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EVENT TOURISM AND SUSTAINABLE DEVELOPMENT

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Abstract: Tourism is an important base of the country's socio-economic and cultural development. Tourism development strategies involve factors that the society applies to make the best use of its benefits or neutralize the problems it creates in their economies. As every economic subject aims at achieving effectiveness and efficiency, tourism management is tasked with responding to current challenges, and connecting service providers to users so as to achieve mutual satisfaction. Decision-making in tourism is particularly complex when events (cultural, sports...) are held in protected areas and national parks, which attract tourists the most. Since the capacities of a tourist destination often do not meet the needs of constant, accelerated growth of the number of visitors, sustainable development becomes a professional challenge for tourism destination management, and it is often a source of problems for tour operators or governments. A lack of resources, pollution, security, numerous risks..., are some of the factors that may reduce tourism profits or contribute to losses. This paper explores certain aspects of strategies that can bring benefits for visitors, organizers and the society as a whole, in accordance with the achieved level of overall economic, social and cultural development. The paper also points out the concerns, problems, codes and strategies that affect the final product, as an aspect of engagement in the quality management process in tourism.

Keywords: cultural tourism, sports tourism, benefits and sustainable development, strategies for managing event tourism

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INTRODUCTION

Event tourism is characterized by geographical, economic, socio-cultural, marketing, management, and other factors. Geographical criteria are determined by the Geographic Information System (GIS). The economic criteria of this type of tourism are based on Tourism Development Strategy of the Republic of Serbia for the period 2016-2025, (2018). Socio-cultural aspects are the subject of sociological study, and provide a number of benefits such as knowledge transfer and diversity: communication, learning about multiculturalism, strengthening ties between nations and regions (twinning cities and mutual visits). The marketing criteria of event tourism starts from the ability to effectively apply the instruments of the marketing mix in a given situation. Beside to the standard 4P concept, additional elements of the marketing mix are used in practice, such as: sponsors, celebrity promoters (especially at sports events) (Dugalić & Lazarević, 2016), as well as franchising, naming rights, etc. The strategic (management) criteria of event tourism are based on available management tools and the ability of managers to combine strengths and weaknesses, opportunities and threats in creating strategies for a particular event. In addition to SWOT analysis, managers can use other methods, analyses and strategies such as: experience curve, historical and comparative method, benchmarking, case studies, etc.

Event tourism has various forms: economic, cultural, artistic, ethnographic, religious, political-historical, tourism promotion (Bjeljac, 2010), sports, entertainment, scientific-professional, children's, and other types of events (Dugalić, 2017a). Event tourism is one of the most significant forms of tourist movements. A tourist event is a pre-organized event whose content and quality has the power to attract visitors, whether or not there are similar tourist attractions in the area competing for the same target - tourists' money, time or effort. These events often complement each other, and comprise a strategically designed effort by the region to attract as many visitors and their discretionary funds as possible. Thus, cultural and sports-recreational events are combined with festivals, ethnographic, entertainment, religious and historical contents, and the integral part of all of these could be the purchase of local and other products. Event tourism is not related exclusively to the season like other types of tourism, although some forms (sports, outdoor...), are affected by certain climate cycles. When it comes to cyclical events, certain parameters can be determined very precisely: the number of visitors, income, expenses, tendencies of further development, etc. The offer and sale of tourist content requires IT support and digitalization of all segments of tourism and society (Dugalić & Lazarević, 2018). As the aim of this paper is to determine the interdependence of the factors that act between different forms of event tourism and sustainable

development, the results of the research on phenomena that have a positive or negative effect on a particular destination and event are presented below. Examples from practice, which help to establish correlations and directions of further movement of phenomena, comprise mass events: sports events and festivals.

Sustainable development (Our Common Future), according to the report of the World Commission on Environment and Development, also known as The Bruntland Commission, should meet needs by maintaining the ability of new generations to meet their own needs, as a balancing factor between resource consumption and the ability to regenerate natural resources (World Commission on Environment and Development, 1987). It integrates institutional, economic, social, cultural, and environmental development, in line with the need to improve and protect the environment, which would ensure that current and future generations enjoy the expected quality of life and fulfilment of needs through efficient management (Bjeljac, 2006, pp. 102-117). Institutional factors relate to the provision of conditions for performing sports tourism and sports activities (2017b): Law on Sports (2016), Strategy for the Development of Sports in the Republic of Serbia 2014-2018, (2015), and Rulebook on Detailed Conditions for Performing Sports Activities (Rulebook on Detailed Conditions for Performing Sports Activities, 2017). Cultural factors imminently shape the connections between groups, nations, organizations and entities, which is characteristic of tourism and sport. The first goal (and presumably the most important one) of the strategy (Tourism Development Strategy of the Republic of Serbia for the year 2016-2025, 2018, p. 2) is: sustainable economic, environmental and social development of tourism. Economic factors affect the Gross Domestic Product (GDP) and the national pay balance, so the Tourism Development Strategy regulates the business framework of tourism entities, and the measures for its improvement. The social framework consists of demographic and other indicators such as the number of inhabitants in a tourist destination as a source of employment and strength of regional development, the profile of visitors, their nationality, origin, race, social status, habits... The paper particularly underlines the ecological impacts of the development of the event tourism. This refers to the availability of resources such as: available labour force, water, food, utilities, transport opportunities, satisfaction of comfort...

1. CASE STUDIES AND SUSTAINABLE DEVELOPMENT

In sports tourism, various approaches have emerged since the end of the 20th century, including: active sports tourism, event sports tourism and nostalgic sports tourism (visits to sports museums, Olympic venues, etc.).

Active sports tourism can be conditioned by a series of sports activities and it can be based on the need to move for the purpose of sports (triptych activism of delegates, referees, reporters, etc.), (Dugalić & Lazarević, 2018). In this the paper, the emphasis is given to entertainment sports tourism (tourists who travel to attend sports events) and event sports tourist, because of their mass character. Mass is the characteristic of sports tourism that has enormous impact on sustainable development and its structural elements. Sports tourism is related to a specific tourist destination and a set of services that are delivered to visitors in order to spend, experience or consume sports (physical) culture. Mass visit to a tourist destination can produce big problems, so big that the organizer (even governments of countries, e.g. Greece and Spain) pass strategies and measures to manage the protocol of people, or discourage tourists, if it is estimated that a certain destination cannot provide adequate conditions to receive them, or if too many tourists would endanger the existing ecosystem. The biggest problem produced by mass sports events is the safety of visitors, given the polarity, fans' emotions (due to victory or defeat) are difficult to control, and human lives are priceless and irreparable losses. Then, there are material losses caused by fanatical supporters (as a result of fights, breakages, destruction of inventory, shop windows, vehicles, signalization, dumpsters, etc.). The next problem that arises as a material loss is the waste that visitors leave behind at tourist destinations, in a relatively short period (during only one day, for example), and strategies for closing sports events necessarily include logistical support for cleaning and bringing the sports event venue to its initial state (Dugalić, 2013). This problem has been globally recognized, so the International Standard Industrial Classification (ISIC, Rev. 4, 2008), and the National Association of Corrosion Engineers (NACE, Rev. 2, (2018) have become the basic criteria for evaluating economic activities.

The methodology uses indicators based on the concept of sports tourism and characteristics of sports and tourism activities. Sports are thus divided into 5 categories that sports tourism is based on, so there are: active, entertainment, cultural, activist and occasional sports tourism. As the topic of the paper is event tourism and sustainable development, among numerous indices, the paper analyses precisely those crucial factors that have the strongest effect within the framework of occasional sports and festival tourism, namely *water supply* and *waste production*. The activities related to water supply and waste disposal are gaining in importance (Beke-Trivunac & Vidović, 2018), and standards are classified into sections, groups and classes (in this case 4-6-8), as the NACE index code (Rev 2) - E36-E39, which means that the activities related to water supply and waste disposal in tourism are classified into 4 sections, 6 groups and 8 classes. What follows are certain examples from the practice (comparing attendance from the smallest to the largest) in which aspects of nature pollution as a consequence of manifestation (sports, cultural, ethnographic, festival) tourism are explained in order to target the best solutions by quality management strategies.

Belgrade Marathon, Serbia: according to the organizers data, the 31st event in 2018 was attended by 27,000 citizens of Serbia, and 3,000 participants and guests from 73 countries (Belgrade Marathon, 2018). As the event has a long tradition, it was reasonably expected that the organizer would improve the previous operations, in accordance with the imperative of modern times and competitive pressure of the same events in the wider and further environment. However, due to the organizer's fault, the Belgrade Marathon has been removed from the calendar of the International Association of Athletics Federations (IAAF, 2018) for many years, and it does not provide points to competitors, so the attendance has been declining. The official website of the IAAF states that in April 2019, when the Belgrade Marathon was held, other races were held in Europe and beyond: Paris, Rotterdam, Poland (Warsaw and Lodz), Vienna, London, Kiev, Boston (USA), Istanbul, Japan (Nagano and Gif), and Chinese Yangzhou. The problematic follow-up of the Belgrade Marathon and the drop in attendance was due to the violations of the IAAF regulations and financial provisions. If the organizer's attendance data is correct, the calculation shows that 30,000 visitors of the Belgrade Marathon (assuming the consumption of 2 litres of water and other beverages per person) produce 1.5 tons of PET (poly-ethylene terephthalate) packaging waste (average bottle weight - 50 gr.), beside other waste (cans, Tetra Paks, paper and PVC packaging...). As the repurchase price of PET packaging according to the price list of JKP Gradska čistoća, Belgrade (2018), is 26 RSD per kg, the commercial income from recycling would be 39,000 RSD, with benefits from other sources (waste paper, cans) and conservation of the ecosystem. This presumption supports the strategy for mandatory waste management conducted by organizers during mass sports events. It follows that the average tourist leaves behind 0.33-0.40 kg of waste per day, so the income of about 100,000 RSD from the repurchase of waste would partially alleviate the lack of money to the organizer caused by the withdrawal of sponsors. The image of the event can be restored only by means of an effective strategic performance and raising the environmental awareness of the athletes by using celebrities in appropriate promotional campaigns (Dugalić, 2016b).

EXIT Music Festival, N. Sad, Serbia (215,000 visitors during 4 days): according to the data from the Energy Portal (2018), about 70 tons of waste were produced during the festival (mostly plastic cups and paper packaging), so the cost of its disposal at landfills should be taken into account in the financial plan for the next year. Assuming that the structure of waste is such that it produces 40 tons of paper, 25 tons of plastic and 5 tons of waste from cans, recycling would generate the following income: 1) from paper waste 240,000

RSD (40,000 x 6 RSD/kg), 2) from plastic waste 650,000 RSD (25,000 x 26 RSD/kg), and 3) from metal waste 350,000 RSD (5,000 x 70 RSD/kg), which is a total of about 1.24 mil. RSD on a single occasion.

The Trumpet Festival in Guča, Serbia lasts for 4 days too, and according to the data of the Dragačevo Tourist Organization, it sees 300,000-400.000 visitors. It is more than double in relation to Exit, but the landfill in Duboko (unlike Novi Sad) has almost no communal capacities. As it is an event that gathered the most visitors in the country, it produced cca 140 tons of various waste (applying the previous key, it would be: cca 80 tons of paper, 50 tons of plastic and 10 tons of metal waste). The calculation shows that the value of recycling waste from the Trumpet Festival is as much as 2.5 million RSD on a single occasion. According to the 2011 census, there are 3,710 inhabitants in Guča (Statistical Office of the Republic of Serbia, 2018), which comprises as many as 108 tourists per domicile population. These are the reasons why tourism cannot be imagined without quality management strategies that are primarily focused on the sustainable development of a tourist destination. The solution for all 3 events can be the installation of water supply tanks by organizers in order to reduce the consumption of bottled water, and consequently reduce the amount of waste. The motives of merchants for better sales of packaged food and beverages at similar events should be sanctioned due to the enormous production of municipal waste.

2. COMPARATIVE ANALYSIS OF TREATMENT AND SUSTAINABLE SOLUTIONS

Every inhabitant of Serbia produces at least 1 bottle of packaging waste per day, which means that a population of 7.057 mil. (2016), produces about 176.43 tons of plastic waste per day, and 64,395.13 tons per year. About 4.59 mil. RSD can be turned into a revenue from PET waste alone per day or 1.67 billion RSD per year. Most of this packaging ends up in landfills as an ecosystem contaminant. But PET is just a tip of the iceberg in terms of waste and a negative factor in sustainable development. Plastic packaging waste in Serbia accounts for 4% of the total amount of waste, while only 15% of the total waste (worth RSD 251.14 million) has been recycled. This means that plastic packaging worth 1.42 billion RSD per year ends up in landfills, as permanent (undecomposed) waste, which represents a loss for the state caused by the lack of will to deal with its waste. The 2009 Law on Packaging and Packaging Waste stipulates that "the polluter pays". The EU regulations initiate setting a national target on the volume of packaging to be recycled. It is conducted in the commercial and industrial sectors, and waste collection from the utility sector is almost non-existent, so the aim of the

paper is to raise awareness regarding the need to modernize the utility sector, responsible for collecting and sorting waste generated in tourism. The usefulness of PET packaging for tourists is manifold and widespread. It is used for various products: oil, juices, water, wine, beer, milk, chemicals intended for agriculture and pharmacy, household chemicals... It has the ability to contribute to mass use. A 500ml bottle made of PET is 10-15 times lighter than a glass bottle. It is quickly manufactured and shaped into the desired shape and colour. The colour is crystal clear, like glass, and recycled packaging is usually green or brown, and not fragile. It is characterized by non-toxicity, low cost of production, and environmental sustainability due to possible recycling. This packaging can be reused and well recycled, but that is what creates problems from the aspect of ecology and sustainable development because recycling in Serbia is at a very low level. Italy, for example, recycles 80% of PET packaging, on the principle of voluntary disposal, unlike the deposit type applied in Germany. According to the data of Ekoblog (2018), large quantities of new PET packaging are produced. The "bottle-to-bottle" recycling method is not successful because manufacturers use only 10% of recycled PET for fear that the market will not accept packaging that is not completely transparent. This system is the only way to reduce and prevent the creation of a new mass of PET. Recycled packaging waste becomes a raw material for other products (sports shoes and general use items), which is a less desirable way of recycling, but still a good way of conducting waste management. For this purpose, celebrities should be used as leaders who can influence consumers (Dugalić & Ivić, 2015). PET recycling provides fibre for the production of: clothes (approx. 25 bottles of 2l = 1 jacket), fillings for mattresses and pillows, carpets and furniture, geothermal bases for roads, construction isolation, mobile toilets, PET tape that replaces steel packing tape...

On average, every 3rd bottle reaches the ecosystem (usually oceans). According to GreenPeace (2018), the Mediterranean contains there is 1 piece of plastic in every 4m2. Forecasts until 2050 show that the amount of plastic in the world's seas will be greater than the existing fish stock. About 12.7 mil. tons of plastic end up in oceans every year. Data from the European Statistical Service, taken from the website of the Serbian Chamber of Commerce, show that 302 kg of waste was generated per capita in Serbia in 2014. Of that, 236 kg (78.15%) was sustainably treated (composted/recycled/land-filled/ burned), and 21.85% ended up in the ecosystem. Of the treated amount of waste in Serbia, only 1% is recycled, and 99% ends up in landfills. It is similar with the surrounding countries: in Montenegro, 99% of waste ends up in landfills, and in Turkey, Bosnia and Herzegovina, as well as Macedonia, all 100% of waste ends up in landfills. In 2014, each EU resident generated an average of 475 kg of waste, 44% of which was composted/recycled, which is 10% less than the record in 2002 (527 kg of municipal waste per capita

per year). Since 2007, municipal waste production per capita in the EU has been declining, and it is lower than production in the mid-1990s. From the production of waste per capita in the EU in 2014, 465 kg (of 475 kg) was treated: 28% was recycled, as much was dumped in landfills, 27% was incinerated and 16% was composted. The amount of waste per person varies among EU members: in Romania, Poland and Latvia, less than 300 kg of municipal waste is produced per person, and Denmark is a record holder - it produces 759 kg of waste per capita per year. EU members differ in how they treat municipal waste: Slovenia recycles 49%, Germany 47%, Austria composts the most (32%), followed by the Netherlands - 27% and Belgium - 21%. Recycling and composting in Germany in 2014, together accounted for 64% of waste, followed by: 61% in Slovenia, 58% in Austria, 55% in Belgium and 51% in the Netherlands. Treatment of half of the waste by means of incineration is the highest in Estonia with 56%, followed by 54% in Denmark, and 50% in Finland and Sweden. Only 1% of waste is disposed of in landfills in Denmark, Belgium, the Netherlands, Sweden and Germany, while the rest is composted, incinerated or recycled. On the other hand, Latvia disposes the most waste, as much as 92% in landfills, this number accounts for 88% in Malta, 83% in Croatia, 82% in Romania, 81% in Greece, 76% in Slovakia, 75% in Cyprus and 74% in Bulgaria. In the EU, the least waste per capita is produced annually by Romanians and the most by Danes. The most successful in terms of recycling and composting is Germany, which in that way processes 2/3 of its waste (Serbian Chamber of Commerce, 2018).

Economic analysis of municipal waste recycling in the function of sustainable development therefore becomes a significant aspect of business operations of companies and state administrations (Grbić, Brnjas & Todić, 2017). In Serbia, 7.057 million population produces about 2.13 mil. tons of waste per year, of which only 21,312 tons (1%) are recycled, and 2.11 mil. tons end up in landfills. Over 51 million tons of waste per year is produced in Serbia, beside the industrial waste. The publication of the Statistical Office of the Republic of Serbia (2018) - Generated and Treated Waste, 2017 (http://publikacije.stat.gov.rs/G2018/Pdf/G20181191.pdf) shows that in 2017 all sectors of economic activities in Serbia together produced 48.9 mil. tons of waste. That is a growth of 3.3% compared to the year before. The share of non-hazardous waste was 64.7% and hazardous as much as 35.3%. According to the authors of the publication, the generated quantities of waste are declining in most sectors of economic activities. Observed by sectors, in 2017, in relation to the year before, there was a movement of the generated amount of waste: Agriculture - a decrease of 6.3%, Mining - a decrease of 0.8%, Manufacturing - a growth of 28.3%, Electricity, gas and steam supply - a growth of 27.1%, water supply and wastewater management - a decrease of 12%, Construction - a decrease of 4.3%, and the Service sector - a decrease of 15.6%. The increase

in the generated amount of waste in the Manufacturing industry is the result of increased production in the field of production of basic metals, while in the supply of electricity, gas and steam the increase occurred due to greater production of electricity in thermal power plants. However, the treatment and utilization of waste is also growing, so in 2017, a total of 48.3 million tons of waste was treated as shown in Table 1. Of the total amount of waste treated, 46.5 million tons were disposed of (96.2% ended up in landfills). Reused quantities of waste recorded an increase in 2017, compared to the previous year, which was mainly due to increased recycling of metal waste. The amount of recycled waste used as fuel for energy production was 14.7% higher than in 2016.

Way of garbage treating	2017, 000 tons	%
Total	48 318	100
Use of waste as fuel for energy production	97	0,20
Reused	1 727	3,57
Recycled	1 402	2,90
Waste for backfilling	325	0,67
Disposed of	46 495	96,23
Disposed of in landfills	46 375	95,98
Other ways of disposal	120	2,48

 Table 1. Waste treatment in Serbia, 2017

Source: Statistical Office of the Republic of Serbia (2018)

According to the data of the Statistical Office of the Republic of Serbia (2018), its Foreign Trade activity (export, import) shows that from January to May 2018, waste worth 70.7 mil. \$ was exported, while the value of imported waste was 48.1 mil. \$. Compared to the same period in 2017, 0.5% more waste was exported and 13.1% more was imported (Exports and Imports by Activity, Waste Collection, Treatment and Disposal http://publikacije. stat.gov.rs/G2018/ Pdf/G20183008.pdf). At the same time, various types of waste (secondary raw materials) were imported, which represents a foreign exchange outflow of 48.1 mil. \$. If we add the waste left behind by tourists who come en masse because of worldwide events, the problem that needs to be solved is even bigger. It was recommended that the Ministry of Tourism, Trade and Telecommunications includes the problem of solving municipal waste in tourism in the Call for Awarding Subsidies and Grants Intended for Tourism Development Projects, 2018. The right to use non-refundable subsidies according to economic classification 451: Subsidies to public non-financial companies and organizations is enjoyed by: destination management organizations, companies, institutions established by the Government / local self-government units, which are not indirect budget users, legal entities in which the Republic of Serbia is the majority owner and legal entities managing tourist facilities/venues of tourism superstructure and infrastructure, local self-government units according to the Law on Local Self-Government, tourist organizations, and other legal entities established by local self-governments, entrusted with the performance of activities in the field of tourism. The condition is that these projects provide, among other things: improvement / construction of the existing infrastructural communal system as a base for capacity development in tourism, water supply and drainage systems with wastewater treatment, while there are no requirements for solving municipal waste left by tourists (which is enormous).

CONCLUSION

Research shows that the increase in attendance of event tourism creates problems in tourist destinations, especially where there are no quality management strategies, including waste management. The largest quantities of waste in event tourism by mass and order are: paper (organic) waste, plastic waste (which can be successfully commercially recycled), metal, and glass waste (packaging waste from food and beverages). The analysis shows that the visitors of only two (otherwise the most visited) tourist events in Serbia (Guča Trumpet Festival and Exit), produce about 210 tons of waste on a single occasion, which can be recycled if the organizers implement an adequate strategy. This alone would generate around 3.75 mil. RSD per year (USD 35,700) of additional income for the country. Research also shows that Serbia annually imports waste worth 48.1 mil. US \$. It means that by these 2 events alone, Serbia could cover an additional 77.03% of import waste needs. If the appeal of the profession and reason is not complied with in terms of event tourism, Serbia will endanger its economic and social development and ecosystem in the foreseeable future. The current volume of 99% of its untreated industrial and municipal waste indicates the unsustainability of its future development and requires urgent action to reduce the recycling and composting rate to the EU average of 44%. If the percentage of waste treatment increased by 1% per year, Serbia would reach this average in just under half a century. The solution is to improve the capacity for recycling primarily municipal waste by the state, as well as the introduction of quality management strategies in tourism with special emphasis on the sustainability of factors underlying event tourism (number of tourists relative to population in the tourist destination, water supply, purchase and waste treatment by means of recycling, raising awareness about the harmfulness of waste in public, etc.).

REFERENCES

- Beke-Trivunac, J. & Vidović, N. (2018). Doprinos javno-komunalnih preduzeća za vodosnabdevanje održivom korišćenju vodnih resursa u Srbiji. *Ecologica* (89), 111-117.
- 2. Beogradski maraton. (2018, avgust). www.bgdmarathon.org/
- 3. Bjeljac, Ž. (2006). *Teorijske osnove manifestacionog turizma* (T. 67). Beograd: SANU GI Jovan Cvijić.
- Bjeljac, Ž. (2010). Turističke manifestacije u Srbiji (T. 82). Beograd: SANU GI Jovan Cvijić.
- Dugalić, S. (2013). Management of Activities in the Opening of Sporting Events Through the Techniques of Network Planning. *Sportlogia*, 9(2), 69-79.
- 6. Dugalić, S. (2016). Significance of Sport and Athletes' Behaviour on Forming People's Attitudes. *Sport Science & Practice*, 6(1-2), 5-22.
- Dugalić, S. (2017a). Izazovi bezbednosti u destinacijama verskog turizma. *SITCON*, (68-74). Beograd. doi:10.15308/Sitcon-2017-68-74
- 8. Dugalić, S. (2017b). *Upravljanje sportskim objektima*. Beograd: Singidunum University.
- Dugalić, S. & Ivić, J. (2015). Angažovanje slavnih sportista u promociji proizvoda i usluga. *Marketing*, 46(3), 207-216. doi:10.5937/markt1503207D
- Dugalić, S. & Lazarević, S. (2016). The Impact of Celebrity Endorsement on Purchasing Habits. *Facta Universitatis, Series: Physical Education & Sport*, 14(3), 435-446. doi:10.22190/FUPES1603435D
- 11. Dugalić, S. & Lazarević, S. (2018). The Digitalization of Active Outdoor Trips in Serbia. *In Tourism in Function of Development of the Republic of Serbia* (pp. 290-307). Vrnjačka Banja: Fakultet za hotelijerstvo i turizam.
- 12. Ekoblog. (2018, avgust). http://ekoblog.info/rs/pet-ambalaza-problem-koji-raste-ali-bukvalno/
- 13. Energetski portal. (2018, avgust). *Sa Egzita prikupljeno oko 70 tona otpada.* www.energetskiportal.rs/tokom-exit-a-prikupljeno-70-tona-otpada/
- Grbić, V., Brnjas, Z. & Todić, D. (2017). Ekonomska analiza reciklaže komunalnog otpada u funkciji održivog razvoja. *Ecologica* (88), 882-885.

- 15. GreenPeace. (2018, maj). *A toolkit for a Plastic-Free Future*. https://storage.google apis.com/p4-production-content/international/wpcontent/uploads/2018/05/9eelf 850-ocean-plastic-toolkit.pdf
- 16. International Association of Athletics Federations. (2018, avgust). www. iaaf.org/competition/calendar
- International Standard Industrial Classification. (2008). Preuzeto August 24, 2018, sa https://unstats.un.org/unsd/publication/seriesm/seriesm_4rev4e.pdf
- 18. JKP Gradska čistoća. (2018). *Cenovnik otkupa sekundarnih sirovina*. Beograd.
- Konkurs za dodelu subvencija i dotacija namenjenih za projekte razvoja turizma. (2018, maj). Preuzeto sa http://mtt.gov.rs/download/Konkurs(2). pdf
- 20. National Association of Corrosion Engineers. (2018, avgust). www.nace. org/uploadedFiles/Committees/List%20of%20NACE%20Standards.pdf
- 21. Pravilnik o bližim uslovima za obavljanje sportskih aktivnosti i sportskih delatnosti. (2017). Sl. glasnik RS, 42.
- Privredna komora Srbije. (2018, maj). U Srbiji se proizvede 300 kg otpada po stanovniku. www.kombeg.org.rs/aktivnosti/c_tehno/Detaljnije. aspx?veza=18945
- 23. Republički zavod za statistiku. (2018). Statistički godišnjak Srbije.
- 24. Strategija razvoja sporta u RS 2014-2018. (2015). Sl. Glasnik RS, 1.
- 25. Strategija razvoja turizma Republike Srbije za period 2016-2025. (2018, avgust). http://mtt.gov.rs/download/3/strategija.pdf
- 26. World Commission on Environment and Development. (1987). *Our Common Future*. Oxford University Press.
- 27. Zakon o sportu. (2016). Službeni glasnik RS, 10.