

PSYCHOLOGICAL AND MEDICAL SUPPORT FOR ADDICTIVE BEHAVIORS OF YOUNG PEOPLE IN EDUCATIONAL SYSTEM

SUPORTE PSICOLÓGICO E MÉDICO PARA COMPORTAMENTOS VICIANTES DE JOVENS NO SISTEMA EDUCACIONAL

APOYO PSICOLÓGICO Y MÉDICO PARA LOS COMPORTAMIENTOS ADICTIVOS DE LOS JÓVENES DEL SISTEMA EDUCATIVO

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ABSTRACT: In the prevailing era, Gaming addiction is becoming more often in society. Children from a very early age begin to get involved in cyber culture and e-sports. The problem of gambling addiction in teenagers and young people in the contemporary world is becoming increasingly current and this can be clearly seen between students in educational system. In connection with the high importance of this problem, the authors of the article conducted a comprehensive theoretical and methodological analysis of gambling addiction as a social phenomenon, as well as factors and mechanisms of emergence and development of gambling addiction among children and adolescents. Based on the results of the study, the authors of the article propose forms and methods of prevention and combating gambling addiction, in particular, the gamification method described as a tool to overcome the psychological addiction of children and adolescents in games.

KEYWORDS: Gambling addiction. Addictive behavior. Educational system. E-sports. Cyberculture. Prevention.

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RESUMO: Na era predominante, o vício em jogos está se tornando cada vez mais comum na sociedade. Desde muito cedo, as crianças começam a se envolver com a cibercultura e os e-sports. O problema da dependência do jogo em adolescentes e jovens no mundo contemporâneo está se tornando cada vez mais atual e isso pode ser visto claramente entre os alunos do sistema educacional. Em conexão com a grande importância deste problema, os autores do artigo realizaram uma análise teórica e metodológica abrangente da dependência do jogo como um fenômeno social, bem como dos fatores e mecanismos de emergência e desenvolvimento da dependência do jogo entre crianças e adolescentes. Com base nos resultados do estudo, os autores do artigo propõem formas e métodos de prevenção e combate à dependência do jogo, em particular, o método de gamificação que é descrito como uma ferramenta para superar a dependência psicológica de crianças e adolescentes em jogos.

PALAVRAS-CHAVE: Dependência do jogo. Comportamento viciante. Sistema educacional. E-sports. Cibercultura. Prevenção.

RESUMEN: En la era imperante, la adicción a los juegos se está volviendo cada vez más frecuente en la sociedad. Los niños desde muy pequeños comienzan a involucrarse en la cultura cibernética y los deportes electrónicos. El problema de la adicción al juego en adolescentes y jóvenes en el mundo contemporáneo se está volviendo cada vez más actual y esto se puede ver claramente entre los estudiantes del sistema educativo. En relación con la alta importancia de esta problemática, los autores del artículo realizaron un análisis teórico y metodológico integral de la adicción al juego como fenómeno social, así como de los factores y mecanismos de aparición y desarrollo de la adicción al juego en niños y adolescentes. A partir de los resultados del estudio, los autores del artículo proponen formas y métodos de prevención y lucha contra la adicción al juego, en particular, el método de gamificación descrito como una herramienta para superar la adicción psicológica de niños y adolescentes a los juegos.

PALABRAS CLAVE: Adicción al juego. Comportamiento adictivo. Sistema educativo. E-sports. Cibercultura. Prevención.

Introduction

From the earliest years, many educational processes began to be transferred online or into a gaming platform: on the one hand, it became easier for parents to carry out educational activities on the necessary topics, because gamification processes increase the quality of memorized information. On the other hand, not every parent knows how to provide immersion of a child in an information environment competently, which entails inharmonious relationships of children with the Internet space and gaming communities (LYZHIN *et al.*, 2021; RYZHANOVA *et al.*, 2021).

Further, if the correct comfortable environment for a teenager is not provided, this addiction can pass into adulthood, which will entail antisocial behavior, loss of social status and other problems associated with the social sphere of life. But also, if we increase the literacy of

the population on the Internet space, gaming communities, then this type of addiction can pass into a healthy attitude to games, to the Internet, which will entail a change in the stereotypes of society (DROZDIKOVA-ZARIPOVA, 2016; SIMATOVA, 2020; ASIEIEVA *et al.*, 2021).

Theoretical Analysis

Gaming Addiction Concept. Approaches to Understanding Addiction

First, gaming addiction is a psychological dependence on gaming manifestations, computer games and video games. It is important to make a distinction immediately: there is the concept of "gaming addiction", which is used to denote addictions in Russia. The 11th edition of the International Classification of Diseases, which is to come into effect from January 2022, will include the concept of "gaming disorder" - a model of gaming behavior that manifests itself in a disruption of activity and a vector shift towards gaming addictions, which destroys standard social life of a person (SNODGRASS, 2018; SALAKHOVA *et al.*, 2019).

In general, gaming addiction or disorder is still the subject of controversy among professional psychiatrists since some experts really consider it necessary to equate this type of disorder with drug addiction, alcohol addiction, and so on. The other half of the experts doubt the strong influence of cyberspace on the individual's personality and believe that gaming addiction is only part of a certain personality structure, and it occurs regardless of personality disorders.

The very understanding of "addiction" in the environment of computer games appeared exactly at the same time when computer systems emerged. Already in 1983, scientists from Louisiana State Technical University described the first manifestations of cyber addiction: then it was addiction to the popular arcade "Pac-Man" at that time. This may be associated with the mechanics of the game that encouraged people to play and play this arcade game again.

Considering the findings of various psychiatric associations, we can see different opinions on this matter (SERGEEVA *et al.*, 2020; KOSTYUNINA *et al.*, 2021).

1. American Psychiatric Association (APA). This association does not recognize addiction to computer games as a disease. It was only in 2013 that the association introduced the disorder into the Diagnostic and Statistical Manual of Mental Disorders, but only in a category that requires further study (SNODGRASS, 2018). Despite this, this association has certain criteria that can show addiction to computer games. These criteria include 9 judgments, confirming which a person is more likely to have this addiction. Researchers, in turn, criticize

this list in every possible way, calling it problematic, invalid, and unreliable research (VAN ROOIJ; KARDEFELT-WINTHER, 2017; KARPUKHIN, 2018; FROLOVA, 2020).

2. World Health Organization (WHO). At the end of 2016, WHO proposed two definitions for gaming addiction:

1. Gaming disorder;
2. Hazardous gaming.

As a result, it was the first definition that was considered for its further promotion in ICD-11, identifying certain diagnostic criteria for addiction: loss of control over the game process, higher priority towards games than real life, continuation of the game despite the occurrence of negative consequences.

However, the introduction of gaming addiction into the classification of diseases has caused huge controversy over this issue among psychologists and representatives of the gaming industry. Many researchers have pointed out that game addiction is not always a separate manifestation of addiction - it can be a state of dysphoria during other personality disorders, such as depression or anxiety.

There are several factors that influence the development of gaming addiction:

- Personal factor. This factor includes any problems associated with the instability of mental states, the lack of formation of the psyche, the lack of high-quality self-control of the individual, a few complexes associated with the realization of the person in life. The personal factor is one of the leading factors in the formation of addiction not only to computer or offline games, but in general, any type of addiction.
- Factor of mental disorders. This factor, unlike the previous one, includes deviations from the norm of the psyche development. We can include in it depressive states, anxiety manifestations and asociality (phobias, sociopathy etc.). Immersion in the game world allows such individuals to self-actualize and find their place in life without interacting with painful areas: society, the world around them, reduce anxiety during games. That is why such individuals rarely come out of the state of addiction, because with constant pastime in the gaming space, there is little time for anxiety to manifest itself and the person enters his "comfort zone", does not want to admit the problem and solve it.
- Factor of the reward system. Many addictions are formed directly from the production of the "pleasure" hormone - dopamine in the human body. This factor in cyberspace manifests itself through reward systems: playgrounds and systems give out bonuses for completing certain stages of the game, rewards. It is the expectation of such a reward that makes the player want to continue playing without stopping. The end of one game leads to anxiety about the lack of

rewards, and the player begins a new cycle of games without coming out of the state of addiction. But if we consider this factor under the prism of a neutral attitude towards games, then we can conclude that the mechanism of games itself would not become popular all over the world if it did not have its own specific mechanisms that would attract people to games.

- Factor of Internet addiction. This factor applies to multiplayer online games, arises not so much from the pleasure of the game process, but from the inability to organize and manage one's time effectively.

Having considered the factors of gaming addiction, we can also see that it does not develop at once. With a healthy component of the individual's personality, we are unlikely to be able to diagnose a real gaming disorder, because a game, in any case, is an integral part of every person's life, thanks to which we begin the process of socialization in childhood, and at a more conscious age we use it as a tool for effective learning, stress relief, or creating projects.

Now we will look at the stages of gaming addiction to understand exactly that gaming addiction is not typical of every person.

1. Preparatory stage. This stage is characterized by the initial entry into the game space. At this stage, we can see that individuals with certain personality traits have a greater propensity to immerse themselves in cyberspace. At this stage, we are not talking specifically about gaming addiction, after passing this stage, the person can go into any of the existing addictions, this stage is common and basic for many people. If such behavior is overlooked, then we can see that addiction will continue to proceed.

2. The stage of winning. At this stage, we see that a game is part of the permanent life of a person. A person is aware of himself as important and involved in a certain community, which realizes his needs and gives a sense of calmness. Also, at this stage, a person begins to understand that gaming is a kind of way to realize oneself, thanks to which one can become higher in status and acquire a new social role. In general, if at this stage a person begins to realize that this is only one of the spheres of his multifaceted life, then we will be able to see a sound, multidimensional person as a result. If the personality vector has become focused only on gaming activities with the denial of the existence of the rest of the world, we see the created illusion of a gamer's success, criticism and arguments of relatives and friends are perceived as a threat and encroachment on the person.

3. Stage of loss. The desire to be in the game becomes stronger and stronger and a person begins to invest not only with his own physical resources, but also with material ones. Lack of money becomes a source of frustration in this stage of addiction. This stage can take quite a long time, because has a cyclical nature:

- Taking money - spending it on the game – taking pleasure.
- Then this cycle makes a new start. The level of anxiety and propensity for depressive episodes increases and manifests itself more often. Abrupt mood changes take place that are associated directly with the game world.

This stage is more typical of offline games, such as casinos, cards, etc. But despite this, in some online games, a player's account is also required to be topped up to complete the game successfully. This is what is addictive.

4. Stage of despair. It is characterized by the inclusion of new types of addiction in this stage. Due to the lack of gameplay, a person may begin to abuse other prohibited substances: alcohol, drugs, psychoactive substances, and so on. These cravings make the addiction even worse. Attempts to control no longer bring satisfactory results - the person has practically lost the ability to regain self-control. Relationships with loved ones and family have a peak nature - as they continue to be addicted to gaming, they keep themselves aloof and no longer try to help with the solution of this problem.

5. The stage of hopelessness. At this stage, the addicted gamer realizes that due to his illness, all the usual joys have lost their colors. Relatives and friends lose contact with the addict. There is a realization that it is impossible to win "everything", but the player no longer has the opportunity and resources to get out of dependence on his own. Gaming continues for the sake of one goal - to experience those primary emotions, because of which the addiction began.

Combining everything that we have considered above, we can say that gaming addiction is not as an unambiguous product as it might seem. Associations and communities of psychiatrists and psychologists still cannot come to one certain solution, which indicates the difficulty in differentiating the problem as a significant one (AARSETH *et al.*, 2017; BRUN *et al.*, 2013; GRIFFITHS *et al.*, 2014; WOOD, 2008; SALAKHOVA, 2019; AGADZHANOVA, 2019; GOLOSHUMOVA *et al.*, 2019; KALININA *et al.*, 2018; BARTIENIEVA; NOZDROVA, 2021).

Gamification as a Tool to Overcome Gaming Addiction

Before we consider gamification in terms of an instrument, let us figure out what it is in general.

1. Gamification is the introduction of game elements into non-game processes. This definition is given to us by the community of gamers "Why 42".

2. Gamification is the introduction of additional game rules into an existing context, Werbach, Hunter (2012) gives such a definition in his book "Gamification and Game Thinking in Projects".

In general, it is important to understand the difference between gaming and gamification. Gaming is aimed at the pastime of the individual, at his rest, or, as we said above, to reduce anxiety and depression. Gamification, conversely, has a critically important distinction - it must have a goal. While playing any video game, we do not pursue any global goals, unless we are engaged in professional e-sports. The goals within the game are the components of a comfortable pastime during the game. Gamification should meet one's needs and teach something (HOLLANDER, WONG, 1995; LESTER, 1994; PASTERNAK, 1997; ROSENTHAL, 1992; KOSTYUNINA *et al.*, 2021). We will start by examining the main components of gamification:

1. Fun. In Russian, this component can be understood as a kind of mirth, enthusiasm, excitement from the game process. This component is required that the game process should not turn into a routine and should not lose the essence of gamification.

As an example, we can consider the process of teaching the periodic table by students in 8th grades who have just begun studying chemistry. In general, this training procedure is rather uninteresting and does not meet the requirements of the gamification model. By adding the element of Fun to the learning process, for example, "All chemical elements are the heroes of the fantasy world", we can stimulate students that this is something interesting, not standard, and not trivial.

2. Connection with reality. Any gamification, as we mentioned above, must have an end goal. Considering the table example again, our ultimate goal is to learn the periodic table. This is important to remember when building gamification in learning processes - Fun without a goal turns into an ordinary game and can again lead to the development of addictions.

3. Willingness. To play or not to play is a voluntary choice of those for whom gamification was created. If 10 out of 30 school students of the 8th grade want to learn the periodic table "in an old-fashioned way" with the help of simple memorization and repetition, we should not interfere with this process, because, returning to the second point, the main thing is to achieve the set goal, what method to use is the decision of each person, we only need to create a choice for the learners or those for whom gamification is being created.

So how can gamification help with gaming addiction? In my opinion, this structure of creating models for effective training or for the implementation of any routine tasks, for example, cleaning an apartment, can be:

1. A source of educational activities. Thanks to the understanding and spread of gamification, we make it clear to teenagers that in addition to computer games, we often gamify our whole life: "Do not step on the tile line", "Get to your destination faster than last time", etc. This will give a more expanded picture of the children's worldview and help get new experiences, in addition to sitting at the computer for hours.
2. An incentive to new activities. By the way, the creation of gaming and gamification technologies is a separate profession. In a game development company, coaching communities often require skilled people to build an effective learning model. Despite the ease of presentation, the very creation of gamification is a difficult process that requires good skill and constant learning. Preventing the development of addiction, teenagers can develop new interests or hobbies that can develop into amazing everyday work. Thus, we will be able to redirect the resources and interests of teenagers into a really stimulating, meaningful activity.
3. A learning tool. Thanks to gamification, many children will be able to look at the learning process at school in a different way. Potential problems with their learning will be solved only if they start learning the most difficult topics in any subject in a new way.

In general, these criteria are sufficient to gain some insight at the initial stage into how gamification can raise awareness of gaming addiction to a new level. In this case, the thesis may be suitable that it is not necessary to eradicate all types of games and prohibit the ubiquitous game, but only to give it a different direction of development and show new "shoots" of this process (CARLTON; MANOWITZ, 1992; LESIEUR; BLUME, 1991; MURRAY, 1993; SPECKER *et al.*, 1995; STAROVEROVA; ZAKHAROVA, 2018).

Results and Discussion

First, it is necessary to fight addiction in teenagers comprehensively. A simple one-time dialogue may not be enough to stop the manifestations of addiction. Of course, one should take account of each teenager's specific personality who the activities to fight addiction will be directly focused on.

1. Activities with parents. The first steps of prevention should come from the institution of the family, because most addictions, including gaming, begin to manifest themselves when contact with the next of kin is broken.

Parents should support their child, ask why he (she) is so attracted to computer games, because it may turn out that in fact the problem is insignificant. Also, when the support is given, the child will begin to step into more positive contact with their parents and trust can be restored.

One should not definitely criticize the child for playing, this can worsen the situation and become an additional incentive for building addiction. Criticism can be understood by a teenager as a lack of understanding of interests on the part of parents, which will aggravate isolation and closeness, and may even cause aggressive behavioral tendencies towards the parents.

Of course, the main preventive measure is the correct upbringing of the child from the very beginning, at the first stages. At the same time, it is important not to impose strict prohibitions, but in an adult way to explain the reasons for the undesirability of a strong passion for computer games. Any prohibition leads to the teenager's desire to try what is inadmissible, and any questions about this from the child will not be asked, because the parent will indicate a taboo position on this issue.

It is important to remember that teenagers are such an age group when they want to stand out with something unique, but at the same time not to differ from the main team or community which they are in. It is possible that the child needs to be given the opportunity to express himself by talking about the variety of methods and ways of self-realization.

Parents are often a perfect example for their own children, so introspection and self-analysis are an important preventive measure. Consider your own daily activities and think if you are addicted to tobacco, alcohol? Also, do not be afraid to accept your mistakes and talk about it to a child, and especially a teenager, openly - sincerity with children is the main key to creating trusting relationships and eliminating gaming addiction.

2. Addressing mental and physiological state. When preventing addiction, it is important not to forget about the mental and physiological state of a teenager. Instilling healthy lifestyle habits, mental hygiene from an early age, as well as sticking to them during adolescence, is a good way to prevent the probability of addiction. In case of its manifestation, these methods will help to reduce psychological resistance during therapy.

It is also important to consider that in the teen years, gaming addiction represents a group nature. This helps the teenager to feel that he belongs to the reference group, to show leadership qualities. The manipulative nature of games by teenagers is not yet realized, which does not allow them to identify the state of addiction.

When carrying out preventive measures of teenagers' gaming addiction, it is important to take account of the fact that for its effective action it is best to use such a form of presentation of information as storytelling (life stories with a motivational chain of thought development) and an emphasis on emotional response. When demonstrating the negative consequences of gaming addiction, it is best to remain non-judgmental in the presentation (MILLS *et al.*, 2017).

In addition to targeted measures, it is important to regularly conduct socio-psychological and educational training sessions for teenagers, in which, in a game format, they will be able to realize the importance of life without addiction to the computer space. During these training sessions, develop a more complete understanding of the gaming world and give a clear understanding that normally there are no dire consequences in games as such - it is important for teenagers to understand that addiction is not a taboo subject.

Let us not forget about individual counseling, which can help to solve the specific problems of individuals with already developed gaming addiction.

Conclusions

In a nutshell, the primary purpose of the study was to analyze the psychological and pedagogical support of addictive behavior of young people in the contemporary world. To meet that aim, the authors utilized descriptive and data gathering methods.

Based on the results obtained, it can be concluded that prevention of gaming addiction is a large complex measure that must be undertaken not only towards teenagers, but also in relation to children of primary school age, adults. Despite the lack of study of this phenomenon and the constant debates over whether this is the norm or a deviation, we cannot exclude that the problem exists in any case - an increasing percentage of teenagers are becoming addicted to gaming too much.

It is important not to forget that there is nothing incorrigible and any problem of this nature has the possibility of remission, restoration of a person as personality and redirecting energy to a socially acceptable channel of activity.

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