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Cognitive-Behavioral Therapy for Gambling Addiction

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Abstract

This chapter contains a brief history of gambling and a brief description of gambling disorders, followed by the risks that this behavior would become compulsive and the negative consequences that the gambler and the members of this family would experience. Thereafter, the psychological characteristics of the compulsive gambler will be specified, as results from the recent international researches, and we will also describe the psychological profile of the Romanian compulsive gambler. Next, we will approach the various methods of treatment of gambling addiction, focusing on the forms of psychotherapy that proved to be effective in treating this mental disorder, and listing of certain studies that have demonstrated their effectiveness.

Keywords: gambling disorders, cognitive-behavioral therapy, treatment

1. Introduction

Gambling has been around since the oldest times, as the desire to win, to gain welfare and prestige by taking risks continuously is an instinctual force, which continues to exist in the human gene. People used to gamble dices even 6000 years ago, in today's in China, as attested by archeological evidence [1].

There has been, throughout history, a plethora of personalities of different times preoccupied with gambling: Roman Emperors Nero and Claudius were recognized as great gamblers, while Lord Halifax, Marie Antoinette, the Duke of Wellington, and Dostoyevsky could belong in the modern definition of a compulsive gambler [2].

Research in the field shows us the fact that in the Unites States of America, approximately 85% of the adult population has participated at least once in their lifetime in a game of chance [3]; in Canada, a percentage of 63.3% of the adult population has gambled at least once during the year 2005, without developing addiction problems [4]; in Norway, more than 80% of the



adult population has participated in a game of chance, out of whom, approximately 40% have gambled at least once a week.

When a person is gambling more and more and is allocating more and more money to gambling to the detriment of other daily activities, a compulsive disorder may be seen as emerging and developing, which risks becoming a gambling disorder. The consequences of compulsive gambling are many, ranging from financial problems to intensified or prolonged stress, from dismantled families to lost fortunes, academic abandonment, and more. It is becoming more and more important that the young population especially, but also the rest of the population seen entering casinos on an increasing larger scale, should understand what it means to gamble responsibly and how to avoid the slippery slope to gambling disorder [5].

2. Factors involved in the development and maintenance of gambling disorder

Raylu and Oei [6] consider that there are three categories of factors that can contribute to the emergence and development of gambling disorder: family-related factors, individual factors, and sociological factors.

In terms of **family factors**, specialized studies in the field have demonstrated that both parental models of behavior and genetic factors represent for any gambler at the risk to develop a compulsive gambling behavior [7–8].

Individual factors are involved in the emergence and maintenance of the gambling disorder and they include the gamblers' personality traits (especially impulsivity and sensation-seeking), his/her cognitions (the ability to influence or predict gain), negative emotional states (depression, anxiety or stress), and biological factors (frontal lobe deficits, neurotransmitter malfunctions, and changes in the functioning of the brain's reward system).

Sociological factors which are tied to the emergence of gambling disorder refer to the existence of a socio-economic status of the gamblers, unemployment, and a lower education level.

3. Consequences of gambling disorder

The practice of excessive gambling has negative consequences on the gamblers as well as on the society per se, starting with poverty, family dismantling, and illegal behavior in terms of obtaining the necessary money gamble. The main consequences of gambling disorders are the following [9]:

- Professional problems: job loss, compromising one's career due to the preoccupation on gambling, which is the cause for the loss of one's efficiency at work and the rising levels of absenteeism;
- Problems with one's family, friends: the compulsive gambler hides the truth about this addiction which rules over him/her, he/she abuses the family or neglects his/her familial responsibilities;

- Financial problems: one borrows, sells goods, and builds up debt in order to finance this addiction;
- Legal problems: deceits, forgeries, thefts;
- Stress-related afflictions: insomnia, nervousness, depression, anxiety, culminating in suicide attempts.

Studies conducted by Blaszczynsky [10] have revealed that gambling disorder determines the following negative effects on gamblers: depression, suicidal thoughts, anxiety, alcohol and drug consumption, difficulties in keeping a work-place, lies and deceits, the decrease of cognitive performance, and physical symptoms.

4. The prevalence of gambling disorder

Between 1997 and 2007, Muňoz-Molina performed an extensive study on the prevalence of gambling disorder, and he found that it is situated between 0.6% in Norway [11] and 7.6% in USA [12] among the adults, while the prevalence for teenagers is at approximately the same high level, respectively 0.8% in Switzerland [13] and USA [14].

Disley et al. [15] specified the fact that there are certain categories of the population upon which there have not been studies on the prevalence on the gambling addiction, namely incarcerated people, homeless people, and active military officials.

Gambling disorder is defined by the DSM-5 Diagnostic Criteria [16] as a "Persistent and recurrent problematic gambling behavior leading to clinically significant impairment or distress, as indicated by the individual exhibiting four (or more) of the following in a 12-month period:

- 1. Needs to gamble with increasing amounts of money in order to achieve the desired excitement.
- 2. Is restless or irritable when attempting to cut down or stop gambling.
- 3. Has made repeated unsuccessful efforts to control, cut back, or stop gambling.
- 4. Is often preoccupied with gambling (e.g., having persistent thoughts of reliving past gambling experiences, handicapping or planning the next venture, thinking of ways to get money with which to gamble).
- **5.** Often gambles when feeling distressed (e.g., helpless, guilty, anxious, depressed).
- **6.** After losing money gambling, often returns another day to get even.
- 7. Lies to conceal the extent of involvement with gambling.
- 8. Has jeopardized or lost a significant relationship, job, or educational or career opportunity because of gambling.
- 9. Relies on others to provide money to relieve desperate financial situations caused by gambling."

In an explorative study carried out by Fernandez-Montalvo and Echeburua [17], the following personality profile of the compulsive gamblers is depicted: they are impulsive, present the slight symptoms of depression and anxiety, and have the tendency to consume alcohol in an abusive manner and to experience difficulty adjusting to daily life; a percentage of 16% fulfills the criteria for a diagnosis of the borderline personality disorder, followed by antisocial behavior, narcissism, and paranoia.

5. Screening

In terms of diagnosing gambling disorder, there are multiple instruments utilized, such as South Oaks Gambling Screen (SOGS); Massachusetts Gambling Screen (MAGS); Gamblers Anonymous 20 Questionnaire; The Problem Gambling Severity Index-PGSI; The Inventory of Gambling Situations (IGS); The Gambling Related Cognition Scale; The Composite International Diagnostic Interview (CIDI); and The Structured Clinical Interview.

South Oaks Gambling Screen (SOGS) was developed by Lesieur and Blume [18], and it contains 20 items which correlate with the criteria of the diagnostic for the pathological gambling from DSM-IV; the advantage of SOGS is the ease with which it is administered and the way of scoring, as well as the fact that proved useful with diagnosing the pathological gambling for both teenagers and adults.

Massachusetts Gambling Screen (MAGS) [19] is an easily administrable and markable questionnaire that can be used for both teenagers and adults, and it utilizes the criteria of DSM IV for the diagnosis of the pathological gambling; a score of minimum 5 permits the adjustment in the pathological game of chance.

Gamblers Anonymous 20 Questionnaire [20] is a more extensive questionnaire with 20 questions, which the gamblers can self-manage in order to establish whether they possess an addiction problem or not.

The Problem Gambling Severity Index (PGSI) [21] represents an instrument which comprises a number of nine items with whose help any person can self-evaluate the severity of their pathological gambling.

The Inventory of Gambling Situations (IGS) [22] represents an identifying instrument identify for the situations, where a person presents a risk of compulsive gambling and comprises a number of 63 items, which represent just as many possible situations in which someone could gamble excessively.

The Gambling Related Cognition Scale [7] is a questionnaire with 23 items, which help the participant to self-evaluate their irrational beliefs related to games of chance, and the items are divided in five subsections: interpretative biases referring to the capacity of controlling the game; the illusion of control; the prediction of control; nonrealistic expectations tied to gambling; and the inability to stop gambling.

6. Treating gambling disorder

Gambling disorder is best described as being a syndrome, and from this perspective, the most efficient treatment reflects a multimodal approach, which bases itself upon a personalized and complex treatment plan. Multidimensional treatments thus include different combinations of therapeutic, financial, and educational counseling, as well as self-help, psychotherapy, and psychopharmacology in the case of intervention.

There is a wide range of treatment programs for compulsive gambling, based on the specific professional expertise of the therapist and the existing therapeutic resources. Primary medical care programs tend to offer more screening, short-term pharmacological treatment, and guidance for follow-up counseling.

The problems faced by specialists when starting treatment with compulsive gamblers mainly relate to the fact that they deny that they have an addiction problem, they are not informed on the fact that there are qualified professionals in this field, they are fearful of the fact that they could be stigmatized, often they do not want to give up gambling, their partner does now want to get involved, and their family is not supportive.

The treatment for the gambling disorder shares many similarities with the treatment for drug addiction, and it involves the development and techniques and measures to cope with the phenomenology of craving that characterizes any addiction and has a neurophysiological substrate. In drug and alcohol addiction and even in gambling disorder, we find the following aspects [23]:

- An increased desire to gamble (or to ingest substances);
- Denial of the severity of the problem by the addict;
- Problems in family relations;
- A high rate of relapse;
- Loss of control;
- Lying, to cover these activities;
- The increased preoccupation with these activities;
- Progressive psychological disorder;
- Development of tolerance.

Until the present day, there have been relatively few studies on checking the efficiency of the different forms of treatment for gambling disorder [24–26, 6–7, 27].

Pharmacological treatment has some promising results in ameliorating some comorbidities, such as impulsivity and mood disorders, but the results of the efficiency studies for this type

of treatment are limited due to the fact that there were smaller lots of people used, high dropout rates recorded, and big variations in terms of the placebo effect [28–30].

Psychological treatment for gambling disorder includes numerous approaches, such as psychodynamic therapy and analytic therapy [31], multimodal therapy, the Gamblers Anonymous group [20], the motivational interview [32], online counseling [33], behavioral therapy [34], and cognitive-behavioral therapy [6, 15, 23, 24, 35–37].

Chambles and Ollendick [38] have analyzed the efficiency of various approaches to treat gambling disorder; based on the scientifically validated evidence and the research that has been carried out, following classification has been established:

- Cognitive-behavioral therapy together with behavioral therapy represents the most efficient forms of scientifically validated treatment;
- Relapse prevention techniques have shown moderate efficiency;
- Psychodynamic therapy, aversive therapy, auto exclusion, and the Gamblers Anonymous groups present a reduced efficiency in treating this pathology.

Gooding and Tarrier [26] have studied the efficiency of the cognitive-behavioral therapy by examining 25 studies carried out by several experts in the field in USA, Canada, Spain, and Australia, targeting the reduction of gambling disorder; based on their meta-review, the mentioned authors presented the following conclusions:

- There is conclusive evidence according to which cognitive-behavioral therapy creates visible improvements in the gambler's behavior, and these are maintained at the follow-up evaluation conducted 3 months posttreatment;
- The improvements were maintained after 6 months and 12 months of finishing treatment, but these results will be interpreted with caution, due to the reduced number of participants at the long-term re-evaluation meetings and the small number of studies carried out in this way;
- Both group therapy and individual therapy are efficient in the follow-up evaluation which takes place 3 months after finishing treatment, but at the 6 month evaluation, the effects of the groups therapy are better maintained;
- Authors mention the fact that it is possible that cognitive-behavioral therapy has no direct effect on game behavior; however, its effect relates to reducing symptoms of depression and anxiety, which will then influence in their turn the improvement of game behavior.

Given that most of the studies carried out so far have investigated the efficiency of the treatment of compulsive gambling only in relation to the specific type of therapy that was used in the treatment process, one must also acknowledge that there are a number of nonspecific factors which can contribute to the success of the treatment: extra-therapeutic attributes which the subject presents at the moment of treatment (level of education and family support); the therapist's qualities (empathy, warmth, understanding, and acceptance of the subject); and the subject's expectations, his/her hopes in terms of the results of the treatment [39].

Cognitive-behavioral therapy is currently considered the most efficient method of treatment for gambling disorder; this type of therapy postulates the fact that the irrational thoughts tied to the ability of a person to control the game and predict the win represent the main factors which determine the development and the maintenance of this pathology [39–45].

The literature on the topics includes more models of cognitive-behavioral therapy for the gambling disorder [6, 10, 15, 36, 46-49]; self-help books can determine the improvement of the compulsive behavior according to the studies conducted by Apodaca and Miller [50] and Hodgins et al. [32].

Petry and his associates [51] conducted a comparative study on a lot of 231 compulsive gamblers which they split into three groups: the first group was treated using the Gamblers Anonymous method, the second group using GA combined with the help of the cognitivebehavioral therapy guiding exercises, and the third group participated at the GA groups plus eight individual sessions of CBT. They found improvements in 59% of the participants that benefited from CBT, 39.2% of the participants who completed the exercises from the CBT books, and 34% of the participants who only took part in the GA groups.

Ladouceur and others [52] proposed a model of therapy for treating the gambling disorder which comprises the following five steps:

- Informing in terms of the general aspects of the game;
- Modifying the irrational beliefs of the gambler with how the activities in gambling are carried out;
- The development of new coping abilities and problem-solving;
- Acquiring social abilities;
- Learning some relapse prevention techniques.

Petry [36] proposes a protocol of cognitive-behavioral therapy group therapy which lasts eight sessions, with a weekly frequency; the session's homework within which the protocol is the following:

- General information, presenting the reward system for game abstinence and identifying those factors those factors that contribute to the urge to play;
- The functional analysis of the gambling behavior;
- The increasing frequency of pleasant activities;
- The auto-management plan;
- Coping with the urge to gamble;
- Training for assertiveness and the ability to refuse the game;
- Changing irrational thoughts;
- Planning for emergencies and preventing relapse.

Ledgerwood and Petry [53] proposed a model where the main components refer to the restructuring of the gambler's medium in a way that it is less conductive to pathological gambling; the patients are initially taught to identify their irrational thoughts connected to the game of chance, about the game of chance, to understand the connection between these thoughts and their pathological game behavior, and to identify new coping methods.

Raylu and Oei [6] proposed a model of cognitive-behavioral therapy that contains four steps:

- Evaluating the problems and needs with which the client is confronted, his/her education and motives with the purpose of changing dysfunctional behaviors, while using motivational interview techniques;
- Familiarizing the gambler with the fundamental strategies of the cognitive-behavioral therapy used with the purpose of stabilizing his/her compulsive gambling behavior and minimizing the negative effects in case of a relapse;
- Learning some coping methods in terms of maintenance the positive changes in game behavior;
- Learning of maintenance strategies of the therapeutic wins obtained and preventing relapse.

Blaszczynsky [10] introduced a complete self-help program for compulsive gamblers which comprises the following steps:

- Increasing the motivation to stop the game;
- Monitoring gambling behavior;
- Controlling the impulse to gamble by following relaxation techniques;
- Identifying irrational thoughts and replacing them with other rationalities;
- Preventing relapse;
- Learning new ways of getting family support.

Wulfert, Blanchard, and Martell [54] used for the treatment for gambling disorder an alternative of cognitive-behavioral therapy which comprises techniques of the motivational interview, cognitive-behavioral therapy, and techniques for relapse prevention, while Miller and Rollnick [55] proposed a model of raising motivation where the key concepts are the following: raising the motivation of the client is essential in observing the product of change; motivation is a dynamic feature; and motivation is influenced by external factors, including the behavior and attitude of the counselor.

The advantages of cognitive-behavioral therapy refers to the fact that it is a well-structured type of therapy, it is carried out on a limited period of time, it requires limited costs compared to the other types of therapy, and it produces long-term benefits and supposedly the fall off the risk of relapse [6, 15, 36, 43]. Success rates of this type of therapy for gambling disorder within the studies that have been carried out so far have ranged from 36% [25] to 42% [56]; to 72% [57]; to 77% [40]; to 49% [36]; and 74% [43].

The treatment of gambling disorder poses many problems, first of all, because pathological gambling has been only recently recognized as a disorder in its own right, not enough

research has been done and there is a lack of professionals trained in offering psychological and psychiatric services in this field.

We have introduced a model of cognitive-behavioral therapy for gambling addiction in Romania, based mainly on cognitive restructuring techniques, with the following fundamental objectives:

- Reducing the consequences of gambling disorders which interfere in the everyday functioning of gamblers;
- Avoiding or reducing the risk of developing a gambling addiction behavior;
- Managing the negative emotionality associated with this disorder (depression, anxiety, stress);
- Satisfying the need for entertainment and developing new and pleasant recreational and social activities, which do not pose the risk of having a destructive impact on the lives of the subjects.

The model includes several stages, namely assessment and formulation, psycho-education and introduction to the ABCDE model, cognitive restructuring, problem-solving training, assertiveness skills training, and relapse prevention.

During the clinical assessment stage, we look at client engagement in the therapeutic process by increasing his motivation to change his gambling behavior and we clarify the following aspects [47]:

- The origin of the client's pathological gambling problems;
- Etiological and maintenance factors;
- The degree to which the subjects have reached out for psychological support and the efficiency of the support they have received;
- Whether they have reached out for treatment out of their personal initiative or at the their friends' bidding;
- How they heard about our specialized psychological services;
- In case they have not reached out for psychological support, the reasons why not.

We will adopt an attitude of acceptance toward the subjects and their gambling experience, using techniques such as active listening, reflection, nonverbal communication (maintaining visual contact, open body posture, nonevaluative facial expression, consistency of tone etc.), and verbal communication (the meaning of what is said).

Case example:

John is 32 years old, he is married and has been gambling electronic roulette and poker machines since he was 18; his parents are divorced and his father told John that he had been an unwanted child, whose birth had been a mistake and with whom he wishes to have no relation whatsoever. John faced economic hardships his entire childhood and he remembers being the poorest child at his school.

When he got married, he vowed that his family would never suffer from poverty, but the company he started is not doing well and he believes that only his gambling activities will help them escape poverty.

Because he is not able to support his wife financially, he experiences profound sadness, disappointment and discouragement.

"She thinks I'm so stupid, I can't do anything right, I'm embrassed to see myself through her eyes. I think she's very disappointed in me and maybe she is already thinking of ending our marriage; if she leaves me, what reason do I have for living? The thought of suicide has crossed my mind, but then I started thinking: am I really such a coward? My family needs me, but they need me to be a strong and normal person, not the kind of person I am right now. I usually play the victim: I think of myself as lazy, I have time management issues, I fall into a trance for long periods of time, I have negative thoughts".

For John, gambling is an escape. At the casino, he puts all his problems behind him and cuts himself off from the world.

In the case formulation, we will focus on the experiences, cognitions, emotions, and behavior of each client; the case formulation will help the client understand the factors that led to the development and maintenance of their compulsive gambling [58].

In the following stage, we will teach the client the ABCDE model designed by Albert Ellis [59] and we will familiarize him with the basic principles of cognitive-behavioral therapy [1]:

- Psychological issues represent learned maladaptive responses, supported by irrational cognitions;
- Dysfunctional thinking results from genetic and environmental factors;
- Modifying irrational beliefs is the best way to reduce maladaptive behaviors;
- Dysfunctional cognitions can be identified and replaced, which takes effort and perseverance on the part of the subject.

The goal of cognitive restructuring is to interrupt the vicious cycle of compulsive gambling and to help the subject have control over his behavior. The main irrational cognitions that pertain to gambling disorder can be classified in three groups [6]:

- Illusion of control of gambling, which can take three forms: active illusionary control (the
 belief that he can directly control his gambling outcomes); passive illusionary control (the
 belief that he may indirectly have control in determining whether he wins or loses only
 when he feels lucky), or magnifying his own gambling skills and minimizing other gamblers' skills;
- Predictive control, which involves the belief that the gambler has the skill of making accurate predictions;
- Interpretive biases, which involve reframing gambling outcomes in such a way that encourages continued gambling despite of heavy losses: gambler's fallacy, chasing, selective memory, reframed losses internal or external attributions.

A study carried out in Romania from 2010 to 2012, involving 119 compulsive gamblers with an average age of 29.86 years, identified the following irrational cognitions about gambling, cognitions that play a central role in the development and maintenance of the gambling behavior [43].

Case example:

Gambling makes me happy.

My skillfulness and abilities make me continue to gamble.

When I am gambling, life seems better.

Losing makes me gain experience so I can become a better gambler.

When I am gambling, the future looks brighter.

If I win once, I am bound to win again.

Gambling makes me feel less agitated or stressed out.

The memory of winning makes me want to gamble again.

To a certain extent, I can predict my next win.

The participants had a 70.58% co-occurring addiction, alongside gambling disorders, as follows: 50% of the participants engage in excessive alcohol consumption; 41.20% are heavy smokers; 16.8% engage in occasional drug use [43].

Case example:

Given that, whenever he goes to a casino, John is certain he will win a substantial sum of money that will get him out of poverty, I asked him where exactly such a huge win could come from, seeing how the casino where he gambles is basically just a small hall, in which approximately 10 gamblers try their luck.

"That's easy. If there are ten gamblers who hope to win, just like I do, I will outsmart them all and I'll get their money. Then I'll be able to have a flourishing financial situation that will enable me not to be poor again, my wife will love me again, just like she did when we first met. Also, when I gamble, life seems more beautiful and I only gamble when I feel I'm lucky and I'm on the verge of winning. When I lose, I get really mad, I yell at everybody, I turn into a monster."

During the cognitive restructuring phase, we focus on changing gambling behaviors by correcting irrational beliefs, cognitions and dysfunctional attitudes about gambling, as seen in **Table 1** [58].

Therefore, we will help the subject dispute each irrational belief we identify using the following type of questions [60]:

- What effect does this belief have on me? Does it help me or not?
- What evidence is there that this belief is actually true?
- Is my belief logical and does it reflect reality?

- What is another way of thinking?
- What must I do to change this belief?

Following the disputation process, we will help the subject replace his irrational beliefs with a different set of beliefs, which will be rational and will reflect reality, such as [47]:

- Winning happens because of sheer chance and not because of the gambler's abilities;
- We do not have the power to influence if or how much we win by gambling slot machines, as this is pre-determined by a computer system;
- Future wins will never be influenced by previous wins or losses;
- Slot machines are set up in such a way that what you win will always be less than what you spend;
- The machines are set up to continue playing, despite losses;
- You are not more valuable as a human being if you win and you are not less valuable as a human being if you lose when you gamble.

The following is an example of an irrational belief: "on a certain extent, I can predict my next win". As a result of the disputation process, the compulsive gambler's irrational beliefs will be replaced by rational beliefs, which will reflect reality and will help him manage his gambling behaviors.

After the cognitive restructuring process, we will suggest to the gambler that he creates a list of alternative activities to replace his gambling behavior and as well as a schedule of daily activities which should leave him no spare time to gamble or identify the triggers for his gambling behavior. Studies have shown that involving compulsive gamblers in a large number of activities to fill up their spare time significantly reduces the risk of a relapse.

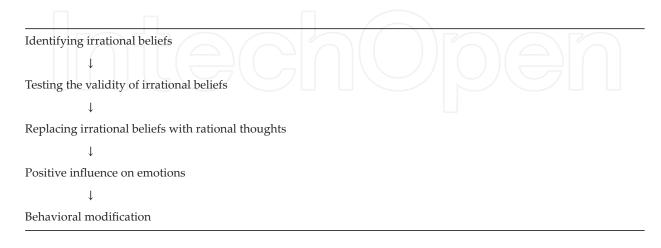


Table 1. The cognitive restructuring process.

Preventing relapses is a psychoeducational approach targeting behavioral change, through which the gambler learns to identify and overcome risk situations that could make him return to his old compulsive gambling behavior [39].

Creating a decisional balance sheet for when he feels the urge to gamble again will help the subject to make the right decision about gambling. The decisional balance sheet is a technique which consists in creating a list of pros and cons of a certain behavior, as they appear to the subject at that particular moment in time. With the help of this balance sheet, the subject will weigh the long-term and short-term advantages and disadvantages of his gambling behavior, and based on the weight he gives to each advantage and disadvantage, he will make the decision to either cease or to continue to gamble, taking on the full responsibility for the consequences of his actions.

Case example:

John's decisional balance sheet includes the possibility of winning a lot of money, satisfying a momentary urge and forgetting about his troubles at home among the advantages of continuing to gamble. Among the disadvantages he includes losing large sums of money, addiction, wasting his time, neglecting his responsibilities, negative emotional states, heavy smoking while gambling, a permanent state of restlessness.

Depending on each gambler's specific circumstances, we will continue the process of cognitive restructuring with the goal of treating any potential depression and anxiety disorders, given that the negative emotionality underlying depression and anxiety play an important role in triggering as well as maintaining the gambling addiction [61-64]. The key irrational cognitions that generate negative emotional states are the following:

- Absolutist demands: the absolute "must";
- Catastrophizing: it is terrible/horrible;
- Intolerance to frustration: I cannot stand;
- Global evaluation: I am terrible; the others are terrible;
- Unconscious associations between the activating event (A) and the consequences (C).

During the process of cognitive restructuring, these cognitions will be replaced by rational alternatives:

- Nondogmatic preferences: I may want something, but I do not have to absolutely have it;
- Evaluation as unpleasantness: it is unpleasant;
- Tolerance to frustration: I do not like it, but I can put up with it;
- Avoiding global evaluation: I am human and I can make mistakes sometimes.

Raylu and Oei [6] suggest using the following cognitive techniques when fighting the urge to gamble:

- Picture the negative consequences of the gambling;
- Redirect your focus from the urge to gamble to other external events, by using the STOP technique: as soon as you feel the urge to gamble, clearly tell yourself STOP in a silent voice, without saying it out loud, and focus on something else;
- Identify your irrational beliefs about gambling, dispute them, and then replace them with rational beliefs.

Specialists in the field of gambling disorder recommend regularly practicing guided imagery in a state of relaxation as a way of dealing with the urge to gamble [6, 10, 65]. The rationale for using relaxation techniques has to do with the fact that gambling disorders are caused or exacerbated by feelings of stress and anxiety, given that stress plays an important role in the development and maintenance of this pathology [37, 66].

At the end of the therapeutic process, we will support the gambler in his efforts to adopt a well-balanced life style, by establishing the following intervention objectives:

- Overall improvement of coping strategies;
- Applying the aforementioned coping strategies in a wider context;
- Improving stress management.

Case example:

John has established the following objectives for himself:

- Make a change in myself;
- Learn English;
- Lose weight;
- Take concrete actions to change for the better, without waiting for God to work a miracle in my life;
- Quit smoking;
- Put more effort into managing my company so that it yields a reasonable profit;
- Be a different John.

Dryden and Matweychuk believe that the maintenance of benefits that result from treatment requires developing coping skills with regard to risk situations and future temptations, insofar as addictive behavior relapse is concerned; the authors provide the following recommendations [67]:

• Develop several healthy convictions, such as give up the habit of pleasing others and put yourself first and the others second;

- Create (or develop) several social interests: understand that the people around you have their own wishes and goals in life, and they cannot always offer you their unconditional support, you must also think of how you can support them and be there for them when they need you;
- Learn how to take control of your life; do not let your addictive behavior control your life;
- Develop a heightened tolerance to frustration so that you can achieve the goals you set for yourself;
- Be flexible so that you can cope with the next challenges in your life;
- Learn to accept uncertainty, because we live in a world of probabilities, in which nothing is absolutely certain;
- Develop your creativity so that you can find new ways of spending your time;
- Think logically, establish short- and long-term goals, and think about the possible consequences of your actions;
- Learn to accept yourself unconditionally, without making global evaluations about who you are as a person;
- Take on only limited risks in order to increase your chances of achieving the goals you have set for yourself;
- Embrace a philosophy of long-term hedonism, striking a balance between immediate gratification and long-term gratification;
- Assume the responsibility of your own negative emotions, without blaming them on external causes;
- Embrace a healthy lifestyle, with a healthy proportion of work, rest, sport and leisure activities;
- Develop a sense of humor so as to maintain a good disposition even in the face of hardships.

The following emotional signs or behaviors may indicate that a relapse is forthcoming: exhaustion, tiredness; the tendency to hide/distort certain facts; impatience, restlessness, agitation; grumpy disposition, the tendency to be argumentative; depressive symptoms, passivity; decreased tolerance to frustration; self-victimization; reckless risk taking; heightened expectations with regard to other people; and expressing the belief in self-omnipotence.

For all gamblers who have tried to change their gambling behavior, Fong and Rosenthal [68] offer the following closing advice:

- Do not forget that it takes time to make a change in yourself;
- You have taken a major step on the path towards healing by completing the suggested exercises;
- Make sure you reward yourself after each achievement;

- Learn from your own mistakes;
- Be happy for every achievement;
- And do not forget that TODAY is the most important day!

7. Conclusions

One needs to underline the fact that not all psychological counseling techniques work for all gamblers; therefore, one must use individualized treatment approaches, depending on the needs and context of each individual case.

The experts in the field have agreed that future research will have to focus on looking for efficient strategies aimed at preventing and minimizing the negative consequences of gambling disorder; providing psychological support to those affected by this behavior and to members of their family; utilizing a variety of strategies during treatment, as required by each person's particular situation; suggesting alternative leisure activities that the client will find pleasant; raising awareness; and educating a larger number of young people about the causes and development of this type of addictive behavior [15, 69–70].

We have to admit that we know too little about the efficiency of treating gambling disorder; the involvement of the government, the academic community, and the gambling organizers can help us to find the most effective treatment strategies for this compulsive behavior [71].

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References

- [1] Rizeanu S. Pathological gambling treatment Review. Procedia Social and Behavioral Sciences (Elsevier). 2015;**187**:613-618. DOI: 10.1016/j.sbspro.2015.03.114
- [2] Rizeanu S. Personality types of gambling pathological player. Romanian Journal of Experimental Applied Psychology. 2012;3(3):39-45
- [3] National Council on Problem Gambling. National Council on Problem Gambling (Brochure). Washington, D.C: Author; 2000
- [4] Centre for Addiction and Mental Health, Toronto. Problem Gambling: A Guide for Helping Professionals: Toronto; 2008

- [5] Rizeanu S, Savoiu G. Some statistics of gambling activities. Romanian Statistical Review. 2012;(Suppl 1):282-290
- [6] Raylu N, Oei TP. A Cognitive Behavioural Therapy Programme for Problem Gambling. East Sussex: Routledge; 2010
- [7] Raylu N, Oei TPS. The gambling-related cognition scale (GRCS): Development, confirmatory factor validation and psychometric properties. Addiction. 2004;99:757-769. DOI: 10.1111/j.1360-0443.2004.00753.x
- [8] Xian H, Scherrer JF, Slutske WS, Shah KR, Volberg R, Eisen SA. Genetic and environmental contributions to pathological gambling symptoms in a 10 year follow-up. Twin Research and Human Genetics. 2007;10:174-179. DOI: 10.1375/twin.10.1.174
- [9] Rizeanu S. Pathological Gambling in Romania. Psychological Profile of the Romanian Pathological Gambler. Saarbrucken: LAP LAMBERT Academic Publishing; 2015. DOI: 10.15303/rjeap.2016.v7i1.a7
- [10] Blaszczynsky A. Overcoming Compulsive Gambling. London: Robinson; 2010
- [11] Gotestam KG, Johansson A. Characteristics of gambling and problematic gambling in the Norwegian context. A DSM-IV based telephone interview study. Addictive Behaviors. 2003 Jan-Feb; **28**(1):189-197. DOI: 10.1016/S0306-4603(01)00256-8
- [12] Westermeyer J, Canive J, Garrard J, Thuras P, Thompson J. Lifetime prevalence of pathological gambling among American Indian and Hispanic American veterans. American Journal of Public Health. 2005;95(5):860-866. DOI: 10.2105/AJPH.2003.023770
- [13] Bondolfi G, Osiek C, Ferrero F. Prevalence estimates of pathological gambling in Switzerland. Acta Psychiatrica Scandinavica. 2000;101:473-475. DOI: 10.1034/j.1600-0447. 2000.101006473.x
- [14] Huang J, Jacobs DF, Derevensky JL, Gupta R, Paskus TS. Gambling and health risk behaviors among U.S. College student athletes: Findings from a national study. Journal of Adolescent Health. 2007;40:390-339. DOI: 10.1016/j.jadohealth.2006.11.146
- [15] Disley E, Pollitt A, Culley DM, Rubin J. Map the Gap, a Critical Review of the Literature on Gambling-Related Harm. Santa Monica: RAND Corporation; 2011
- [16] American Psychiatric Association. Diagnostic and Statistical Manual of Mental Disorders. 5th. (DSM-5) ed. Washington DC: APA; 2013. DOI: 10.1176/appi.books.9780890425596
- [17] Fernandez-Montalvo J, Echeburua E. Pathological gambling and personality disorder: An exploratory study with the IPDE. Journal of Personality Disorders. 2004; Oct;18(5):500-505. DOI: 10.1521/pedi.18.5.500.51326
- [18] Lesieur HR, Blume SB. The south oaks gambling screen: A new instrument for the identification of pathological gamblers. American Journal of Psychiatry. 1987;144:1184-1188. DOI: 10.1176/ajp.144.9.1184
- [19] Shaffer HJ, LaBrie R, Scanlan K, Cummings TN. Psychological gambling among adolescents: MA gambling screen (MAGS). Journal of Gambling Studies. 1994;10(4):339-362

- [20] Gamblers Anonymous. Gamblers Anonymous, Combo Book. Author: Los Angeles; 1998
- [21] Ferris J, Wynne H. The Canadian Problem Gambling Index: Final Report. Ottawa, ON: Canadian Centre on Substance Abuse; 2001
- [22] Littman-Sharp N, Turner N, Toneatto T. Inventory of Gambling Situations (IGS): User's Guide. Toronto, ON: Centre for Addiction and Mental Health; 2009
- [23] Rizeanu S. Proposal for a cognitive model to the treatment of pathological gambling. Procedia Social and Behavioral Sciences. 2012;33:742-746. DOI: 10.1016/j.sbspro.2012. 01.220
- [24] Echeburúa E, Fernández-Montalvo J. Psychological treatment of slot-machine pathological gambling: New perspectives. Journal of Gambling Studies. 2005;**21**:21-26. DOI: 10.1007/s10899-004-1018-6
- [25] Sylvain C, Ladouceur R, Boisvert J. Cognitive and behavioral treatment of pathological gambling: A controlled study. Journal of Consulting and Clinical Psychology. 1997;65(5):727-732
- [26] Gooding P, Tarrier N. A systematic review and meta-analysis of cognitive-behavioural interventions to reduce problem gambling: Hedging our bets? Behaviour Research and Therapy. 2009;47(7):592-607. DOI: 10.1016/j.brat.2009.04.002
- [27] Rizeanu S. The efficacy of cognitive-behavioral intervention in pathological gambling treatment. Procedia - Social and Behavioral Sciences - by Elsevier. 2014;127:626-630. DOI: 10.1016/j.sbspro.2014.03.324
- [28] Brewer JA, Grant JE, Potenza MN. The treatment of pathologic gambling. Addiction Disorder Treatment. 2008;7:1-13. DOI: 10.1097/ADT
- [29] Iancu I, Lowengrub K, Dembinsky Y, Kotler M, Dannon P. Pathological gambling. An update on neuropathophysiology and pharmacotherapy. CNS Drugs. 2008;**22**:123-138
- [30] Kim SW, Grant JE, Eckert ED, Faris PL, Hartman BK. Pathological gambling and mood disorders: Clinical associations and treatment implications. Journal of Affective Disorders. 2006;92:109-116
- [31] Victor RG, Krug CM. Paradoxical intention in the treatment of compulsive gambling. American Journal of Psychotherapy. 1967;**21**(4):808-814
- [32] Hodgins DC, Currie SR, el-Guebaly N. Motivational enhancement and self-help treatments for problem gambling. Journal of Consulting and Clinical Psychology. 2001;69: 50-57
- [33] McCorriston T, Laidlaw J. Logging on to G-mail... an Online Support Service for Victorians with Gambling Concerns. Paper presented at the 10th National Association of Gambling Studies Conference, Mildura; 2000
- [34] McConaghy N, Blaszczynski A, Frankova A. Comparison of imaginal desensitisation with other behavioural treatments of pathological gambling: A two-to nine-year follow-up. The British Journal of Psychiatry. 1991;159:390-393

- [35] Coombs RH. Handbook of Addiction Disorders. New Jersey: John Wiley & Sons; 2004
- [36] Petry NM. Pathological Gambling: Etiology, Comorbidity and Treatment. Washington, DC US: American Psychological Association; 2005
- [37] Raylu N, Oei TPS. Pathological gambling: A comprehensive review. Clinical Psychology Review. 2002;22(7):1009-1061. DOI: 10.1016/S0272-7358(02)00101-0
- [38] Chambless DL, Ollendick TH. Empirically supported psychological interventions: Controversies and evidence. Annual Review of Psychology. 2001;52(1):685-716. DOI: 10.1146/annurev.psych.52.1.685
- [39] Korn DA, Schaffer HJ. Massachusetts Department of Practice Health' Practice Guidelines for Treating Gambling-Related Problems. An Evidence-Based Treatment Guide for Clinicians. Toronto: Massachusetts Council on Compulsive Gambling; 2004
- [40] Ladouceur R, Sevigny S, Blaszczynski AP, O'Connor K, Lavoie ME. Video lottery: Winning expectancies and arousal. Addiction. 2003;98:733-738
- [41] Oei TPS, Raylu N. Gambling and Problem Gambling among the Chinese. Queensland, Australia: University of Queensland; 2007
- [42] Oei TPS, Raylu N, Grace R. Self Help Program for Problem Gamblers. Brisbane: University of Queensland – School of Psychology – Behaviour Research & Therapy Centre (BRTC); 2008
- [43] Rizeanu S. Psychological profile of the Romanian pathological gambler. Procedia Social and Behavioral Sciences by Elsevier. 2014;127:265-269. DOI: 10.1016/j.sbspro.2014.03.253
- [44] Toneatto T, Ladouceur R. Treatment of pathological gambling: A critical review of the literature. Phychology of Addictive Behaviors. 2003;42:92-99. DOI: 10.1037/0893-164X.17.4.284
- [45] Toneatto T, Millar G. Assessing and treating problem gambling: Empirical status and promising trends. Canadian Journal of Psychiatry. 2004;49:517-525
- [46] Blaszczynski A, Nower L. A pathway model of problem and pathological gambling. Addiction. 2002;97(5):487-499. DOI: 10.1046/j.1360-0443.2002.00015.x
- [47] Rizeanu S. Pathological gambling in relation to anxiety and identity status. Procedia Social and Behavioral Sciences by Elsevier. 2013;78:748-752. DOI: 10.1016/j. sbspro.2013. 04.388
- [48] Sharpe L. A reformulated cognitive-behavioral model of problem gambling; a biopsychosocial perspective. Clinical Psychology Review. 2002;22(1):1-25. DOI: 10.1016/S0272-7358(00)00087-8
- [49] Toneatto T. A metacognitive therapy for anxiety disorders: Buddhist psychology applied. Cognitive and Behavioral Practice. 2002;9:72-78. DOI: 10.1016/S1077-7229(02)80043-8
- [50] Apodaca TR, Miller WR. A meta-analysis of the effectiveness of bibliotherapy for alcohol problems. Journal of Clinical Psychology. 2003;59:289-304. DOI: 10.1002/jclp.10130
- [51] Petry NM, Ammerman Y, Bohl J, Doersch A, Gay H, Kadden R, Molina C, Steinberg K. Cognitive-Behavioral therapy for pathological gamblers. Journal of Consulting and Clinical Psychology. 2006;74(3):555-567. DOI: 10.1037/0022-006X.74.3.555

- [52] Ladouceur R, Sylvain C, Boutin C, Doucet C. Understanding and Treating the Pathological Gambler. West Sussex, England: John Wiley & Sons, Ltd.; 2002
- [53] Ledgerwood DM, Petry NM. Current trends and future directions in psychosocial treatments for pathological gambling. Current Directions in Psychological Science. 2005;14(2):89-94. DOI: 10.1007/s11920-010-0141-7
- [54] Wulfert E, Blanchard EB, Martell RS. Conceptualizing and treating pathological gambling: A motivationally enhanced cognitive behavioral approach. Cognitive and Behavioral Practice. 2003;10:61-72. DOI: https://doi.org/10.1016/S1077-7229(03)80009-3
- [55] Miller VR, Rollnick S. Talking oneself into change: Motivational interviewing, stages of change, and therapeutic process. Journal of Cognitive Psychotherapy. 2004;18(4):299-308. DOI: 10.1891/jcop.18.4.299.64003
- [56] Ladouceur R, Sylvain C, Letarte H, Giroux I, Jaques C. Cognitive treatment of pathological gamblers. Behaviour Research and Therapy. 1998; Dec;36(12):1111-1119
- [57] Tolchard B, Battersby M. Nurse behavioural psychotherapy and pathological gambling: An Australian perspective. Journal of Psychiatric and Mental Health Nursing. 2000;7:335-342. DOI: 10.1046/j.1365-2850.2000.00273.x
- [58] Rizeanu S. The specificity of pathological gambling. Procedia Social and Behavioral Sciences by Elsevier. 2012;33:1082-1086. DOI: 10.1016/j.sbspro.2012.01.289
- [59] Dryden W, DiGiuseppe R, Neenan M. A Primer on Rational Emotive Behavior Therapy. London: Research Press; 2003
- [60] Rizeanu S. Psychotherapy for addictive disorders. Romanian Journal of Cognitive Behavioral Therapy and Hypnosis. 2015;2(4):42-46
- [61] Boughton R, Falenchuk O. Vulnerability and comorbidity factors of female problem gambling. Journal of Gambling Studies. 2007;23:323-334. DOI: 10.1007/s10899-007-9056-6
- [62] El-Guebaly N, Patten SB, Currie SR, Williams JVA, Beck CA, Maxwell CJ, Wang JL. Epidemiological associations between gambling behavior, substance use and mood and anxiety disorders. Journal of Gambling Studies. 2006;22:275-287. DOI: 10.1007/s10899-006-9016-6
- [63] Kim SW, Grant JE, Eckert ED, Faris PL, Hartman BK. Pathological gambling and mood disorders: Clinical associations and treatment implications. Journal of Affective Disorders. 2006;**92**:109-116. DOI: 10.1016/j.jad.2005.12.040
- [64] Rizeanu S. Personality disorders among pathological gamblers. Romanian Journal of Experimental Applied Psychology. 2017;8(Special issue 1):246-251. DOI: 10.15303/ rjeap.2017.si1.a38
- [65] Rizeanu S. Romanian pathological Gambler's psychology A review. Abnormal and Behavioural Psychology. 2016;2:1. DOI: 10.4172/2472-0496.1000110

- [66] Ste-Marie C, Gupta R, Derevensky JL. Anxiety and social stress related to adolescent gambling behavior and substance use. Journal of Child & Adolescent Substance Abuse. 2006;**15**:55-74. DOI: 10.1300/J029v15n04_03
- [67] Dryden W, Matweychuk W. Overcoming your Addiction. London: Sheldon Press; 2000. DOI: 10.1093/alcalc/agg032
- [68] Fong TW, Rosenthal RJ. Freedom from Problem Gambling. UCLA Gambling Studies Program & California Office of Problem and Pathological Gambling; 2008
- [69] McMillen J, Marshal D, Murphy L. The Use of ATMs in ACT Gaming Venues: An Empirical Study. Canberra: The ANU Centre for Gambling Research; 2004
- [70] Rizeanu S. A compulsive gambler case study. American Research Journal of Addiction and Rehabilitation. 2017;**V1**(I1):1-4
- [71] McCown W. Treating compulsive and problem gambling. In: Coombs RH, editor. Handbook of Addictive Disorders. A Practical Guide to Diagnosis and Treatment. New Jersey: John Wiley & Sons, Inc.; 2004



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