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## Abstract

Slovak spas are part of the public healthcare system. This system is under pressure due to the demographic trend of an ageing population and increasing healthcare costs, including costs expended by health insurance companies on spa care. The aim of this research note is to describe the relationship between medical and non-medical forms of spa tourism. By means of a case study, it describes the importance of public health insurance to the occupancy rate of accommodation capacity, the manner of payment for spa care and its medical or wellness character. In addition, it analyses the current financial situation of these operations. The traditional exploitation of natural healing springs for treatment, its connection to the public health insurance system and the level of spa treatments result in the prevalence of medical stays.

## Keywords

financial analysis, health insurance, health tourism, spas

# Introduction

As stated by Gustavo (2010):

faced with the expansion and privatisation of the healthcare scope, there has been a proliferation and diversification of services and facilities like spas, where leisure and health cross paths and which, in view of their growing relevance, have been entitled health tourism or health and wellness tourism. This new conceptual designation not only reflects the growing emphasis on the wellness perspective of health, but also significant growth in this niche market and its consequent specialisation.

**Corresponding author:** Jan Derco, Technical University of Kosice, Nemcovej 32, Kosice 042 00, Slovakia. Email: jan.derco@tuke.sk European countries that relied on visitors being subsidised by their respective National Health Insurance Systems also experienced a downturn of business in their spa resorts over the last decade of the twentieth century. However, this has changed in the wake of the wellness movement, and the new environment has encouraged many hot and mineral spring towns to reinvest in their natural resources and combine the use of healing waters with new and upgraded wellness resorts and retreats. (Erfurt-Cooper, 2009)

The Slovak healthcare system has been under increasing pressure over the past decade due to escalating healthcare costs and the 2008 financial crisis. These changes have also had a significant impact on the health and wellness tourism market and pose challenges as well as opportunities for the industry (Derco, 2014). On the other hand, wellness products are being shifted to the hotel industry, as they are not linked to natural healing resources. The hitherto released publications concerning Slovak spas (Cuka and Rachwal, 2013; Kotikova and Schwartzhoffova, 2013; Kučerová et al., 2010; Kučerová, 2013; Matlovičová et al., 2013) do not describe the relation of medical versus wellness stays to the total performance figures for those undertakings. Therefore, the aim of this article is to analyse the importance of public health insurance, medical spa treatments in relation to the total rate of occupancy of the accommodation capacities of the spas in 2005–2013. Besides this, it also analyses their current financial situation.

## Methodology

Of the various methods of analysis available, a case study approach was considered to have the key requirements for our line of inquiry as it illuminates the complex processes surrounding economic aspects and subsequent impacts on the spa tourism industry. This analysis has been compiled using secondary data sources, such as statistical publications (Health Statistics Yearbook of the Slovak Republic 2005–2013 (2006, 2007, 2008, 2009, 2010, 2011, 2012, 2014, 2015); Spa tourism 2014/2013). Information concerning the numbers of domestic and foreign clients, the manner of payment for the treatments they receive in spa resorts and the type of diseases treated are annually published by the National Health Information Centre in its yearbooks (Health Statistics Yearbook of the Slovak Republic 2005–2013). However, the information only includes data regarding stays focused on medical spa tourism. Data on the capacity and the total number of accommodated persons in Slovak spa facilities are based on a report which is prepared annually by the Slovak Tourist Board (2015) based on data from the Statistical Office of the Slovak Republic. The comparison of the total number of accommodated persons and the number of clients using spa care for medical treatment purposes makes it possible to estimate the size of the wellness segment indirectly.

In Slovakia, there are currently 20 companies operating natural medical spas and 8 companies operating 'spa sanatoria'. Out of them, 21 spas have the legal status of a business (limited liability company or joint-stock company). The other entities have the legal status of a non-profit, state-owned or government-subsidized organization. Analysis of financial indicators (Table 2) is only aimed at businesses and based on the information published on the portal www.zisk.sk. When assessing this group, medians were worked out for the chosen ratios (return on sales, return on equity, Earnings Before Interest, Taxes, Depreciation and Amortization (EBITDA), cash ratio, acid test ratio, current ratio, average collection period, average payment period and Debt to total assets ratio) for 2012–2014.

## **Results and discussion**

Spas, typically, are medical spas which offer healthcare aimed at stabilizing the state of health, regeneration or prevention of diseases and which exploit natural healing waters or climatic conditions suitable for treatment purposes (Mineral Spring Spas). Spa care indicated for health reasons is fully (category A) or partially (category B) covered by public health insurance. The indications and length of medical stays (21-28 days) are set forth in Act No. 577/2004 on the Scope of Health Care Covered by Public Health Insurance and on Payments for Services related to the Provision of Health Care. Category A includes indications where healthcare is fully covered by public health insurance, but accommodation and catering services are covered by public health insurance only partially (only a statutory charge is paid). Category B includes indications where healthcare is covered fully by public health insurance but accommodation and catering services are not. The financial stability of these undertakings is based on the balance between medical products covered by public health insurance and medical and wellness products reimbursed by patients. An example from the Czech Republic shows that government interference can jeopardize the financial stability of those operations. Legislative amendments dated 2013, and the restrictive indication list, shortened the length of a stay from 4 to 3 weeks for certain diseases, restricted repeated stays and excluded certain diseases so that they are no longer reimbursed by health insurance companies. These changes have resulted in lower visitation rates and revenues. While insurance companies paid an amount of 153 million (USD) in 2012, in 2013, it was only 77 million (USD). As problems for spas in the Czech Republic were mounting, the legislation was amended once again. Since 2015, the length of a stay has again been extended to four weeks in the case of certain diseases, and the regulatory charges have been cancelled. Spas are recovering and their economic results are almost the same as before, though the policyholder visitation rate has not returned to the level reached in 2010 or 2011 before the restrictive measures were implemented. Spas have again gained the trust of banks, which makes it possible for them to borrow money for investments (COT business, 2015). Reform of the healthcare system and reducing spa care costs in the Czech Republic (Attl and Certik, 2011) or in Germany (Pforr and Locher, 2012) have affected the demand for spa care in other central European countries, as well. To overcome these challenges, officially recognized spas within the Czech Republic (Kiralova, 2014) and Germany now more and more develop health and wellness promotions as a second business platform alongside more traditional medical stays.

Spas in the Slovak Republic operate 99 accommodation facilities. In 2014, those facilities accommodated 299,032 guests and recorded 2,617,609 overnight stays. The percentage of spa tourism compared to the total number of overnights in accommodation facilities in Slovakia reached 24% in 2014 (Slovak Tourist Board, 2015). The rate of occupancy of permanent beds in spas is much greater than the Slovakia-wide average rate of occupancy of permanent beds in the accommodation facilities (Table 1). After 2008, the number of foreign visitors dropped significantly. In the following years, their number did not return to the pre-crisis level either (Table 1). The spas' main markets include Germany, the Czech Republic, Israel, Russia, Austria and Poland (Slovak Tourist Board, 2015). The decrease was attributed not only to the economic crises but also to strong Euro exchange rates after its introduction in Slovakia in 2009 (leading to a decrease in the number of visitors from the Czech Republic and Poland). While the number of domestic visitors declined in 2009 (Table 1), their number of overnights increased. Between 2005 and 2013, the percentage of medical stays covered by public health insurance in the total number of domestic visitors was 29.14%. The percentage of medical stays reimbursed by domestic clients reached

Table 1. Capacities and performance figures of spa accommodation facilities in Slovakia in 2005-2014.

Indicator	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Number of accommodation facilities	67	67	94	94	94		89	001	101	66
Number of rooms	6140	5862	6165	6375	6577		6003	6101	6346	6448
Number of beds	11,804	11,314	11,916	12,370	12,793		11,795	11,841	12,302	12,888
Number of domestic visitors	139,877	159,339	178,895	192,051	180,983		196,085	194,500	210,311	230,343
Of which medical stays reimbursed by insurance company	38,662	41,369	54,806	55,294	56,706	57,700	58,867	55,799	60,584	I
Health insurers' expenses on spa care in thousand USD	I	24,958	31,081	34,339	33,910		43,322	51,484	I	I
Of which medical stays reimbursed by patient	40,426	51,652	49,363	47,063	41,538		48,425	52,786	53,417	I
Number of foreign visitors	88,945	93,921	97,269	92,755	60,326		65,430	61,880	68,118	68,689
Of which medical stays reimbursed by insurance company	1546	744	796	454	378		524	465	245	I
Of which medical stays reimbursed by patient	45,882	54,453	52,318	49,475	35,269		35,118	35,073	39,465	I
Total number of visitors	228,822	253,260	276,164	284,806	241,309		261,515	256,380	278,429	299,032
Average number of overnights spent by domestic visitors	9.4	8.9	8.9	9.5	10.2		9.6	9.6	9.4	6
Average number of overnights spent by foreign visitors	9.5	9.1	8.8	8.5	9.1		œ	8.5	8.4	8
Rate of occupancy of permanent beds in spa undertakings (%)	52.6	59.9	62.8	62.3	58.9		60.9	59.9	62	62.4
Rate of occupancy of permanent beds in accommodation facilities in Slovakia (%)	27.3	28.8	27.7	26.9	22.4		21.7	21.4	22.3	24.8
Source: Slovak Tourist Board (2015), Health Statistics Yearbook of the Slovak Republic 2005–2013 (2006, 2007, 2008, 2009, 2010, 20112012, 2014, 2015), Data processed by the	lovak Repul	blic 2005–2	013 (2006	, 2007, 200	8, 2009, 20	010, 20112	012, 2014.	2015). Dat	a processe	d by the

zui of, wata processed by the 14, 2014, 2007, 2010, 201120 -2013 (2000, 2007, 2000, *source*: slovak I ourist Board (2015), Health Statistics Tearbook of the Slovak Republic Statistical Office of the Slovak Republic and the National Health Information Centre.

	Year			
Indicator	2012	2013	2014	
Return on sales (%)	0.38	2.31	1.74	
Return on equity (%)	0.16	2.01	2.5	
EBITDA (USD)	380,158	690,352	584,553	
Cash ratio	0.8	0.42	0.24	
Acid test ratio	1.97	1.59	1.42	
Current ratio	2.05	1.74	1.43	
Average collection period	37.05	37.3	33.8	
Average payment period	37.2	35.8	42.6	
Debt to total assets ratio	0.33	0.32	0.36	

**Table 2.** Medians of the chosen financial ratios of the spa undertakings in Slovakia.

Source: Prepared by the authors according to the information published at http://www.zisk.sk/

26.10% of the total number of domestic visitors in the given period. The medical stays of foreign visitors covered by public health insurance accounted only for 0.83% of the total number of foreign visitors in the reporting period. As to the medical stays of foreign visitors, most of them were self-payers (nearly 55.5%).

According to J. Zálešáková, President of the Association of Slovak Spas (personal communication, 10 February 2016):

Wellness products in medical spas are, more or less, a supplementary activity and mostly used by domestic clients. The advantage is that those products also have a medical history – they are referred to as medical wellness products, in contrast to wellness products that are offered by common hotel facilities. The Slovak Republic has superior-quality medical spa products, and, therefore, this segment can be expected to be increasingly sought-after among both domestic and foreign clients to whom the European Parliament and Council Directive 2011/24/EU on the Application of Patients' Rights in Cross-border Healthcare applies. The preconditions for the development of this segment can also be seen in the estimated demographic figures and in the development of the state of health of the population in Europe.

Although the total visitation rate rose, the return on sales ratio went down in 2014. However, the return on equity ratio has been developing favourably. To compare the profitability of firms on an international basis, Table 2 shows the EBITDA ratio, as it excludes taxes and interest and, at the same time, allows for depreciation. Between 2012 and 2014, liquidity ratios decreased. Concurrently, in 2014, the difference between the average collection period and the average payment period increased, which suggests a worse payment discipline on the part of those undertakings. Borrowed capital represents nearly one-third of total assets.

# Conclusion

Between 2005 and 2013, the proportion of medical stay clients to the total number of visitors did not vary significantly. It was due to spas focusing on medical care (Smith and Puczkó, 2010) and the good standard of medical services rendered. In this segment, greater emphasis is typically placed on factors such as medicinal waters, medical assistance and staff (Alén et al., 2006), as opposed to the wellness segment, the preferences of which have been defined by Denizci Guillet and Kucukusta (2016), Kamata and Misui (2015). Concurrently, the number of domestic clients increased in the reporting period. After 2008, the economic crisis resulted mainly in a lower number of foreign visitors. Domestic health insurance companies did not apply a restrictive policy as to the number of patients sent to undergo spa treatments. In contrast to the Czech Republic, no substantial amendments have been made to Slovak Act No. 577/2004 on the Scope of Health Care Covered by Public Health Insurance and on Payments for Services related to the Provision of Health Care. Act No. 363/2011 has only brought a reclassification of certain diseases within categories A and B. Stable spa care legislation and the health insurers' contracting policy had a substantial impact on reported economic results.

The first limitation of this study is the fact that it focuses on the reality of one single country. It is important to stress that Slovakia is located in Central Europe, a region where the spa sector and its social status are more prevalent than in other parts of the world. The second limitation of this study pertains to its period of application, which for technical and financial reasons was limited to the years 2005–2013 and 2012–2014, when a full decade of application would have been pre-ferable. The third limitation is the fact that the total number of accommodated clients also includes persons accompanying medical spa clients. On the other hand, in case of spa residents, spa treatment can take the form of an outpatient service.

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### References

- Alén ME, Fraiz JA and Rufín R (2006) Analysis of health spa customers expectations and perceptions: the case of Spanish establishments. *Polytechnical Studies Review* 3(5/6): 245–262.
- Attl P and Certik M (2011) The financing of czech spas with health insurance funds. In: Proceedings of the 10th International Conference -Liberec Economic Forum 2011 (ed Kocourek A), Liberec, Czech Republic, 19–20 September 2011, pp. 17–23. Liberec: Technical University of Liberec.
- COT business (2015) Experts: after the miserable year 2013 the spas are again in good condition. Available at: http://www.icot.cz/znalci-lazne-jsou-po-krutem-roce-2013-znovu-v-kondici/ (accessed 7 January 2016).
- Cuka P and Rachwal T (2013) Economic, touristic and therapeutic potential of natural water springs in Slovakia.
   In: International Multidisciplinary Scientific GeoConference SGEM: Surveying Geology & Mining Ecology Management, Albena, Bulgaria, 16-22 June 2013, Vol. 2, pp. 89–96. Sofia: STEF92 Technology.
- Denizci Guillet B and Kucukusta D (2016) Spa market segmentation according to customer preference. International Journal of Contemporary Hospitality Management 28(2): 418–434.
- Derco J (2014) The slovak spas in the light of the health care system. *Tourism Planning and Development* 11(2): 243–252.
- Erfurt-Cooper P (2009) The health and wellness concept: a global overviewIn: Erfurt-Cooper P and Cooper M (eds) *Health and Wellness Tourism: Spas and Hot Springs*. Bristol: Channel View, pp. 25–48.
- Gustavo NS (2010) A 21st-century approach to health tourism spas: the case of Portugal. *Journal of Hospi*tality and Tourism Management 17(1): 127–135.
- Health Statistics Yearbook of the Slovak Republic 2005. (2006) Bratislava: National Health Information Centre.
- Health Statistics Yearbook of the Slovak Republic 2006. (2007) Bratislava: National Health Information Centre.

- Health Statistics Yearbook of the Slovak Republic 2007. (2008) Bratislava: National Health Information Centre. Health Statistics Yearbook of the Slovak Republic 2008. (2009) Bratislava: National Health Information
- Centre.
- Health Statistics Yearbook of the Slovak Republic 2009. (2010) Bratislava: National Health Information Centre.
- Health Statistics Yearbook of the Slovak Republic 2010. (2011) Bratislava: National Health Information Centre.
- Health Statistics Yearbook of the Slovak Republic 2011. (2012) Bratislava: National Health Information Centre.
- Health Statistics Yearbook of the Slovak Republic 2012. (2014) Bratislava: National Health Information Centre.
- Health Statistics Yearbook of the Slovak Republic 2013. (2015) Bratislava: National Health Information Centre.
- Kamata H and Misui Y (2015) Why do they choose a spa destination? The case of Japanese tourists. *Tourism Economics* 21(2): 283–305.
- Kiralova A (2014) Medical spa and wellness spa where are they heading? The CASE OF the Czech Republic. In: Proceedings of the 24th International Business Information Management Association Conference - Crafting Global Competitive Economies: 2020 Vision Strategic Planning and Smart Implementation (ed Soliman KS), Milan, Italy, 6–7 November 2014, pp. 516–526. Norristown: IBIMA.
- Kotikova H and Schwartzhoffova E (2013)Health and spa tourism in the Czech and Slovak RepublicsIn: Hall CM (ed.) *Medical Tourism: The Ethics, Regulation, and Marketing of Health Mobility*. Abingdon: Routledge, pp. 109–122.
- Kučerová J (2013) Impact of economic crisis on the spa businesses in Slovakia. In: 2nd International Scientific Conference on Tourism in Southern and Eastern Europe: Crisis - a Challenge of Sustainable Tourism Development? (eds Jankovic S and Jurdana DS), pp.175–183. Opatija: University of Rijeka.
- Kučerová J, Marčeková R and Nedelová G (2010) Wellness tourism in Slovakia. Moravian Geographical Reports 18(3): 2–13.
- Matlovičová K, Kolesarová J and Židová A (2013)Slovak spas in the context of change current conditions, issues and challenges. In: Dej M, Huculak M and Jarczewski W (eds) Recreational Use of Geothermal Water in Visegrad Group Countries. Kraków: Institute of Urban Development, pp. 161–173.
- Pforr C and Locher C (2012) The german spa and health resort industry in the light of health care system reforms. *Journal of Travel and Tourism Marketing* 29(3): 298–312.
- Slovak Tourist Board (2015) Spa tourism 2014/2013. Available at: http://www.sacr.sk/sacr/statistiky/ (accessed 4 January 2016).
- Smith M and Puczkó L (2010) Taking your life into your own hands? New trends in European health tourism. *Tourism Recreation Research* 35(2): 161–172.