%), followed by Class 10 and Class 12, each representing 24%.

#### Discussion

The participants represented different educational levels from Class 7 to Class 12. This indicates that the study included adolescents across different stages of schooling. The concentration of participants in Classes 9, 10 and 12 is particularly relevant because students at these levels may experience increased academic demands, making the relationship between social-media use, concentration, sleep and emotional well-being important to examine.

### 4. Type of Institution

A large majority of participants (84%) belonged to private institutions, while 16% belonged to public institutions.

#### Discussion

The predominance of students from private institutions indicates that the sample is not equally representative of both types of educational institutions. Therefore, institutional differences in social-media use or mental-health experiences cannot be established from the present data. Nevertheless, the finding provides useful background information regarding the characteristics of the sample.

### 5. Area of Residence

The majority of participants (84%) lived in urban areas, while 8% each lived in semi-urban and rural areas.

#### Discussion

The predominance of urban participants may reflect greater access to smartphones, internet connectivity and digital platforms. However, because only four participants belonged to semi urban or rural areas, comparisons based on residence would not be sufficiently balanced. The finding nevertheless establishes the residential context of the sample and should be considered when interpreting the overall pattern of social-media use.

## SECTION B: Social Media Usage Pattern

### 6. Do you use social media?

Of the 25 participants, 17 (68%) reported using social media, whereas 8 (32%) reported that they did not.

#### Discussion

The findings indicate that social media was used by more than two-thirds of the adolescents in the sample. This establishes that social-media exposure was common among the participants. At the same time, the presence of 32% non-users provides an important contrast for understanding digital well-being and perceptions of social media. The questionnaire specifically instructed non users to proceed to the later section of the survey.

### 7. How many hours do you spend on social media daily?

Two responses were recorded as “Option 6”, which appears to be an unintended/unclear response category in the exported data. Therefore, it should not be interpreted as a meaningful duration category.

## Discussion

Among interpretable responses, 1–2 hours per day was the most frequently reported duration (39.1%), followed by less than one hour (34.8%). Four participants (17.4%) reported 3–4 hours. Thus, most interpretable responses indicated relatively limited to moderate daily social-media exposure, although a smaller group reported longer usage. **Option 6 is nothing but this response is calculated only for the students who don't use social media.**

## 8. Which platforms do you use the most?

**YouTube was the most frequently selected platform (80%),** followed by WhatsApp (56%) and Instagram (28%).

## Discussion

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YouTube emerged as the most commonly used social-media platform among the participants. Its popularity may be related to entertainment as well as educational content, which is consistent with the responses to Question 9. WhatsApp was also widely used, suggesting that communication and peer interaction formed an important part of adolescents' digital experiences. The relatively lower use of Snapchat and Facebook suggests that these platforms were less prominent in this particular sample.

## 9. What do you primarily use social media for? *(Tick all that apply)*

The most common purpose was **learning/studying (80%),** followed by watching videos/reels (56%).

## Discussion

The findings suggest that social media was not used exclusively for entertainment. Learning and studying represented the most commonly reported purpose. This indicates that adolescents may perceive social-media platforms as useful educational resources in addition to their recreational functions. However, more than half also reported watching videos or reels, demonstrating that entertainment remains an important component of usage. Therefore, social media appears to have both educational and recreational functions for the participants.

**10.Do you feel emotionally affected by what you see on social media?**

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Half of the respondents reported that they never felt emotionally affected by social-media content. However, 37.5% reported experiencing such effects sometimes.

## Discussion

The results indicate that emotional effects of social media varied among adolescents. Although half reported no emotional effect, a considerable proportion experienced emotional effects at least occasionally. This suggests that exposure to social-media content may have different psychological meanings for different adolescents. The finding is relevant to the study because emotional reactions represent one pathway through which social-media experiences may be associated with adolescent mental well-being.

**11.Do you compare yourself with others based on their posts or achievements on social media?**

The largest proportion reported never comparing themselves with others (37.5%), while 33.3% reported occasional comparison and 25% reported comparison sometimes.

## Discussion

Although the largest group did not report social comparison, a substantial proportion of adolescents reported comparing themselves with others at least occasionally. Social comparison is psychologically important because adolescents may evaluate themselves in relation to peers' appearance, achievements, lifestyle or social

experiences. The findings therefore suggest that social comparison is present to some extent among participants, although it is not experienced consistently by the majority.

## **12. Have your studies/sleep/family time been negatively affected due to social media usage?**

The majority (87.5%) reported that their studies, sleep or family time had not been negatively affected.

### **Discussion**

The findings indicate that most participants did not perceive major negative effects of social media on studies, sleep or family time. However, a small proportion did report negative effects, either consistently or sometimes. This suggests that the relationship between social media use and daily functioning may not be uniformly negative across adolescents. Individual patterns of use, duration, purpose and self-regulation may influence whether social media interferes with daily activities.

## **13. How often do you post on social media per week?**

Most participants (58.3%) did not post content on social media.

### **Discussion**

The results suggest that many adolescents in the sample were primarily consumers rather than active content creators. More than half did not post at all, while only a small proportion posted more than three times per week. This may indicate that social-media engagement among participants was more strongly characterized by viewing, learning and consuming content than by frequent self-presentation.

## **SECTION C: Mental Health and Emotional Responses**

### **14. I feel happy and cheerful most of the time.**

Half of the participants reported that they always felt happy and cheerful most of the time. **Discussion**

The findings indicate generally positive self-reported emotional well-being among the participants. Half reported consistently positive mood, while another 37.5% experienced happiness and cheerfulness sometimes. However, this question alone should not be interpreted as a clinical measure of mental health because the questionnaire was designed as a survey of perceptions and experiences rather than as a diagnostic mental-health instrument. **1**

### **5. I feel stressed or anxious without my phone or internet.**

The results show that 37.5% never experienced stress or anxiety without their phone or internet, while another 37.5% experienced it rarely. However, 20.8% reported experiencing it sometimes.

### **Discussion**

The findings suggest that strong dependence-related emotional responses were not widespread in the sample. Nevertheless, approximately one-fifth reported experiencing stress or anxiety sometimes when separated from their phone or internet. This indicates that a subset of adolescents may experience some degree of psychological discomfort associated with digital disconnection. The result is relevant to understanding digital dependence, although it should not be interpreted as evidence of a clinical condition.

### **16. I sleep less because I stay on my phone at night.**

A substantial majority (87.5%) reported that they never slept less because they stayed on their phone at night.

### **Discussion**

The findings suggest that most participants did not perceive nighttime phone use as reducing their sleep.

However, three participants reported that this occurred at least rarely or sometimes. The result should be considered alongside Question 20, which examines social media use while lying in bed before sleeping. Together, these findings can help distinguish between the presence of nighttime digital use and its perceived impact on sleep.

**17. Social media makes me feel more connected with people.** The responses were divided, with 37.5% disagreeing and another 37.5% being unsure.

### Discussion

The findings do not demonstrate a uniformly positive perception of social media as a means of social connectedness. While some adolescents agreed that social media increased their connection with others, a larger proportion either disagreed or remained uncertain. This suggests that the social benefits of social media may vary according to individual experiences and the nature of online interactions.

### 18. I feel better when I take a break from social media.

A very large majority (79.2%) agreed that they felt better when taking a break from social media. **Discussion**

This finding is particularly relevant to digital well-being. Although most adolescents did not report severe negative effects from social media in other questions, many nevertheless perceived some benefit from taking a break. This may indicate that adolescents recognize the value of temporary disengagement even when their overall social-media use is not perceived as harmful. The finding supports the importance of balanced and mindful digital engagement.

### 19. On average, how many hours of sleep do you get per night? - 45 -

The majority of respondents (69.6%) reported sleeping 6–7 hours per night. Seven participants reported at least 8 hours.

### Discussion

The results indicate that 6–7 hours was the most commonly reported sleep duration. A smaller group reported eight or more hours, while one participant reported less than four hours. One response contained two sleep categories simultaneously, indicating an inconsistent response that should be acknowledged during data cleaning. Sleep is an important aspect of adolescent well-being, and the findings provide useful context for examining the relationship between digital habits and perceived sleep-related effects.

### 20. Do you use social media while lying in bed before sleeping?

More than half of the respondents (54.2%) reported sometimes using social media while lying in bed before sleeping.

### Discussion

The finding indicates that bedtime social-media use was relatively common even though most participants did not report that nighttime phone use reduced their sleep. This distinction is important: engaging with social media before sleep does not necessarily mean that the adolescent perceives it as reducing sleep. However, bedtime digital use represents an important behavioral aspect of digital well-being and may warrant attention because of its potential relationship with sleep routines.

## SECTION D: General Thoughts, Digital Well-being

### 21. Do your parents or teachers talk to you about using social media safely?

A majority of participants (72%) reported receiving discussions from parents or teachers about safe social-media use.

## Discussion

The findings suggest that parents and teachers play an important role in promoting digital safety among adolescents. The fact that more than one-quarter of participants did not receive such guidance indicates that digital-literacy and online-safety education could still be strengthened. Supportive communication may help adolescents develop healthier and more responsible social-media habits

### 2. Why don't you use social media?

This question was intended primarily for non-users, and therefore only 18 responses were recorded, while 7 participants had no response. Several respondents also selected more than one reason.

Because multiple responses were permitted, percentages do not represent mutually exclusive categories.

## Discussion

The most frequently recorded reason was lack of interest (28%), followed by concerns that social media affects mental health and the perception that it is a waste of time (24% each). Some participants also identified lack of access to a phone or internet and parental restrictions as reasons. These findings indicate that non-use may result from personal preference, perceived psychological effects, time-management concerns, limited access or parental control. The relatively high number of missing responses is consistent with the questionnaire's skip instruction for social-media non-users and should therefore not be interpreted as non-response without context.

### 23. Do you think using social media affects the mental health of people your age?

The majority (70.8%) believed that social media can affect mental health in both positive and negative ways.

## Discussion

This was one of the most important findings of the study. Most adolescents did not view social media as entirely beneficial or entirely harmful. Instead, they recognized that it may have both positive and negative psychological effects. This balanced perception is consistent with the broader pattern of results: participants identified educational and social benefits while also reporting emotional effects, social comparison and a perceived benefit from taking breaks. The findings therefore suggest that the psychological impact of social media may depend on how it is used, what content is encountered and how individual adolescents respond to it.

### 24. Do you ever feel left out when friends talk about things from social media?

Almost half (47.8%) reported never feeling left out, while 43.5% reported experiencing this sometimes.

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## Discussion

The findings indicate that although most participants did not consistently experience exclusion, a considerable proportion experienced feelings of being left out at least sometimes. This may reflect the social nature of adolescence, where peer discussions and shared online experiences can influence feelings of inclusion and belonging. For adolescents who do not participate in social media, discussions among peers about online content may potentially create a sense of social distance.

**25. Have you ever been encouraged or pressured to join social media?** The majority (70.8%) reported that they had not been encouraged or pressured to join social media. However, 20.8% reported that they had experienced such encouragement or pressure.

## Discussion

The results indicate that most adolescents did not perceive pressure to join social media. Nevertheless, approximately one-fifth reported having experienced encouragement or pressure. This finding is relevant to adolescent peer influence because social-media participation can become part of peer-group interaction. The result also complements Question 24, where a substantial proportion reported occasionally feeling left out when friends discussed social-media-related experiences.

## Limitations of the Study

The study was conducted with a small sample of 25 adolescents, which may limit the generalizability of the findings to the wider adolescent population. The sample was also predominantly from urban areas and private institutions.

The study relied on self-reported responses, which may be influenced by personal perceptions or response bias. Since the study was cross-sectional, it can identify patterns and associations but cannot establish a causal relationship between social-media use and mental health. A few inconsistent or incomplete responses were also present in the collected data.

## Recommendations

It is recommended that adolescents be encouraged to maintain a balanced and healthy approach to social-media use, with appropriate limits on screen time and avoidance of excessive use before bedtime.

Parents and teachers should provide regular guidance on safe and responsible social-media use and help adolescents understand the possible emotional effects of online content and social comparison.

Schools can conduct awareness programs on digital well-being, healthy sleep habits, and responsible internet use. Adolescents should also be encouraged to take regular breaks from social media and engage in offline activities such as physical exercise, hobbies, family interaction, and face-to-face social relationships.

Future studies should include larger and more diverse samples and standardized psychological measures to obtain a more comprehensive understanding of the relationship between social-media use and adolescent mental health.

## Major Findings

The major findings of the study were:

1. The largest age group was 14 years (28%).
2. Female participants constituted 60% of the sample.
3. Most participants belonged to Class 9.
4. A large majority (84%) attended private institutions.
5. Most participants (84%) lived in urban areas.
6. Sixty-eight percent reported using social media.
7. Among interpretable daily-use responses, 1–2 hours was the most common duration.
8. YouTube was the most frequently used platform (80%).
9. Learning/studying was the most commonly reported purpose of social-media use (80%).
10. Half of the valid respondents reported never being emotionally affected by social-media content, while 37.5% experienced effects sometimes.
11. Most participants either never or occasionally compared themselves with others based on social-media posts.
12. Most participants reported no negative effect on studies, sleep or family time.
13. More than half did not post on social media.
14. Half of the valid respondents reported always feeling happy and cheerful most of the time.
15. Most participants never or rarely experienced stress or anxiety without their phone or internet.
16. Most participants reported that they never slept less because of nighttime phone use.
17. Participants were divided regarding whether social media increased their feeling of connectedness.
18. A large majority (79.2%) felt better after taking a break from social media.
19. Six to seven hours was the most commonly reported sleep duration.

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20. More than half reported sometimes using social media while lying in bed before sleeping.
21. Seventy-two

- percent reported receiving guidance from parents or teachers regarding safe social-media use.
22. Among recorded responses to the non-user question, lack of interest was the most common reason.
23. Most participants (70.8%) believed social media could affect mental health in both positive and negative ways.
24. Almost half never felt left out because of social-media-related conversations, while 43.5% experienced this sometimes.
25. Most participants had not experienced pressure to join social media, although 20.8% reported having experienced such pressure.

## Implications of the Study

The findings of the study have implications for adolescents, parents, teachers, and mental health professionals. Adolescents can benefit from developing healthy social-media habits, taking regular breaks, and maintaining a balance between online and offline activities. Parents and teachers can provide guidance regarding safe social-media use and help adolescents recognize emotional effects, social comparison, and excessive digital engagement.

Schools can use these findings to promote digital well-being, healthy sleep habits, and responsible social-media use through awareness programs. Mental-health professionals can consider adolescents' social-media habits while understanding their emotional and social experiences.

The findings also provide a basis for future researchers to conduct larger studies using standardized psychological measures to further examine the relationship between social media usage and adolescent mental health.

# CHAPTER 5

## SUMMARY

### SUMMARY

The present study was conducted to understand **social media usage and its correlation with adolescent mental health**. The survey focused on adolescents between **13 and 18 years of age** and consisted of 25 closed-ended questions covering demographic characteristics, social-media usage patterns, emotional responses, social comparison, sleep, social connectedness, and digital well-being. The study aimed to understand not only whether adolescents use social media but also how they use it and how they perceive its influence on their emotional and psychological well-being.

### Summary of the Study

A total of **25 adolescent responses** were included in the study. The demographic findings showed that participants belonged to different age groups between 13 and 18 years, with females representing a slightly larger proportion of the sample. Most participants were studying in private institutions and were residents of urban areas. This demographic information provides important background for understanding the social-media experiences of the participants.

The findings regarding social-media usage showed that **68% of participants reported using social media**. Among the reported platforms, YouTube was the most commonly used, followed by WhatsApp and Instagram. Participants reported using social media for several purposes, with **learning and studying** being the most

frequently reported purpose, followed by watching videos or reels and accessing news and current events. This indicates that social media was not used solely for entertainment but also served educational and informational purposes.

In terms of daily usage, the largest proportion of interpretable responses indicated **1–2 hours of social-media use per day**, while a smaller proportion reported longer periods of use. Most participants also reported that they did not regularly post content, suggesting that many adolescents in the sample were more involved in viewing or consuming content than actively creating and sharing it.

The findings related to emotional experiences showed a mixed pattern. Although half of the valid respondents reported that they were never emotionally affected by what they saw on social media, a considerable proportion reported being emotionally affected sometimes. Similarly, most participants did not frequently compare themselves with others based on social-media posts, but a substantial number reported occasional or sometimes engaging in such comparisons. These findings suggest that social-media content may influence adolescents differently depending on their individual experiences and patterns of use.

With regard to daily functioning, the majority of participants reported that their **studies, sleep, or family time had not been negatively affected by social-media use**. Similarly, most participants reported that they never or rarely felt stressed or anxious when they were without their phone or internet. Most also reported that they did not sleep less because of nighttime phone use. These findings suggest that severe negative effects of social-media use were not commonly reported within this particular sample.

However, some findings highlighted important digital-well-being concerns. More than half of the participants reported that they sometimes used social media while lying in bed before sleeping. In contrast, a large majority reported that they **felt better when taking a break from social media**. This suggests that adolescents may recognize the benefits of temporarily reducing their digital engagement even when they do not perceive their overall social-media use as seriously harmful.

The findings regarding social connectedness were also mixed. Participants were divided in their responses to whether social media made them feel more connected with people. Some participants experienced a sense of connection, while others disagreed or were uncertain. Similarly, although nearly half of the participants never felt left out when friends discussed things from social media, a substantial proportion experienced this sometimes. These findings highlight the complex role of social media in adolescent peer relationships.

An important finding was that **70.8% of the valid respondents believed that social media affects the mental health of adolescents in both positive and negative ways**. This indicates that the participants themselves recognized the multidimensional nature of social media. Rather than considering social media completely beneficial or harmful, most adolescents perceived that its effects could depend on how it is used and the experiences associated with it.

The study also examined the role of adults in promoting safe social-media use. **Seventy-two percent of participants reported that their parents or teachers talked to them about using social media safely**. This finding highlights the potential importance of parental and educational guidance in helping adolescents develop responsible digital habits.

## Conclusion

In conclusion, the present study provides an overview of social-media usage patterns and adolescents perceived emotional and psychological experiences associated with social media. The findings indicate that social media has become an important part of adolescent life and can serve useful educational, informational, and social

purposes.

However, certain patterns of use may also be associated with emotional effects, social comparison, bedtime use, and occasional feelings of exclusion.

The overall findings support the need for **balanced and responsible social-media use among adolescents**. Parents, teachers, schools, and mental-health professionals can play an important role in promoting digital well-being, healthy sleep practices, appropriate screen-time habits, and awareness of the possible psychological effects of online experiences.

The present study is based on a small sample of 25 participants and self-reported responses; therefore, the findings should be interpreted cautiously and should not be generalized to all adolescents. Nevertheless, the study provides useful preliminary insight into the relationship between social-media experiences and adolescent mental well-being and can serve as a basis for future research using larger samples, more diverse participants, and standardized psychological measures.

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## APPENDICES

### SECTION A: Demographic Details

This section helps us to understand your background, type of residence and type of institution. It provides essential context for interpreting your responses in relation to Social media usage. 1. Age \*

- ☐ 13
- ☐ 14
- ☐ 15
- ☐ 16
- ☐ 17
- ☐ 18

2. Gender: \*

- ☐ Male
- ☐ Female

3. Educational Level: \*

- ☐ Class 7
- ☐ Class 8
- ☐ Class 9
- ☐ Class 10
- ☐ Class 11
- ☐ Class 12

4. Type of Institution: \*

- ☐ Public
- ☐ Private

5. Area of Residence: \*

- ☐ Urban
- ☐ Rural
- ☐ Semi-urban

### SECTION B: Social Media Usage Pattern

This section helps us to understand how the frequency, nature, and context of social media usage 6. Do you use social media?

(If NO, Skip to Section D)

- Yes
- No

7. How many hours do you spend on social media daily?

Less than 1 hour

- ☐ 1–2 hours
- ☐ 3–4 hours
- ☐ 5–6 hours
- ☐ More than 6 hours

8. Which platforms do you use the most? *(Tick all that apply)*

- Instagram
- WhatsApp
- YouTube
- Snapchat
- Facebook
- Other:

9. What do you primarily use social media for? *(Tick all that apply)*

Socializing

- ☐ Watching videos/reels
- ☐ Learning/studying
- ☐ News and current events
- ☐ Posting and sharing content

Other:

10. Do you feel emotionally affected by what you see on social media?

- Never
- Rarely
- Sometimes
- Often
- Always

11. Do you compare yourself with others based on their posts or achievements on social media?

- Never
- Occasionally
- Sometimes
- Often
- Always

12. Have your studies/sleep/family time been negatively affected due to social media usage?

- ☐ Yes
- ☐ No
- ☐ Sometimes

13. How often do you post on social media per week?

- ☐ Not at all
- ☐ 1–2 times
- ☐ 3–5 times
- ☐ More than 5 times

### SECTION C: Mental Health and Emotional Responses

This section helps us to understand how the social media usage is related to your mental health and sleep habits.

**Instructions:** Tick the option that matches how often you feel this way. 14. I feel happy and cheerful most of the time.

- ☐ Always
- ☐ Often
- ☐ Sometimes
- ☐ Rarely
- ☐ Never

15. I feel stressed or anxious without my phone or internet.

- ☐ Always
- ☐ Often
- ☐ Sometimes
- ☐ Rarely
- ☐ Never

16. I sleep less because I stay on my phone at night.

- ☐ Always
- ☐ Often
- ☐ Sometimes
- ☐ Rarely
- ☐ Never

17. Social media makes me feel more connected with people.

- ☐ Strongly Agree
- ☐ Agree
- ☐ Not Sure
- ☐ Disagree

- Strongly Disagree

18. I feel better when I take a break from social media.

- Strongly Agree
- Agree
- Not Sure
- Disagree
- Strongly Disagree

19. On average, how many hours of sleep do you get per night?

- <4 hrs
- 4-5 hrs
- 6-7 hrs
- ≥8 hrs

20. Do you use social media while lying in bed before sleeping?

- Yes , regularly
- No
- Sometimes

#### **SECTION D: General Thoughts, Digital Well-being**

This section helps us to understand the general perceptions of the participants who don't use social media.

21. Do your parents or teachers talk to you about using social media safely? \*

- Yes
- No

22. Why don't you use social media? (*You can select more than one*)

- I'm not interested
- My parents/guardians don't allow it
- I don't have a phone/internet
- I think it's a waste of time
- I feel it affects mental health
- Other (please mention): \_\_\_\_\_

23. Do you think using social media affects the mental health of people your age?

- Yes, in a good way
- Yes, in a bad way
- Both good and bad
- Not sure

24. Do you ever feel left out when friends talk about things from social media?

- ☐ Yes
- ☐ No
- ☐ Sometimes

25. Have you ever been encouraged or pressured to join social media?

- ☐ Yes
- ☐ No
- ☐ Not sure

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