

BETWEEN DESPAIR AND BIO-CHEMISTRY. NOTES ON THE PHENOMENOLOGY OF ADDICTION

VLAD ICHIM*

ABSTRACT. Although the phenomenon of addiction has existed, in one form or another, throughout the entire history, in contemporary society it takes new, more powerful forms, that need to be better understood. Also, today there are new methods and technologies of research, unavailable to past generations, that can shed new light on this complex matter. It is also advisable to use an interdisciplinary approach, as different areas of research can in fact cooperate to achieve a better understanding of addiction. It must also be taken into account that, being a very complex phenomenon, certain aspects of addiction can only be understood by certain sciences, and then the conclusions can be unified through the use of phenomenology. This study will try to perform precisely this kind of endeavor, revealing the phenomenon of addiction from more than one perspective, focusing on the many facets that it can have.

Keywords: *addiction, sociology, psychology, neurology, philosophy, social media, video games, political sciences, drugs, alcohol.*

“Common sense tells us that things of the Earth only exist very little, and that the true reality is only in our dreams.”

Charles Baudelaire, *Artificial Paradises*

Introduction

The phenomenon of addiction and its consequences is a very complex topic, that can be approached from an almost infinite number of ways. This study will try to offer a perspective that regards addiction not only from a bio-chemical

* PhD, Assistant professor, University of Medicine and Pharmacy “Grigore T. Popa”, Iasi, Romania, ichim_vlad_2004@yahoo.com

point of view, but also from a social and axiological one, trying to understand not so much *what* goes on in the mind of the addict, but *why* it does. From this point of view, a broader perspective will be adopted, one that will deal more with the causes that lead to addiction, and to the rewards one gets (or thinks he gets) from addiction.

This topic is, for its greater part, uncharted territory, as science has only recently began to understand the phenomenon of addiction from a more complex point of view: psychology, bio-chemistry, and neurology, they all have something to say about this topic, and every day new breakthroughs bring new light on the subject. As Frank Schalow states, “we cannot discount the advances made in neuroscience in regard to treating addiction by regulating brain chemistry. But even so-called ‘drug-therapy’, no matter how successful it may be in treating an array of physical-psychological disorders (including depression), cannot by itself solve the ‘riddle’ of human existence” (Schalow, 2017, p. 8).

Also, the phenomenon of *dysthymia*, will be taken into account, as it is a term coined by “psychiatrists, trained in the scientific model of medical materialism. [...] It is supposed to mean lack of enjoyment in one’s life” (Wilshire, 1999, p. 4), and how this term is connected with the phenomenon called death by despair, which is more and more common in modern societies.

Addiction will be discussed from three points of view: bio-chemical (what biological and chemical mechanisms are activated in this process), psychological (how does one relate to his addiction, and how it is triggered), and philosophical (trying to understand the deeper meaning of the addict’s behavior).

The discussion is even more complicated today, as new forms of addiction have appeared, especially the digital one (video games, social networks, and pornography), that takes hold of more and more people.

Addiction has its death toll, and mortality rates will also be taken into account, trying to observe its evolution throughout the years. As we’ll discover, death by addiction is on the rise, and that is connected with social phenomena, such a high unemployment and lack of social mobility, even in the U.S. These situations can drive some people to despair, and their only solace being artificial pleasures.

Death by Despair

In the past twenty years, Western society has changed, and not necessarily for the better. Studies show that the collapse of traditional society and its values, especially the collapse of the family, has dire results for people of all social categories: “millions and millions of American children are raised in transient households and

moral vacuums that make not just social mobility but even elemental character formation all but impossible. In an America of fewer jobs, more poverty, more crime, more drugs, more disease, and growing ethnocultural resentments, the shattering of the indispensable social building block will have catastrophic consequences” (Steyn, 2011, p. 217).

Because the world has changed, jobs that were once secure now disappear. New technologies, the rise of the Internet and the democratization of information – all these things changed the face of society, and many jobs disappeared as a result.

Unemployed, stuck on a social level they can't leave (social mobility, as said before, is now decreasing and, in fact, we can even talk about a downward mobility, if any), people usually turn to alcohol, and that is one of the most frequently encountered addictions: “alcohol dependence is a significant cause of morbidity and mortality in the United States and worldwide. The World Health Organization reports that about 140 million people throughout the world suffer from alcohol dependence. Worldwide, alcohol causes 1.8 million deaths per annum. Eight million people in the United States are dependent on alcohol. Mortality rates follow drinking levels” (Bankole, p. 382).

Addiction also causes a certain type of behavior that, consequently, generates an unhealthy, dangerous life-style. Without hope for tomorrow, such a person will simply live in the moment, taking pleasure wherever he can find it: “it will render you impulsive, so that you will jump, for example, at any short-term mating opportunities, or any possibilities of pleasure, no matter how sub-par, disgraceful or illegal. It will leave you far more likely to live, or die, carelessly, for a rare opportunity at pleasure, when it manifests itself. The physical demands of emergency preparedness will wear you down in every way” (Peterson, 2018, p. 49).

And the trend is going in the same direction: more and more people, that means more and more competition, and more and more stress, that leads to artificial solutions, such as alcohol, smoking, and drugs. Analyzing deeper, is also a way to obtain some freedom from penitentiary for a couple of days (Ciuhodaru et al, 2013a, 2013b).

The famous study performed by John B. Calhoun, called ‘Mouse Utopia’, proved that when social pressure becomes unreasonably high, the social behavior breaks down, a fact that causes society itself to break down (cf. Calhoun, 1983). Given that population throughout the world is rising, the question of Mark Steyn becomes obvious: “is it more likely that these trends will reverse—or that they will accelerate? Consider life in a permanently poorer America with higher unemployment, less social mobility, and any prospect for self-improvement crushed by the burden of government. Will that mean more or less marijuana? More or less cocaine? More or fewer meth labs?” (Steyn, 2011, p. 232).

This kind of difficulties must be solved, as all the Western countries try to find solutions to these new problems of modern life: “controlling opioids is an obvious priority, as is trying to counter the longer-term negative effects of a poor labor market on marriage and child rearing, perhaps through a better safety net for mothers with children that would make them less dependent on unstable partnerships in an increasingly difficult labor market” (Case, 2017, p. 399). Social problems can be both the cause and the effect of addictions, and they can create a never-ending cycle that will, in the end, cause the destruction of social life as we know it; it is known that, for example, “40 percent of American children are now born out of wedlock. A majority of Hispanic babies are born to unmarried mothers. So are 70 percent of black children. And so are 70 percent of the offspring of non-Hispanic white women with a high school education and an income under \$20,000. Entire new categories of crime have arisen in the wake of familial collapse, like the legions of daughters abused by their mom’s latest live-in boyfriend” (Steyn, 2011, p. 216). All these situations can, obviously, lead to despair and the ‘normal’ resorts for this are different types of addiction (as stated above, it’s usually alcohol and/or drugs, but also caffeine addiction and smoking).

The new realities of contemporary society lead to changes in the mortality rates: people tend to die younger, in their mid-life, and this phenomenon puzzled the specialists, as, at first sight, appeared to be inexplicable:

We can track mortality rates for all whites age 45–54 starting in 1900; during the 20th century, these mortality rates declined from more than 1,400 per 100,000 to less than 400. After the late 1930s, mortality fell year by year, with the exception of a pause around 1960 (which likely was attributable to the rapid increase in the prevalence of smoking in the 1930s and 1940s), with rapid decline resuming in 1970, when treatments for heart disease began to improve. In this historical context of almost continuous improvement, the rise in mortality in midlife is an extraordinary and unanticipated event. (Case, 2017, p. 403).

However, this occurrence can be explained if we take into account the above mentioned facts; the use of certain types of substances, meant to ease the suffering of everyday life in modern societies, is the cause of more and more deaths, throughout the world; for example, it has been noticed that rising control over alcohol use among teenagers, had immediate effects over the accidents and even suicide rates: “research in the United States and other developed countries has indicated that minimum drinking age laws reduce traffic crash and fatality rates; positive effects among adolescents include reducing alcohol consumption

and high risk drinking. Additionally, several studies have documented an association between minimum drinking age laws and a reduction in youth suicide” (Bankole, p. 33).

The reasons why people (and especially teenagers) use alcohol include social acceptance, feeling good or stop feeling bad. At early ages, the peer group plays an essential part in the way alcohol is used. However, it’s also true that family can play a major factor in this, as sometime teenagers will turn to substance abuse because of a dysfunctional family life.

One can also connect this situation with the decline of religion of Western society, another thing that makes many people feel lost, alone in the world, and, in the end, hopeless. According to Jung,

Hopelessness did not simply translate into capitulation (and herein lies the ambiguity). For hope could also be reinterpreted as an acronym for a higher power or redemptive source, that is, for God in some indefinable way. To say that the alcoholic is ‘without hope’ is to suggest that he/she is bereft of a higher spiritual connection, or what can ultimately restore a sense of hopefulness. Thus, the so-called despair of the addict could also be read symptomatically as the need for spiritual renewal and transformation. (Schalow, 2017, p. 120).

On this note, it can be concluded that death by despair is, unfortunately, a sign of our times; although it was also present in other ages, it is now stronger than ever, given not only the unprecedented social pressure, but also how easy it has become for one to obtain the “distractions” that create addiction (caffeine, cigarettes, alcohol, drugs, video games, and pornography); also this is connected, as stated above, with a lack of spiritual life, but this aspect will be further discussed in the final section.

III. The bio-chemistry of addiction

Although it’s true that social pressure and the urgencies of contemporary life have a defining role in the development of addictions, it’s also important to take into account the biological and chemical factors that make the addiction possible.

It has been discovered that the human brain contains a number of neurotransmitters, that are responsible for the mechanisms of reward and enforcement of certain behaviors. Initially, it was considered that the most important of them is dopamine, but further studies showed that things are more complicated: “the focus on dopamine in the context of reward and reinforcement often overshadows the

role of other neurotransmitters. Indeed, dopamine is a modulatory neurotransmitter that in and of itself is not capable of strong excitation or inhibition of neurons within this circuitry. Furthermore, there is evidence indicating that dopaminergic transmission is not required for certain aspects of behavior that are thought to involve reward or reinforcement” (Bankole, p. 259). More exactly, the dopamine is not the only factor that coordinates this type of responses to stimuli. Serotonin, a neuromodulatory transmitter, is able to influence habitual behaviors through the control of impulsive actions, and also control of affect. More precisely, serotonin can cause people to disregard the outcome of certain actions, and thus make them more prone to risky behaviors.

Studies performed on this subject have revealed that substances like amphetamine and cocaine can raise the levels of serotonin in certain parts of the brain, and thus create addiction, together with the dopamine levels, that are also influenced.

All these mechanisms are necessary for brain function, but the problem is that humans have discovered ways to induce them artificially.

Basically, whenever something good happens, whenever one has achieved something, or won a competition, a certain amount of dopamine is activated in the brain, hence the feeling of pleasure that one experiences in this kind of situations. As stated above, people have discovered alternative, artificial ways to stimulate these neurotransmitters.

According to recent studies, there are four main sources of artificial pleasure, that are used all the time by many people. They can also be called ‘escapism habits’, as they are ways for people to avoid real activity and real achievements, replacing them with these bad habits.

The first is video games, a topic covered, among others, by Dr. Nicolas Kardaras, who talks about the way these addictive pass-times take over our lives. Video games are an addictive way of obtaining cheap satisfactions. Basically, they kill motivation, tricking the brain into thinking one has achieved something. This stimulates dopamine and serotonin, but in an artificial way, a way meant to satisfy the sense of achievement: “Here’s the rub: video games for the alienated kid and social media for the cheerleader are both just as addicting as heroin is to a junkie. With every burst of virtual gunfire, every text and tweet, there is a release—a little squirt—of dopamine, just as surely as cocaine tickles our dopamine neurotransmitters. And, unfortunately, some kids, based on genetics and psychological temperament, may already be predisposed toward addictive personalities and thus might be more vulnerable to getting hooked on these various digital dopamine stimulants” (Kardaras, 2016, p. 19).

The process is complex, and, as stated above, it's not just the video games that can trigger it, but also social media in general.

Addiction is not caused just by bio-chemical reactions, the simple reward of adventure and the adrenaline rush, but more subtle ones, that stimulate even higher aspirations and desires:

The ever-increasing and never-ending 'limitless possibilities' of the game create a very hypnotic grip on kids. That hypnotic pull along with the stimulating hyperarousing content creates a 'dopaminergic' (dopamine-increasing) effect; that dopamine increase becomes the key ingredient in a primordial addiction-forming dynamic. The most primitive part of our brains—the medulla and cerebellum—cradle our ancient dopamine-reward pathways. And when an action has a feel-good result—like finding food or discovering something new on the Internet or in a video game—dopamine is released, which feels pleasurable and creates a more-we-get-more-we-want addictive cycle. (Kardaras, 2016, p. 26).

It's somewhat disheartening to see how even more noble traits of human nature (curiosity and the will to discover) can be perverted by this type of addiction and turned against us. This is even more dangerous when it comes to young people, people in their teens or even younger than that, since they don't have the maturity and hence the ability to resist this type of attraction that, as previously stated, stimulates the main aspect of their personality: curiosity and the desire to explore the world: "the game also creates the opportunity for novelty, something our brains are hardwired to explore. Dr. Peter Whybrow, UCLA's director of the Institute for Neuroscience and Human Behavior, has called computers and computer games 'electronic cocaine' and describes this novelty-seeking addictive dynamic this way: 'Our brains are wired for finding immediate reward. With technology, novelty is the reward. You essentially become addicted to novelty'" (Kardaras, 2016, p. 26).

If video games affect mostly very young people (although there are more and more exceptions), the social networks affect people of all ages: one could argue that they are the equivalent of video games for adults: "most social life is already routinely electronically mediated (or rather where social life has already turned into an electronic life or cyberlife, and where most 'social life' is conducted primarily in the company of a computer, iPod or mobile, and only secondarily with other fleshy beings), it is obvious to the young that they don't have even so much as a sniff of choice; where they live, living social life electronically is no longer a choice, but a 'take it or leave it' necessity" (Bauman, 2007, p. 2). More and more people live a cyber-life, a life on the net, and that life is even more important than the real one, just life kids live inside the virtual reality of video games.

What must be taken into account is that these electronic addictions are only very recently developed, this phenomenon is less than 50 years old – and it's already such a big problem – it's left to the imagination how bad things could get in the future, since video games and social networks are getting more and more addictive with every passing year. Social media that is used by most people to achieve validation, is in fact an illusion, as many scholars are starting to notice, it's very easy for one to create for himself a sound room, where he only gets to hear the opinions he agrees with, without having to deal with challenges.

Another escapism habit today is pornography, an addictive activity, stimulating dopamine, serotonin, but also other neurotransmitters. Usually this is a buffer for rejection, offering an artificial escape from realities of human interaction. Many people have a hard time dealing with rejection, as it is wired into our brains that not being able to be accepted can have dire consequences – but that was the case in primitive societies, where there were only a few potential partners to choose from. However, not being able to deal with rejection still is a strong trait of most people, and so it can be tempting to seek the artificial refuge of the Internet – “the proliferation of internet pornography is a good example of how addiction arises as a result of ‘reducing’ the fantasy to the variety of visual icons and fetishes displayed on a computer screen. Correlatively, the prevalence of fetishes, as restricting the play-space of erotic imagination, corresponds to a specific form of desire as ‘ontical craving’” (Schalow, 2017, p. 59).

Just like video games and social media, the attraction for pornography is caused by more than just the immediate, obvious bio-chemical mechanisms: it usually has social and psychological roots. Robert Moore and Doug Gillette talk at length about this phenomenon, arguing that it can only affect a certain type of people that is people who grew up in certain types of dysfunctional families. This type of people are generically denominated by them as belonging to the category of the ‘Oedipal Child’, which is one of the archetypes of immature masculinity; more exactly, this type of behavior is one of the two forms of ‘extremes’, or ‘Shadows’ of this archetype, called ‘Mamma’s Boy’: “The Oedipal Child’s Shadow consists of the Mama’s Boy and the Dreamer. The Mama’s Boy is, as we all know, ‘tied to Mama’s apron strings.’ He causes a boy to fantasize about marrying his mother, about taking her away from his father. If there is no father, or a weak father, this so-called Oedipal urge comes on all the stronger, and this crippling side of the Oedipal Child’s bipolar Shadow may possess him” (Moore, 1990, p. 39).

Basically, the urge towards pornography comes from this un-satisfied relation with his mother, probably absent or unreliable; what this type of person really does is that, because he lacked the affection of his mother (i.e. he didn’t ‘posses’

his mother, in the form of maternal affection), he now seeks to possess all women, through pornography: he becomes what is called 'autoerotic'; he may compulsively masturbate, he may have collections of pictures of nude women – they all represent, in some sense, aspects of the feminine, and so aspects of his mother. In the end, "caught up in masturbation and the compulsive use of pornography, the Mama's Boy, like all immature energies, wants just to be. He does not want to do what it takes to actually have union with a mortal woman and to deal with all the complex feelings involved in an intimate relationship. He does not want to take responsibility" (Moore, 1990, p. 40).

Movies and series are also a way for many people to avoid reality. They tend to replace social life. Many people find it easier to learn about life and about human interaction by watching movies, and experiencing the evolution of fictional characters, rather than engaging in real social interactions. The addiction can be so strong, that some people become obsessed with a certain movie or series, starting to behave accordingly.

Because of all these escapism habits, new theories have been developed, both in medicine and psychology, meant to help people achieve a normal social life: "these theories promote that life stressors are likely to trigger the use of avoidance or emotion focused coping strategies such as substance use among individuals who have low self-efficacy and poor problem-solving coping skills in an attempt to avoid experiencing distress" (Bankole, p. 729).

IV. The condition of the addicted man

The social and biological factors that cause (and explain) addiction are, of course, essential: but they don't tell the whole story. Something is still missing: the human story, the meta-explanation, from a more philosophical point of view. In the end, the most important factor is man himself, and how the experience of addiction can be integrated in the human narrative, and what can we learn from it.

In order to understand this, one must be aware of Schalow's remark that "the problem of addiction never occurs in a vacuum, but instead arises within a specific historical era, culture, and life-situation (which always involves other people). In Heidegger's terms, being-in-the-world already implies being-with others. Conversely, in the case of any self-discovery, there is an accompanying disclosure of the world and of those who inhabit it" (Schalow, 2017, p. 168). In order to control his addiction, the patient has to understand himself, and also the world around him. This is not a simple process, but, as Jung had once noticed, the cure is only possible if the patient goes through a "conversion".

How does one achieve this? It's not an easy path, as any specialist could state. Basically, the patient has to find out who he is, and in order to do that, he has to find out what is his "story".

What does it mean – to have a story? Is that story waiting to be discovered? Peterson would say no: that story is waiting to be invented. To better understand this, one should take a closer look at a case that Peterson describes at length in his book, the case of a woman who was extremely confused, more confused than she even realized – a person who didn't have a story:

I thought, 'Part of you wants to be taken. Part of you wants to be a child. You were abused by your brothers and ignored by your father and so part of you wants revenge upon men. Part of you is guilty. Another part is ashamed. Another part is thrilled and excited. Who are you? What did you do? What happened?' What was the objective truth? There was no way of knowing the objective truth. And there never would be. There was no objective observer, and there never would be. There was no complete and accurate story. Such a thing did not and could not exist. There were, and are, only partial accounts and fragmentary viewpoints. (Peterson, 2018, p. 266).

The main idea is that a person must clarify his or her position in the world, his or her relation with humanity and the universe. This is not an objective truth, just waiting to be discovered: it has to be *built*. Schalow agrees with this notion, as he states that the most important part in the therapy of an addict is to allow him to tell his story, to allow him to discover for himself (and by himself) who he is: "in simple terms, the direction of the dialogue does not lead to further explication, but instead, swings back the other way, as it were, toward 'holding in reserve,' withholding, and, ultimately, remaining silent, in order to preserve the mystery of human existence as a mystery for the individual to rediscover (for him/herself)" (Schalow, 2017, p. 166). If the addict is to become someone else, someone who is free from addiction, he has to be allowed to find out for himself who that new self is, and the can only do that by creating his own story.¹

Addiction was found to be related to biological determinants (predisposition) psychological factors (personality traits), psycho-pathological determinants (psychiatric diseases), having family causes (addiction models among parents or relatives) and social aspects like: legislative interdiction, popular among teenagers, having higher

¹ A similar approach can be found in I. Copoeru. Portraying addiction as a disease: A phenomenological answer. *Journal of evaluation in clinical practice*, 24(5), pp. 1101-1106, 2018. doi: 10.1111/jep.13022. Epub 2018 Aug 21.

rates in communities with a low socio-economic level, or addiction being encouraged by policy makers like in case of some kind of medicines sold with no prescription in community pharmacies or the consumption of illicit drugs accepted as being legal in some countries (Ciuhodaru et al, 2012; Iorga 2012a, 2012b; Sztankovszky 2016; Iorga 2015).

What does this tell us about mankind in the contemporary era? What does this tell us about the condition of man? The main word would be 'confusion'. In today's society, people are lost, without a clear direction, in a world that is changing even as we speak, and with nothing to hold on to – with no story. Once we understand this, the remark of Steyn seems only natural: all these people without a story have left is to... live in the moment, to simply be a spectator of their own lives: "linger awhile, how fair thou art. It's nice to linger at the brasserie, have a second café au lait, and watch the world go by" (Steyn, 2011, p. 117). And one could notice that the 'café' contains caffeine. Or looking for a more powerful support for recovery, medical and spiritual (Iorga, 2013).

Conclusion

As a final statement regarding the condition of man in the new society, one could remember a remark made by the French philosopher Chantal Delsol: according to her, modern man is like Icarus would have been – had he survived the fall (cf. Delsol, 2010). What would he have done, she asks? He simply would have... amused himself, surrender to every possible pleasure and addiction, since there was nowhere for him to go anymore, no more story for him to tell himself – without a story, without a meaning, all that's left is... addiction.

BIBLIOGRAPHY

1. Bankole, A. Johnson (ed.), *Addiction Medicine. Science and Practice*, vol. 1, Springer.
2. Bauman, Zygmund, *Consuming Life*, Polity, Cambridge, 2007.
3. Calhoun, B. John, *Environment and Population: Problems of Adaptation*, Praeger Publishers Inc, 1983.
4. Case, Anne; Deaton, Angus, "Mortality and Morbidity in the 21st Century", Brookings Papers on Economic Activity, 2017.

5. Ciuhodaru, Tudor; Iorga, Magdalena; Sandy-Narcis, Romedea. Risk factors for non-lethal self-harm by substance abuse. *Procedia Social and Behavioral Sciences*, 2012, vol. 33, pp. 761-765, DOI: 10.1016/j.sbspro.2012.01.224.
6. Ciuhodaru, T., Iorga, M., & Romedea, S. N. (2013a). The profile of the prisoner with deliberate self-harm by substance abuse. *European Journal of Science and Theology*, 9(1), 195-206.
7. Ciuhodaru, T., Iorga, M., & Romedea, S. N. (2013b). Study on Characteristics of Patients with Suicide Attempt, Near-lethal Harm and Deliberate Suicide. *Procedia-Social and Behavioral Sciences*, 84, 321-326.
8. Copoeru, I (2018). Portraying addiction as a disease: A phenomenological answer. *Journal of evaluation in clinical practice*, 24(5), pp. 1101-1106, 2018. doi: 10.1111/jep.13022.
9. Delsol, Chantal, *Icarus Fallen: The Search for Meaning in an Uncertain World*, Intercollegiate Studies Institute, 2010.
10. Iorga, M., & Sztankovszky, L. Z. (2013). Spirituality and Religion in the Recovery of Addicted Persons. *European Journal of Science and Theology*, 9(4), 201-210.
11. Iorga, M., Ciuhodaru, T., Romedea, S. N., & Copoeru, I. (2012a). Social consequences of law that prohibit the marketing of the plants, extracts and substances known as "ethnobotanicals". *Procedia-Social and Behavioral Sciences*, 33, 543-547.
12. Iorga, M., Ciuhodaru, T., Romedea, S. N., & Corodeanu, D. (2012b). Ethnobotanical use among freshman engineering students. *Procedia-Social and Behavioral Sciences*, 33, 642-646.
13. Iorga, M., Sztankovszky, L. Z., Soponaru, C., & Gardikiotis, I. (2015). Pharmacists' attitude and practices about drug dispensing in Romania. *Farmacia*, 63(4), 601-606.
14. Kardaras, Nicholas, *Glow Kids: How Screen Addiction Is Hijacking our Kids—and How to Break the Trance*, St. Martin's Press, New York, 2016.
15. Moore, Robert; Gillette, Doug, *King, Warrior, Magician, Lover*, Harper San Francisco, 1990.
16. Peterson, B. Jordan, *Twelve Rules for Life. An Antidote to Chaos*, Random House Canada, 2018.
17. Schalow, Frank, *Toward a Phenomenology of Addiction: Embodiment, Technology, Transcendence*, Springer, 2017.
18. Steyn, Mark, *After America*, Regnery Publishing, Washington D.C., 2011.
19. Sztankovszky, L. Z., Iorga, M., Soponaru, C., & Antofie, I. (2016). Issues about promoting drugs in Romania. Opinions of the pharmaceutical representatives. *Farmacia*, 64(3), 481-486.
20. Wilshire, Bruce, *Wild Hunger. The Primal Roots of Modern Addiction*, Rowman & Littlefield Publishers, Inc., Boston, 1999.