

Article

Unplugging Youth: Mobile Phone Addiction, Social Impact, and the Call for Digital Detox

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Abstract: This study investigates the impact of excessive mobile phone use on young individuals aged 14–35 in Kastoria, Greece. It explores how smartphone addiction affects daily life and social interactions. A survey with 30 closed-ended questions was conducted among 150 respondents from May to August 2019. Data were analyzed using descriptive statistics and chi-square tests, focusing on gender and employment status differences. Most respondents use their phones for over 5 h daily, primarily for social media and communication. Findings reveal high addiction rates, reduced productivity, and disrupted sleep. Women reported more difficulty disconnecting and a greater need for detoxification than men. Students and unemployed individuals showed higher addiction symptoms and negative productivity impacts compared to employed respondents. Excessive mobile phone use among young people poses significant challenges, including addiction and adverse effects on productivity, relationships, and sleep, influenced by gender and employment status.

Keywords: mobile phone addiction; smartphone addiction; digital detox; social media



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1. Introduction

The advancement of wireless technologies and the proliferation of mobile devices have established a digital environment characterized by continuous and uninterrupted Internet access. This interplay between technology and daily life has enabled persistent connectivity and information access, regardless of location or time. It is noteworthy that, on a global scale, there exist over 8.89 billion mobile subscriptions, while approximately 5.4 billion individuals, accounting for 67% of the global population, are Internet users [1]. Smartphones have revolutionized modern life by providing convenient access to a wealth of information and communication tools, enhancing everyday activities and transforming social interactions [2]. Numerous young individuals have grown up in a world where instant internet access and social networking platforms are ubiquitous. This pervasive presence of the internet and social media has fundamentally altered the interaction and communication patterns of this cohort [3].

While smartphones offer significant benefits in business, education, health, and personal life [4,5], it is crucial to manage their usage wisely, so as to avoid Problematic Internet Use [6], to minimize negative impacts such as privacy issues, distraction, health issues, and disrespectful behavior, ensuring that society can fully harness their potential for positive growth [4,5,7]. The growing recognition of these negative impacts has led to the emergence of the digital detox movement. Digital detox refers to a period during which individuals refrain from using digital devices to reduce stress, improve focus, and enhance overall

well-being [8]. Research indicates that digital detox can lead to improved mental health, reduced anxiety, and better sleep quality [9,10]. Studies have shown that regular digital detox practices can significantly mitigate the adverse effects of excessive smartphone usage and help individuals regain a healthy balance between their digital and offline lives [11–13]. As such, adopting digital detox strategies is becoming increasingly important in managing the pervasive influence of smartphones on daily life.

This study seeks to explore the perspectives of individuals aged 14–35 regarding mobile phone usage and its influence on different facets of their social lives. Specifically, it examines how excessive mobile phone use among young people can lead to addiction and impact daily life in diverse ways for contemporary individuals. The research aims to highlight the dual nature of mobile phone usage, which, while offering unprecedented connectivity and convenience, also poses significant challenges such as decreased face-to-face interactions, increased social anxiety, and impaired academic or work performance. The study is guided by key questions such as: What is the prevalence of smartphone addiction among young individuals? How does excessive smartphone use impact their social, psychological, and behavioral dimensions of life? What factors, such as gender or employment status, shape these experiences? Furthermore, how do young people perceive digital detox as a strategy to mitigate these adverse effects?

Grounded in these questions, the study hypothesizes that smartphone addiction is prevalent among young people and is associated with significant negative outcomes, including reduced productivity, impaired interpersonal relationships, and poor sleep quality. It further posits that demographic factors like gender and employment status significantly influence the extent and perception of smartphone addiction. Lastly, it is hypothesized that digital detox is perceived as an effective intervention for reducing the negative impacts of excessive smartphone use.

By understanding the nuanced experiences of this demographic, the study will shed light on the potential psychological and social consequences of smartphone addiction, such as feelings of loneliness, increased stress levels, and disruption of sleep patterns. Additionally, the study will explore the growing trend of digital detox and its effectiveness in helping young people achieve a healthier relationship with technology, emphasizing the importance of balancing digital engagement with offline activities to foster overall well-being and social harmony.

The survey's contributions are manifold; it provides valuable insights into the current state of mobile phone dependency among youth and highlights the complex relationship between technology use and social dynamics. It also offers practical implications for developing interventions aimed at promoting healthier digital habits and raising awareness about the importance of digital detox. Moreover, the findings could inform policymakers and educators about the need for guidelines and programs that encourage mindful technology use, potentially shaping future digital wellness initiatives.

However, the study is not without limitations. It primarily relies on self-reported data, which may be subject to biases such as social desirability and recall bias, potentially affecting the accuracy of the responses. Another limitation of our study is the unbalanced distribution of the sample with respect to gender and age. Female respondents comprised 62.7% of the sample, which may have influenced the findings, especially regarding perceptions of smartphone addiction and digital detox. Additionally, the 14–17 age group was significantly underrepresented (3.3%), limiting insights into a demographic that is particularly vulnerable to the psycho-social impacts of smartphone addiction. The sample may also lack diversity in terms of socioeconomic background and geographic location, limiting the generalizability of the findings to broader populations. Additionally, the cross-sectional nature of the survey provides a snapshot of mobile phone usage behaviors at a single

point in time, making it difficult to infer causal relationships or observe changes over time. Future studies should aim to achieve a more balanced sample across gender and age groups to explore how these variables influence smartphone use and its effects. Future research could also benefit from longitudinal studies that track mobile phone usage patterns and their impacts over extended periods, providing a more comprehensive understanding of the evolving dynamics between young people and their digital devices.

2. Review of the Literature—Context

2.1. Understanding Behavioral and Technological Addictions

Addictions, both behavioral and technological, share core features traditionally associated with substance-related dependencies. These include salience, mood modification, tolerance, withdrawal, conflict, and relapse [14–16]. Behavioral addictions are characterized by excessive and repetitive behaviors that persist despite negative consequences. Examples include gambling, gaming, and more recently, internet and smartphone overuse [15–17].

Technological addictions, such as smartphone addiction, exhibit the same addictive patterns but with unique complexities introduced by the constant availability of devices and digital interfaces. These behaviors often meet psychological needs, such as alleviating anxiety or providing social gratification, which fosters dependency [15,18,19]. Covert addiction, a subtler form of dependency, arises when functional technologies like GPS navigation systems are used unconsciously and habitually. For instance, studies reveal that users of applications such as Waze demonstrate addiction-like behaviors, including mood modification, conflict, relapse, and withdrawal, due to the utility-driven satisfaction these technologies provide [20]. Similarly, Giles et al. [21] highlighted how distorted perceptions of ease of use and usefulness can reinforce unconscious reliance on such technologies. Studies have highlighted that smartphone addiction mirrors traditional addictions, with withdrawal symptoms when access is restricted, and a prioritization of digital interactions over real-world responsibilities. Furthermore, problematic internet and smartphone use is associated with disruptions in family life and increased loneliness, further entrenching addictive behavior [16,18,22].

Beyond traditional and technological addictions, the challenges posed by smartphone and media dependency intersect with broader informational and psycho-social issues, such as misinformation and social media misuse. For instance, D’Errico et al. [23] demonstrated that school-based interventions aimed at reducing ethnic moral disengagement caused by misinformation can significantly improve critical thinking and reduce susceptibility to biased narratives. Similarly, Orosz et al. [24] highlighted the lasting impact of prosocial interventions in counteracting misinformation in informational autocracies, underscoring the need for reflective and critical thinking in digital environments. Furthermore, Hou et al. [25] identified self-regulation strategies as effective means of mitigating the adverse effects of social media addiction, such as increased anxiety and reduced academic performance. Throuvala et al. [26] advocated for school-based prevention programs targeting internet and smartphone addiction, particularly among adolescents, emphasizing awareness and education as key to fostering healthier digital habits. These findings illustrate the potential of holistic interventions addressing both behavioral dependencies and their broader informational implications.

Advances in technology have also highlighted potential prevention strategies through early detection systems that monitor users’ emotional states. For example, De Choudhury et al. [27] demonstrated that linguistic and behavioral patterns in social media data could predict signs of depression, offering opportunities for interventions through digital platforms. Similarly, Poggi et al. [28] highlighted how cognitive states such as agreement or disagreement could be detected via multimodal communication, including facial expres-

sions. These developments suggest that smartphones could integrate detection systems to alert users to early signs of emotional distress, such as stress or depression, thereby preventing escalation into more severe issues.

Researchers have proposed multiple models to understand the development of technological addiction. The biopsychosocial model suggests that a combination of genetic, psychological, and environmental factors contribute to addiction susceptibility [15,16]. Behavioral pathways also include reinforcement mechanisms, where the immediate gratification and social rewards offered by smartphones exacerbate dependency [14,19]. Covert addiction highlights how functional tools intended for efficiency, such as navigation systems, can unconsciously dominate behaviors and decision-making patterns [20,21]. Additionally, studies have found that certain parenting styles, particularly authoritarian approaches, can inadvertently foster problematic internet and smartphone use in adolescents [18].

The parallels between technological and traditional addictions underscore the need for comprehensive prevention and intervention strategies. Excessive smartphone use has been linked to psychological distress, reduced academic performance, and strained social relationships [16,18,19]. Interventions must account for the pervasive role of digital devices in daily life, which challenges traditional addiction management strategies. Innovative solutions such as digital detox programs, media literacy education, and mindfulness training are critical in mitigating the negative consequences of smartphone overuse and promoting healthier usage patterns [16,19,22].

2.2. *The Impact of Smartphones on Society*

The pervasive presence of smartphones has dramatically reshaped modern society, profoundly influencing various domains. According to Sarwar and Soomro [5], smartphones have had a substantial impact on sectors such as education, business, and entertainment. In education, for instance, they facilitate access to online resources and e-learning platforms, allowing students to enhance their learning experiences beyond traditional classroom settings. In the business realm, smartphones enable seamless communication, mobile commerce, and access to business tools, thereby boosting productivity and operational efficiency. Entertainment has also been revolutionized, with smartphones providing instant access to multimedia content and social networks, transforming how individuals consume media and interact socially.

However, these benefits are accompanied by significant drawbacks. Sarwar and Soomro [5] highlight that smartphones contribute to issues such as privacy threats, disrespectful behavior, and workplace distractions. Privacy concerns are exacerbated by the extensive amount of personal data collected through various apps, which can be vulnerable to breaches and unauthorized access. The constant connectivity and availability of information also leads to potential distractions in both professional and personal contexts, negatively affecting focus and productivity.

The pervasive use of mobile phones raises serious health concerns, particularly related to electromagnetic radiation exposure, which has been linked to potential long-term health risks such as cancer and neurological disorders [4]. The physical and psychological effects of prolonged smartphone use are significant, with studies indicating that excessive use can contribute to poor posture, eye strain, and mental health issues such as anxiety and depression. For example, Haand and Shuwang [29] found a positive correlation between social media addiction and depression, with depression being a significant predictor of social media addiction. Moreover, research by Rod et al. [7] indicates that considerable overnight smartphone use among young adults is associated with shorter sleep duration and higher body mass index, which can lead to a range of health problems, including obesity

and metabolic disorders. This underscores the importance of developing technologies that minimize these health risks and promote healthier usage patterns.

2.3. Smartphone Addiction, Youth, and Digital Detox

The widespread availability of social networking sites on smartphones poses significant distractions, particularly for younger age groups, leading to potential problematic usage behaviors, even addiction [13]. These platforms can lead to problematic usage behaviors, such as compulsive checking and extended screen time, which can disrupt daily routines and negatively impact mental health. The potential for smartphone addiction is a growing concern, characterized by an inability to control phone usage, preoccupation with online activities, and withdrawal symptoms when not using the device. This addiction can lead to negative outcomes such as reduced academic performance, impaired interpersonal relationships, and heightened levels of stress and anxiety.

In response to these challenges, the concept of “digital detox” has gained traction in mainstream culture and, more recently, in academic research [9–13] exploring abstinence or temporary disengagement from digital technologies to mitigate the negative effects [9]. Specifically, the term, according to Oxford Learner’s Dictionary [8], refers to: “a period of time when a person does not use digital devices such as smartphones or computers, especially in order to reduce stress and relax”. The need for “digital detox” arises from the growing awareness of the negative impacts of excessive digital device usage on mental health, productivity, and overall well-being. Research reveals that a significant proportion of young people exhibit high levels of smartphone addiction, primarily driven by social networking applications. Research highlights fear of missing out as a key predictor of addictive behavior and identifies poor sleep quality as a consequential impact. These findings underscore the critical need for digital detox initiatives to mitigate excessive smartphone usage among young people [30].

According to Miksch and Schulz [31], young adults actively employ strategies to limit digital technology interaction across professional, private, and social contexts. Their motivations include maintaining self-control, enhancing performance, and fostering real-life relationships. These findings provide insights into how young adults navigate their digital lives, which can be viewed as both encouraging in terms of awareness and proactive management and concerning in terms of the challenges posed by digital technology use. Green et al. [32] claim that the exploration of smartphone disconnection practices suggests that fostering periods of digital detox could empower teenagers to regain control over their personal technologies. Moving forward, integrating digital disconnection regimes in educational and social settings may align with emerging research on the benefits of mindful engagement and contribute to discussions on children’s digital rights in the post-COVID era.

Coyne and Woodruff [11] explored the effects of digital detox periods on mental health, focusing on reduced smartphone and social media usage. Their findings showed significant improvements in addiction levels, sleep quality, stress reduction, and overall life satisfaction among participants. Qualitative insights underscored increased mindfulness and awareness of the negative impacts of excessive digital consumption, suggesting that structured detox interventions may support healthier technology habits and improve well-being. Schmuck [13], grounded in self-regulation theory, examined the impact of social networking sites use on problematic smartphone use and well-being among 500 young adults (aged 18–35). Findings show a substantial portion (41.7%) use digital detox apps. Non-users of these apps exhibited a positive association between social networking sites use and problematic smartphone use, negatively impacting well-being. In contrast, digital

detox app users did not show this association, suggesting these apps may mitigate harmful effects of social networking sites use by reducing compulsive smartphone use.

In conclusion, as smartphones continue to reshape society with their pervasive influence, the need for balanced and mindful use becomes increasingly evident. Issues such as privacy risks, workplace distractions, and health concerns highlight the complexities of modern digital engagement. Recent research on “digital detox” underscores its potential for mitigating these challenges and promoting healthier technology habits [11,13]. Our study complements this discourse by exploring how excessive mobile phone use among young people impacts their daily lives and social interactions, shedding light on the psychological and social consequences of smartphone addiction and evaluating the effectiveness of digital detox strategies in fostering well-being and social harmony.

3. Materials and Methods

3.1. Research Design and Conducting

This study aims to investigate the opinions of young people aged 14–35 on the use of mobile phones and the effects that this use has on various aspects of their social life. In particular, an investigation of the excessive use of mobile phones by the young age groups of the population is attempted, which leads to addiction and affects the daily life of modern people in various ways.

The target group of our research, as mentioned above, is the young age groups of 14–35 years, i.e., pupils, students, and working people. These age groups are the heaviest users of mobile phones, as they use them in almost every aspect of their daily life, such as for information, entertainment, shopping, etc.

For our research, the questionnaire was used as a research tool, which was formed utilizing the experience of similar research from the international literature. In particular, the survey questionnaire includes a total of 30 closed-ended questions: the first part includes questions about the basic characteristics of the sample (gender, age, etc.), and the second part includes questions related to the participants’ opinions on the use of mobile phones.

The sampling method used to collect the completed questionnaires is simple random sampling. The research was carried out during the period of May–August 2019. Questionnaires were completed in central parts of the city of Kastoria during the morning and afternoon hours of the day. In fact, to ensure the randomness of our sample, every third young passer-by was chosen to complete the questionnaire. A total of 150 questionnaires were collected from the questionnaire filling process. SPSS software (version 25.0, SPSS Inc., Chicago, IL, USA) was used to analyze the research data. First, the primary results were analyzed, using the tools of descriptive statistics. Subsequently, we carried out statistical hypothesis testing by adopting induction statistics (chi-square or χ^2 test). The analysis also considered standardized residuals from the chi-square tests to better interpret deviations from expected frequencies, providing additional insights into the relationships between variables.

To ensure the validity of the data collection instrument, a content validity test was conducted. Items included in the questionnaire were reviewed by a panel of experts in psychology and digital behavior to confirm their relevance and clarity. The questionnaire’s design drew from established frameworks in the literature to ensure that the constructs under investigation were appropriately measured. Although no formal power analysis was conducted, the sample size of 150 was chosen based on typical research in this field and the practical constraints of the study.

3.2. The Greek Case

Greece's adoption of the internet has historically lagged behind other European Union countries. In 2008, only 31% of Greek households had internet access, significantly below the EU average of 60% [33]. This placed Greece 27th out of 28 EU member countries, ahead of only Bulgaria. Leading countries like the Netherlands, Denmark, and Luxembourg had internet penetration rates of 86%, 82%, and 80%, respectively [33]. Despite this slow start, Greece has made substantial progress over the past decade. By 2022, the percentage of Greek households with internet access had risen to 85%. However, this still ranks Greece as having the third lowest rate of household internet access among EU Member States [34].

Greece has shown a significant reliance on the internet for news and information, despite its historically lower internet access rates. According to the Digital News Report 2022, Greece has the lowest percentage of citizens who believe the press is free from undue political (7%) or business (8%) influence among 46 countries surveyed [35]. Greece ranks high globally in terms of internet use for information. Studies from 2016 to 2019 consistently show that a vast majority of Greek internet users (90–96%) rely on the internet as their primary source of information [36–38]. In 2017, Greece was second only to Turkey among 36 countries for the percentage of internet users utilizing the internet as a source of information [37].

Social media plays a critical role in the information landscape of Greece. In 2018, Greece was one of three countries where social media was a more prevalent source of news than television [38]. By 2023, online sources (including social media) accounted for 81% of news consumption in Greece, with social media alone at 61%. This far exceeds the percentages for TV (48%) and print media (15%) [35]. In 2016, Greece led 26 countries in social media use as the main source of news [21]. This trend continued, with Greece maintaining high rates of social media usage for news, ranking first in 2017 and remaining a top country globally for this metric [37].

The rise of digital and mobile technologies has significantly influenced how Greeks access and consume information. Despite earlier challenges in internet adoption, the Greek population has embraced digital platforms, particularly social media, for news and information. This shift underscores the importance of digital literacy and the role of mobile technologies in the contemporary Greek media landscape. Greece's journey from slow internet adoption to becoming a leader in internet and social media usage for news illustrates the transformative power of digital and mobile technologies. Despite ongoing challenges with internet penetration rates, the Greek population's reliance on digital platforms for information highlights a dynamic and evolving media environment [39,40].

3.3. Sample Profile

The first section of the questionnaire includes the questions concerning the profile of the respondents, specifically gender, age, and employment status (Table 1). Regarding the gender of the respondents, 62.7% of them are women and 37.3% are men. As for the age of the respondents, the largest concentration of 76.0% is observed in the 18–25 age group, followed by the 26–35 age group with 20.7%, and the 14–17 age group with 3.3%. Regarding the level of education of the respondents, most of them are graduates of tertiary (74.7%) and of secondary (24.7%) education. Finally, the results for the employment status of the respondents showed that the largest percentage of 48.7% are employed, an equally large percentage of 43.3% are pupils/students, and a percentage of 8.0% are unemployed.

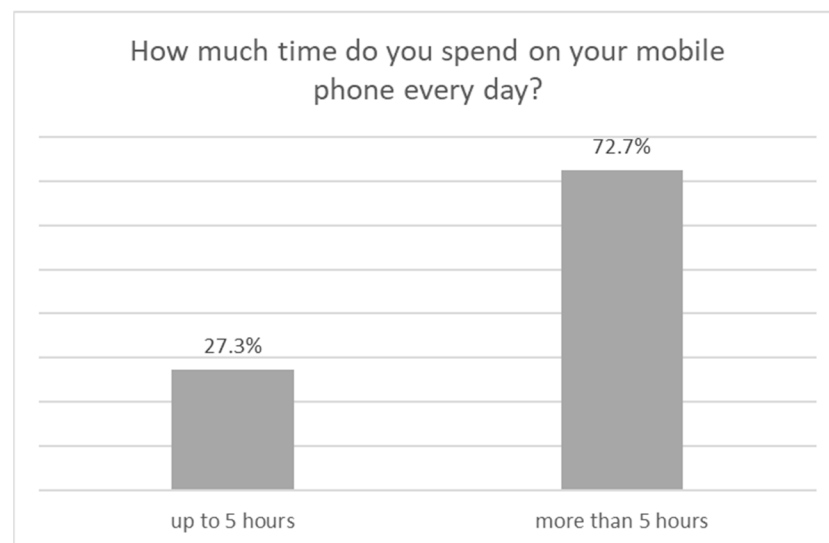
Table 1. Identity of the sample.

Variable	N	%	
Gender	Male	56	37.3%
	Female	94	62.7%
Age	14–17	5	3.3%
	18–25	114	76.0%
	26–35	31	20.7%
Education Level	Primary	1	0.7%
	Secondary	37	24.7%
	Tertiary	112	74.7%
Occupation	Student	65	43.3%
	Employee	73	48.7%
	Unemployed	12	8.0%

4. Results

4.1. Descriptive Statistics Analysis

This section analyzes the main results of our survey, starting with the hours respondents spend on their mobile phones daily. As can be seen in the diagram below (Figure 1), 72.7% of respondents use their mobile phone more than 5 h a day, while only 27.3% use it for less than 5 h. From these findings, it appears that the use of the mobile phone among young people is extensive and covers a large part and many aspects of their daily life.

**Figure 1.** Hours of mobile phone use per day.

Regarding the reasons for using the mobile phone, as can be seen in the diagram below (Figure 2), they cover the whole spectrum of young people's social life. Specifically, 21.3% of them use their mobile phone for social media, 20.5% to communicate with their social environment (friends, acquaintances and relatives, etc.), 16.9% to listen to music, and 12.8% to watch movies or shows, while 15.0% do all the above. From these answers, it seems that the mobile phone has covered all the activities of young people, who in fact with the use of their mobile phone can more easily and anywhere carry out activities that were previously autonomous, such as watching a movie.

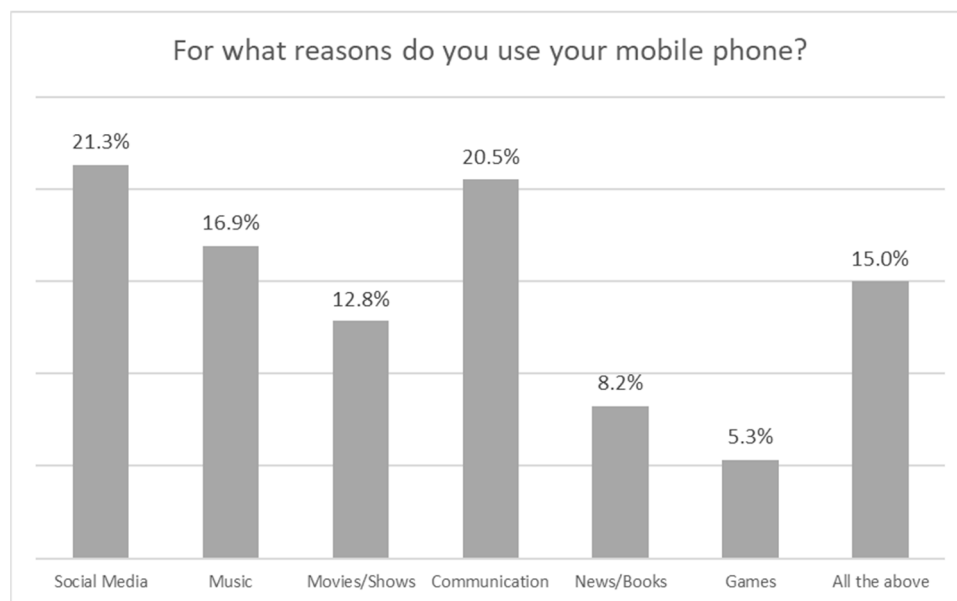


Figure 2. Reasons for using a mobile phone.

The use of the mobile phone in modern societies, as was seen from the findings of the previous questions, is extensive and covers every manifestation of the daily life of young people. As can be easily understood, this extensive use of the mobile phone today has become addictive. In fact, this particularly serious issue has occupied the public, as well as the academic discussion. From our research, the issue of the addiction that develops from the use of the mobile phone in young people emerges in an emphatic way. Specifically, 61.3% of them report that they need to detoxify from their mobile phone, 52.0% that they are tempted to check their mobile phone for fear that they have lost something, and, finally, 40.7% report that they feel that they cannot get off their mobile phone (Figure 3).

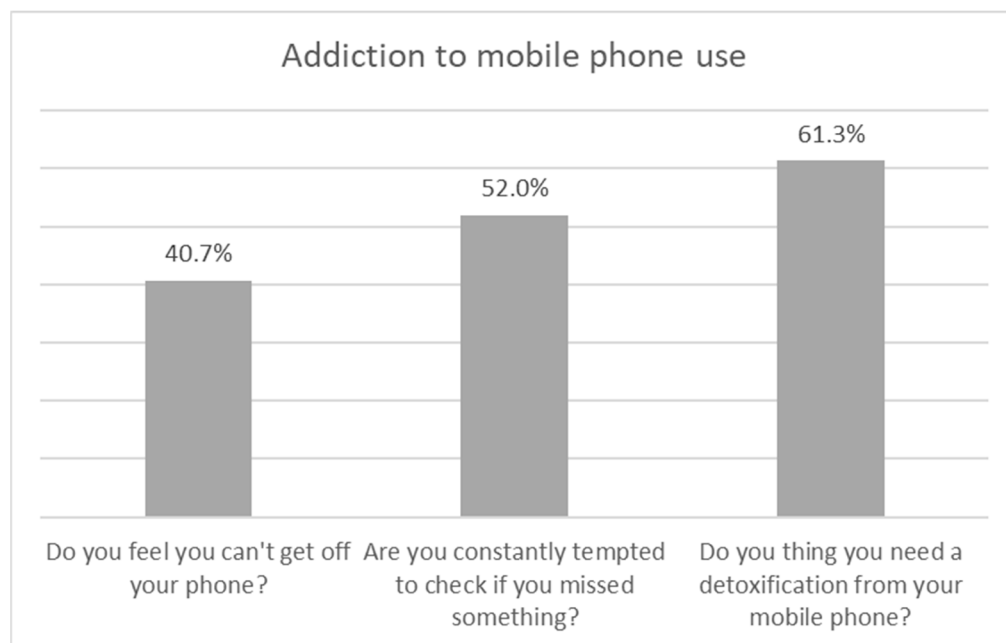


Figure 3. Addiction to mobile phone use.

Moreover, the extensive use of the mobile phone seems to create multifaceted problems in people's lives. As can be seen in the diagram below (Figure 4), 76.3% of the respondents state that their use of the mobile phone affects their personal dimension, 70.7% consider it

to affect their productivity, 66.0% their interpersonal relationships, and 52.0% their hours of sleep and sleep quality. From these impressive percentages, it appears that the extensive use of the mobile phone has a negative effect, both on the health and on the social and economic life of young people.

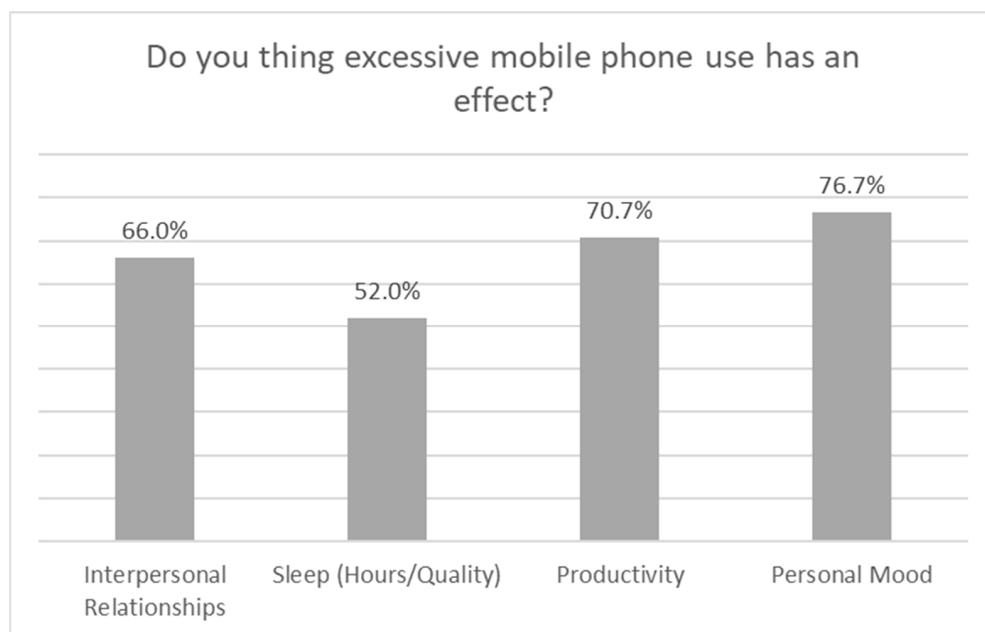


Figure 4. Effects of extensive mobile phone use.

Finally, the mood disorders caused by excessive use of the mobile phone seem to be quite serious and, indeed, are apparent in a large percentage of young people. Specifically, as can be seen in the diagram below (Figure 5), 40.2% of the respondents state that extensive use of their mobile phone leads to low productivity, 24.8% that it creates anxiety, 18.8% stress, 10.3% low self-esteem, and 6.0% depression. As can be understood from the above findings, the effect of extensive mobile phone use is particularly serious and causes significant and deeper problems.

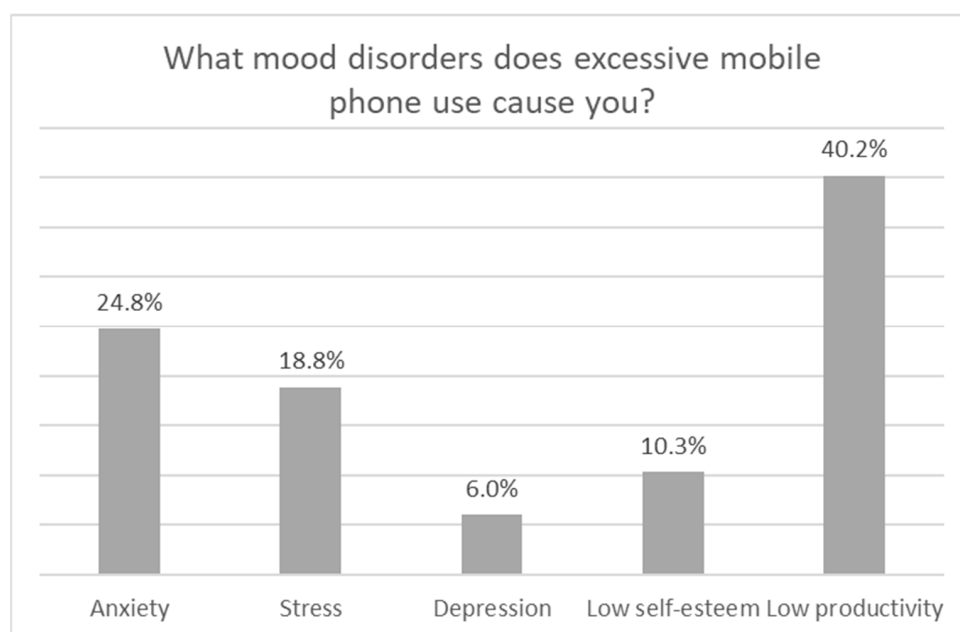


Figure 5. Mood disorders caused by excessive use of a mobile phone.

4.2. Inductive Statistics Analysis

In this section, by applying the techniques of inductive statistics and, specifically, the chi-square (χ^2) test, we aim to investigate the results of our research in greater depth, analyzing the opinions of different subgroups of our sample, for example, the opinions of the respondents according to gender, age, employment status, etc. In particular, more than 32 research hypotheses regarding the correlation of individual variables were tested. From the research hypotheses that were checked, 12 hypotheses emerged as statistically significant, the results of which will be presented below.

First, it is examined whether the effect of excessive mobile phone use on health is related to the gender of the respondents. By using the statistical test χ^2 it emerged that the two variables are correlated (p -value: 0.083). Residuals indicate that women reported their health being affected by excessive mobile phone use more frequently than expected, while men reported this less frequently than expected. As can be seen in the diagram below (Figure 6), women state that their health is affected by the excessive use of mobile phones to a greater extent (84.0%) compared to men (73.2%).

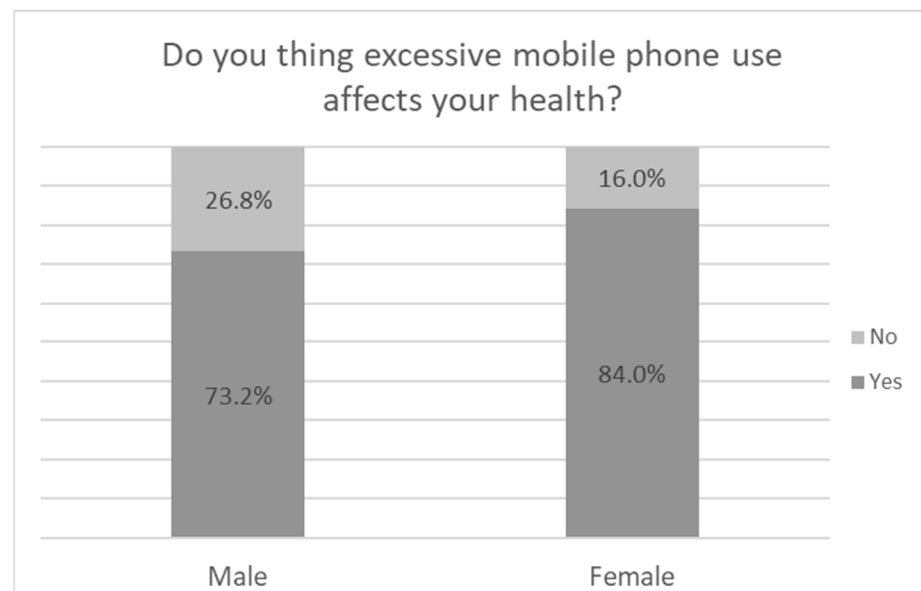


Figure 6. Health impact of excessive mobile phone use, responses by gender.

Conversely, the effect on the respondents' productivity differs between the two genders (p -value: 0.071) in the opposite way. Specifically, 78.6% of men stated that their productivity is affected, while the percentage of women is clearly lower, 66.0% (Figure 7).

In addition, the inability to get away from the mobile phone is related to the gender variable (p -value: 0.002). As can be seen in the diagram below (Figure 8), women declare a greater difficulty in getting away from their mobile phones at a percentage of 50.0%, compared to men who show a percentage of 25.0%.

Recognition of the need for mobile phone detoxification is again related to gender (p -value: 0.022). As in the previous findings, women state in a greater percentage, 68.1%, that they need detoxification from their mobile phone, compared to men who note a much lower percentage of 50.0% (Figure 9).

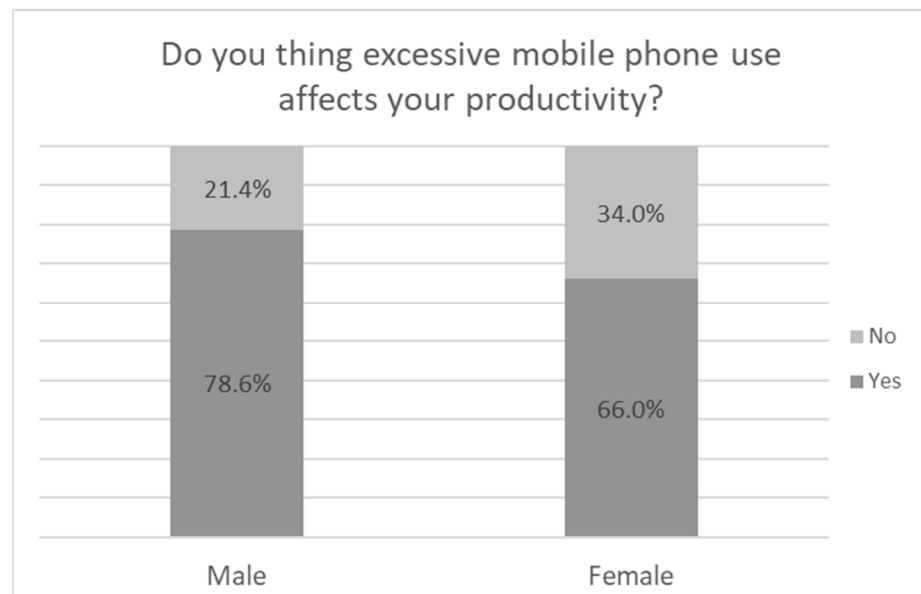


Figure 7. Effect of excessive mobile use on productivity, responses by gender.

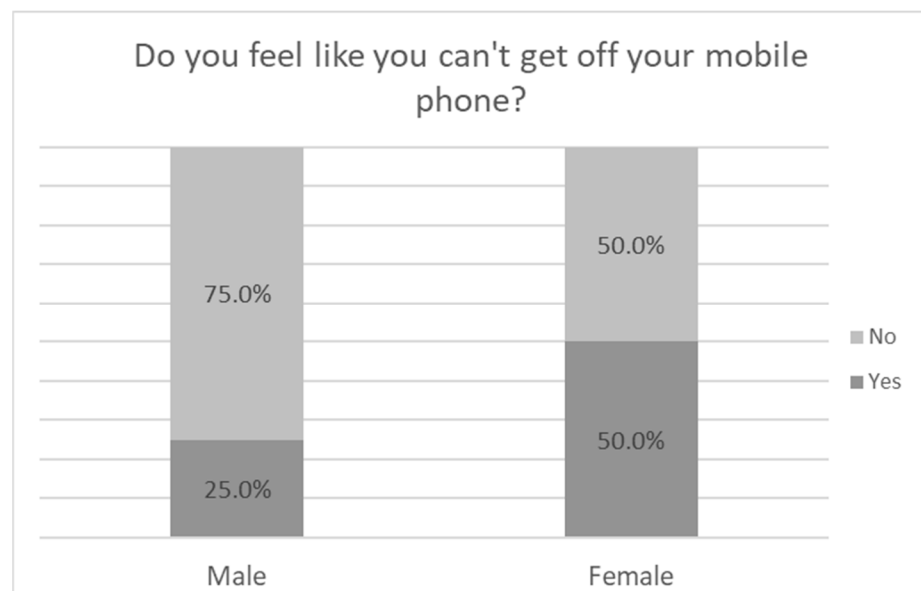


Figure 8. Inability to get away from the mobile phone, responses by gender.

Summarizing the findings of the research, which show statistically significant differences according to gender, the general trend emerges that women are more vulnerable to the use of mobile phones. In fact, women seem to recognize to a greater extent both the negative effect of the excessive use of the mobile phone, and the necessity of detoxification. On the other hand, the correlation of the variables of the effect of the excessive use of the mobile phone on health shows statistically significant differences depending on the employment status of the respondents (p -value: 0.041). Specifically, as can be seen in the diagram below (Figure 10), all of those who are unemployed state that their health is affected, pupils/students feel their health is affected at a rate of 81.5%, and employees are clearly the lowest with a rate of 75.3%.

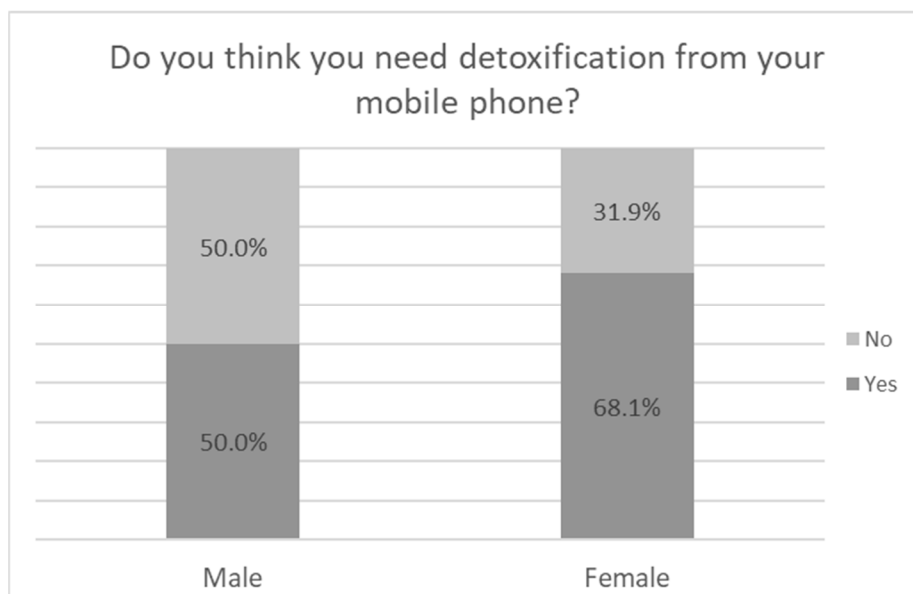


Figure 9. Need for mobile phone detoxification, responses by gender.

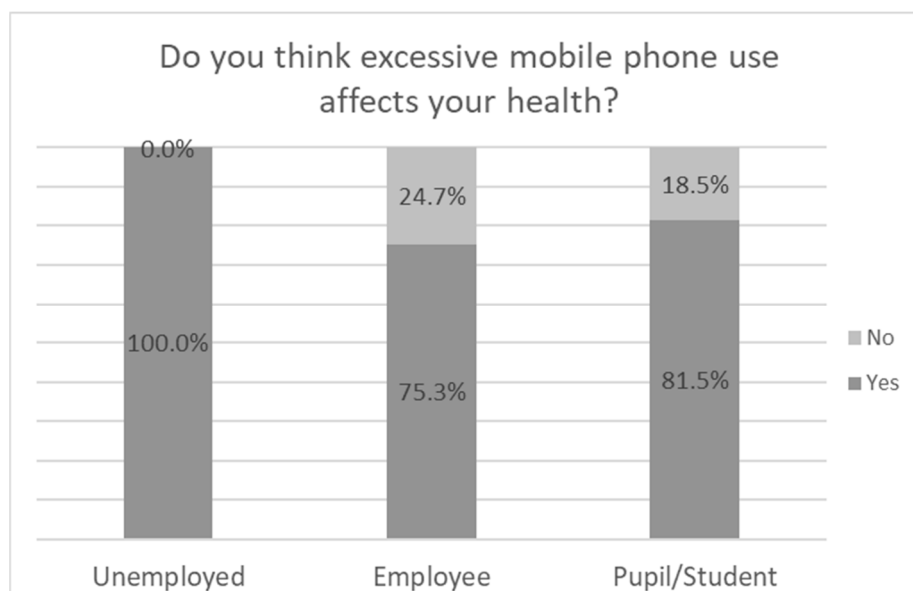


Figure 10. Impact of excessive mobile phone use on health, responses by employment status.

Additionally, the effect of excessive mobile phone use on interpersonal relationships appears to be related to respondents' employment status (*p*-value: 0.081). In particular, the unemployed state, with the highest percentage of all other groups, 83.3%, that their interpersonal relationships are affected, followed by the employed with a percentage of 71.2%, and, finally, the students with a percentage of 56.9% (Figure 11). This finding may suggest that the effect on interpersonal relationships is more important in groups of the population that have a more limited social life, such as the unemployed and secondarily employed, while contrasting groups with an intense social life, such as pupils and students, are affected to a lesser extent.

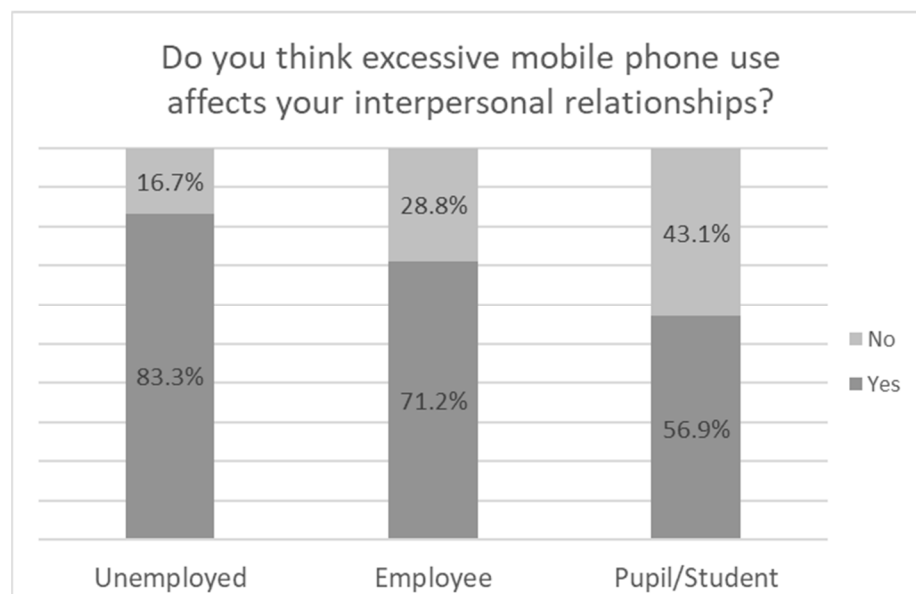


Figure 11. Effect of excessive mobile phone use on interpersonal relationships, responses by employment status.

Regarding the effect of excessive mobile phone use on the respondents' productivity, this seems to be related to the employment status of the respondents (p -value: 0.002). In particular, the highest percentage of respondents who state that they are affected are pupils/students 84.6%, followed by the unemployed with a percentage of 75.0%, and, finally, the employees with a percentage of 57.5% (Figure 12). It is possible that the recorded trend is related to the pressures that each of these groups have in their daily lives. Thus, the group of pupils/students have a great effect on their productivity, as they have the possibility of excessive use, while, on the contrary, workers who are under constant pressure are not affected as much because they do not have such possibilities.

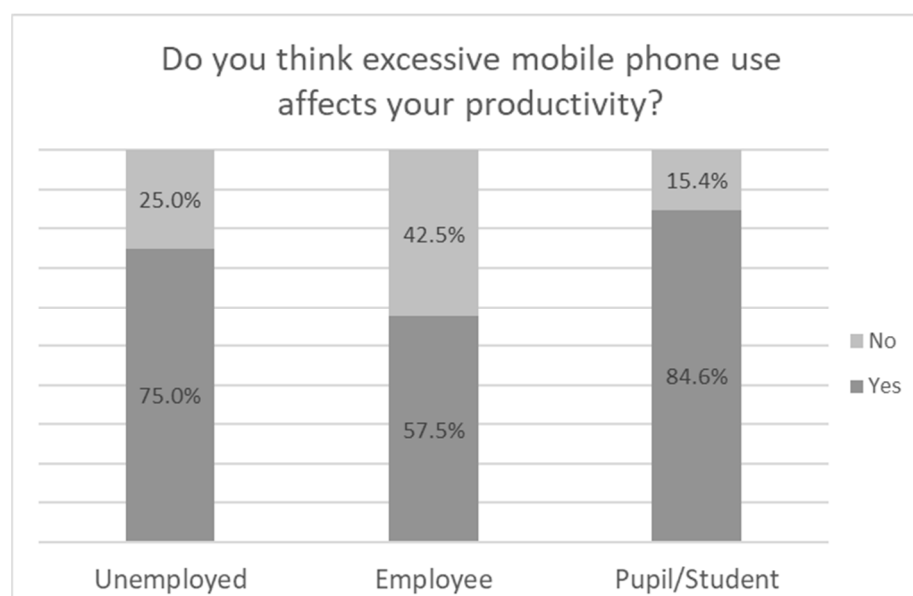


Figure 12. Impact of excessive mobile use on productivity, responses by employment status.

Next, the variables an inability to get away from the mobile phone and respondent employment status seem to be correlated (p -value: 0.011). Specifically, 53.8% of pupils/students say they cannot get off their mobile phones, followed by the unemployed

with 41.7%, and, finally, the employed with 28.8% (Figure 13). These answers may be due to the younger age of each group and also to the pressure they receive during their daily activities.

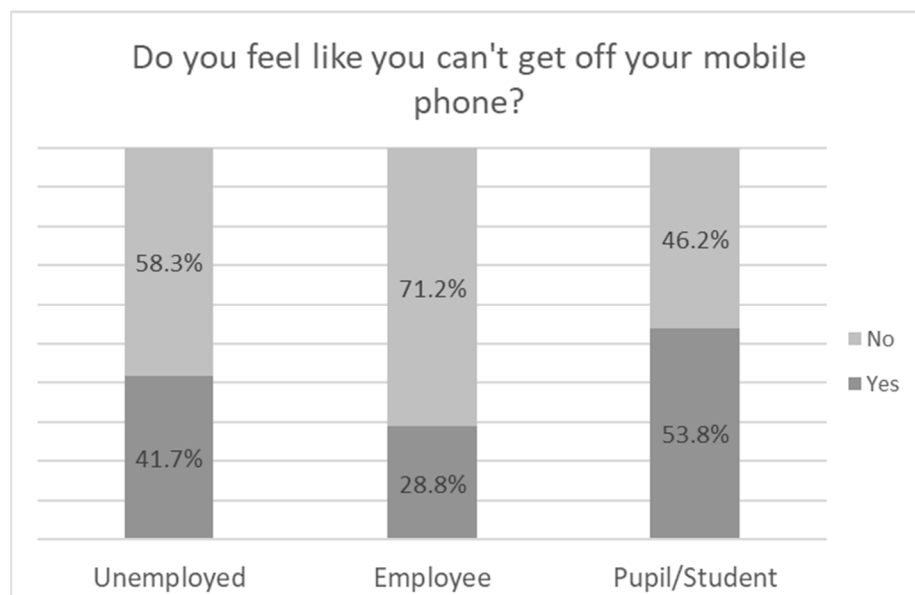


Figure 13. Inability to get off mobile phone, answers by employment status.

In addition, the variables of identifying the need to detoxify from the mobile phone and the employment status of the respondents seem to be related (p -value: 0.008). In particular, the unemployed group at a percentage of 83.3% recognizes the need for detoxification, followed by pupils/students with a percentage of 70.8%, and, finally, the employees with a smaller percentage of 49.3% (Figure 14).

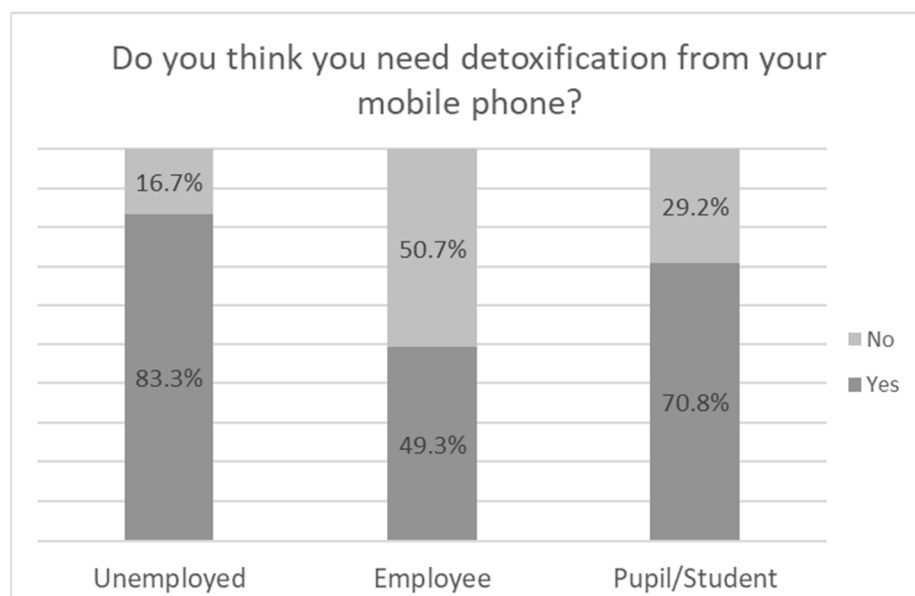


Figure 14. Need for cell phone detoxification, answers by employment status.

Thus, summarizing the research findings that note statistically significant differences depending on employment status, the general trend emerges that the group of pupils/students and, secondarily, that of the unemployed are more prone to excessive use of their mobile phone, while, on the contrary, workers are more restrained. This finding

possibly has to do with the availability of free time, where pupils/students and the unemployed have a lot of free time at their disposal, while, on the contrary, workers have little free time. At the same time, the inability to get away from the mobile phone and the hours of its use seem to be correlated (p -value < 0.001). Specifically, the respondents who state that they use their mobile phone for more than five hours, report with a percentage of 53.2% that they feel attached to their mobile phone, while, on the contrary, the corresponding percentage of respondents who use their mobile phone for up to five hours is only 7.5% (Figure 15); therefore, it is clear that the more someone uses their cell phone, the more dependent they become on it.

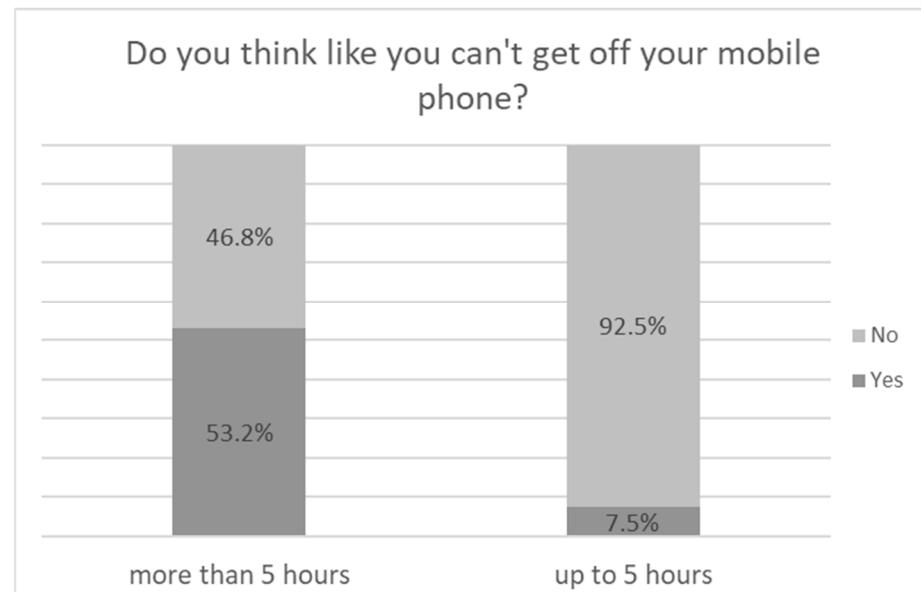


Figure 15. Inability to get away from mobile phone, responses by category of hours of mobile phone use.

A similar relationship is shown for the variables of the need to constantly use the mobile phone and the hours of its use, which seem to be correlated (p -value: 0.017). In particular, the respondents who use their mobile phone for more than five hours state with a percentage of 58.7% that they are constantly tempted to check their mobile phone if they have lost something. The corresponding percentage of respondents who use their mobile phone for up to five hours is clearly smaller, namely 35.0% (Figure 16).

Finally, the variables of the need for detoxification from the mobile phone and the hours of its use seem to be correlated (p -value < 0.001). Specifically, 72.5% of the respondents who use their mobile phone for more than five hours report that they need to detoxify from it, while, on the contrary, the corresponding percentage of those who use their mobile phone for up to five hours is only 32.5% (Figure 17).

Thus, summarizing the findings of the research that note statistically significant differences according to the hours of use of the mobile phone, the general trend emerges that the group that uses their mobile phone for more than five hours is more attached to their mobile phone and shows signs of addiction to it. Therefore, we could say that the more someone uses their mobile phone, the more addicted they become to it.

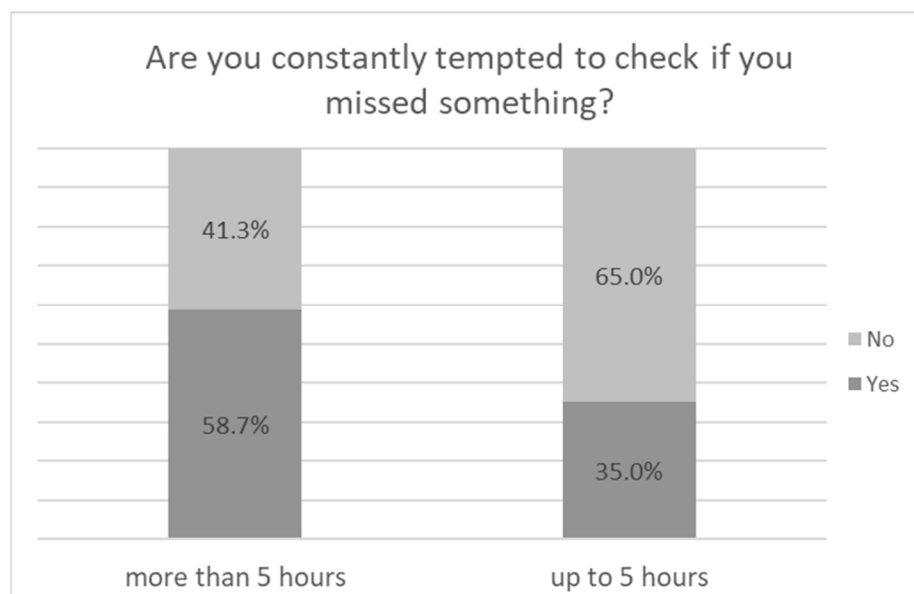


Figure 16. Need for continuous use of the mobile phone, responses by category of hours of mobile phone use.

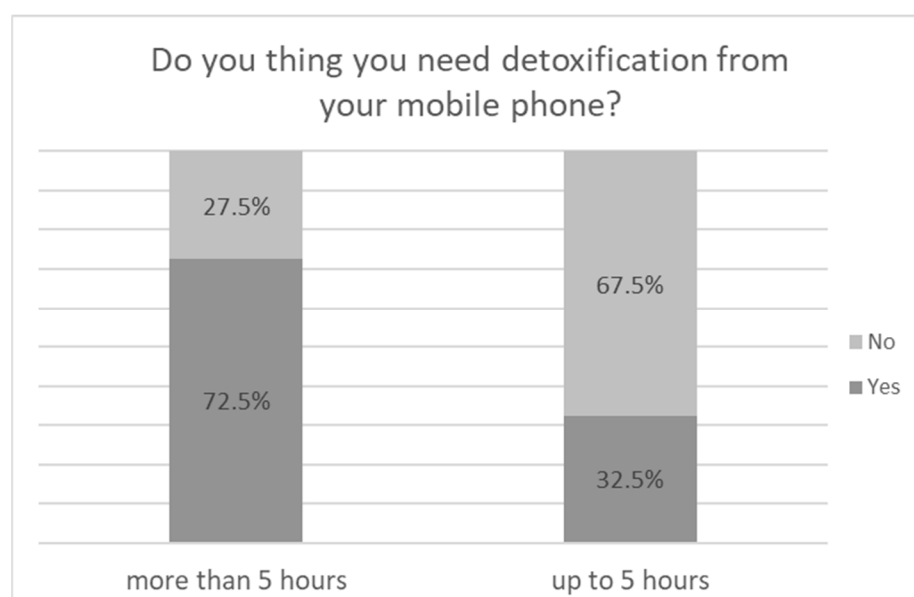


Figure 17. Need for mobile phone detoxification, responses by category of mobile phone use hours.

5. Discussion

The emergence of digital detox strategies reflects a growing recognition of the need to manage smartphone usage effectively. Recent studies [11,13] underscore the potential of digital detox in mitigating the adverse effects of excessive smartphone use, such as addiction, reduced sleep quality, and impaired well-being. This aligns with our study's findings, which highlight the prevalence of mobile phone addiction among young people aged 14–35, characterized by compulsive checking and dependency issues.

Specifically, the results of this survey provide insights into the extensive use of mobile phones among young people and its profound impact on various aspects of their lives. Our findings indicate a high prevalence of smartphone addiction, with most respondents using their phones for over five hours daily. This highlights the pervasive role of smartphones in young people's routines, fulfilling diverse purposes such as communication, social media, and entertainment. This extensive use supports our hypothesis that smartphone addiction

is prevalent among young individuals and linked to negative outcomes. The survey reveals that a significant majority of young people use their mobile phones for more than 5 h daily. This indicates a high level of integration of mobile technology into their daily routines, encompassing activities such as social media engagement, communication with peers and family, and entertainment like music and videos. A notable finding is the prevalence of mobile phone addiction among respondents. Many expressed a need for detoxification from their phones, indicating dependency issues. A significant portion also reported feeling compelled to check their phones frequently, driven by the fear of missing out on updates or notifications.

The negative impacts of smartphone addiction observed in this study—disrupted personal life, reduced productivity, strained relationships, and compromised sleep quality—align with the hypothesis that excessive smartphone use is correlated with these adverse effects. The extensive use of mobile phones is associated with several negative impacts on young people's well-being. These include disruptions in personal life, reduced productivity, strained interpersonal relationships, and compromised sleep quality. Mood disorders such as anxiety and stress were also reported by a considerable number of respondents, highlighting the psychological toll of excessive mobile phone use.

Differences based on demographic factors were also evident. Gender and employment status significantly influenced the experience and perception of smartphone addiction, supporting our second hypothesis. Residuals from the chi-square analysis further emphasize gender differences, showing that women reported significantly higher impacts on health than expected, while men reported lower impacts. Similarly, the residuals for employment status suggest that students and unemployed individuals experience more pronounced addiction symptoms and productivity issues than their employed counterparts. These findings provide deeper insights into the behavioral and demographic patterns of smartphone addiction. These findings underscore the role of demographic variables in shaping the impact of smartphone use. Differences based on gender and employment status were observed in how mobile phone use affects individuals. Women tended to perceive greater impacts on their health and exhibited more difficulty in disengaging from their phones compared to men. Students and unemployed individuals showed higher levels of addiction symptoms and reported more negative effects on productivity and interpersonal relationships compared to those who were employed.

Lastly, our findings reveal that young people view digital detox as a valuable strategy for addressing smartphone addiction, validating our hypothesis about its perceived effectiveness. Many respondents recognized the need for detoxification to restore balance and mitigate the adverse impacts of excessive smartphone use. This aligns with the growing advocacy for structured detox programs and mindful technology use as practical interventions.

Limitations of our study include a potential sampling bias due to the convenience sampling method used, which may have skewed results towards participants more willing or available to engage. Additionally, reliance on self-reported data introduces risks of social desirability bias and recall bias, impacting the accuracy and reliability of responses. The cross-sectional design limits our ability to establish causality or observe changes over time, while the study's focus on a specific age range (14–35) may overlook developmental differences within this group. Moreover, the sample's lack of diversity in socioeconomic background and geographic location reduces the generalizability of findings to broader populations.

Looking ahead, future research could benefit from longitudinal studies to track mobile phone usage patterns and their effects over time. Incorporating mixed-methods approaches would provide deeper insights into the motivations and experiences underlying mobile

phone use. Diversifying sampling strategies to include a broader range of demographics would enhance the applicability of findings across different populations. Comparative studies across age groups, cultures, or socioeconomic backgrounds would illuminate contextual factors influencing smartphone addiction and its consequences. Lastly, intervention studies focusing on promoting healthier digital habits and evaluating the effectiveness of digital detox strategies could inform policies and initiatives aimed at mitigating the negative impacts of excessive smartphone use among young people. Specifically, ensuring a more balanced representation of genders and age groups, particularly adolescents aged 14–17, would provide a clearer understanding of how smartphone addiction and digital detox strategies affect diverse populations.

6. Conclusions

The findings underscore the need for proactive measures to address the challenges posed by excessive mobile phone use among young people. Interventions should focus on promoting healthy usage habits and raising awareness about the potential risks associated with mobile phone addiction. Tailored strategies targeting vulnerable groups such as students and the unemployed are crucial to mitigate the negative effects on mental health, social interactions, and overall well-being. Future research should delve deeper into understanding the underlying causes of mobile phone addiction and explore effective interventions to foster a balanced and responsible use of technology among young individuals.

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