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# The Effect of Restorative Servicescape Perceived by Casino Integrated Resort Visitors on Place Attachment and Place Loyalty

Song Sun-Young\*, Cha Gil-Soo

Department of Hotel Management, Kyonggi University, Seoul, Republic of Korea

## Email address:

ssunniesong@naver.com (Song Sun-Young), gscha@kyonggi.ac.kr (Cha Gil-Soo)

\*Corresponding author

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**Abstract:** This study examined the Impact of restorative servicescape perceived by casino integrated resort visitors on place attachment and place loyalty, and the effect of place attachment in the relationship between restorative servicescape and place loyalty. Through this research, the aim is to explore ways to effectively create a service environment for casino businesses and to establish efficient place marketing strategies that can provide a differentiated and competitive advantage. First, a preliminary investigation was conducted to examine the concepts and characteristics of the study subjects, and a questionnaire based on these findings was used. To increase the validity of the questionnaire in this study and to select a sample with a high understanding of the concept of casino integrated resorts, face-to-face offline research was conducted targeting employees in the management sector of Paradise City Casino Integrated Resort in Yeongjongdo, Incheon. Among them, visitors who were over 20 years old and had visited overseas casino integrated resorts such as Macao, Philippines, Singapore, Vietnam, and Las Vegas within the past two years were selected as the sample. A total of 410 questionnaires were distributed and collected from July 3, 2020, to August 11, 2020. Out of the 410 collected questionnaires, only 374 valid questionnaires were used, excluding 36 that showed inaccurate or insincere tendencies. Empirical analysis was conducted using SPSS 23.0, AMOS 23.0, structural equation modeling, and Sobel's Z test. The study results revealed that the restorative servicescape perceived by casino integrated resort visitors significantly influenced both place attachment and place loyalty. Visitors' place attachment had a positive and significant impact on place loyalty, and place attachment was found to serve as a partial mediator in the relationship between restorative servicescape and place loyalty. Based on the research findings, the academic and practical implications of this study were presented, along with the study's limitations and suggestions for future research.

**Keywords:** Casino Integrated Resort, Restorative Servicescape, Place Attachment, Place Loyalty

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## 1. Introduction

Casino integrated resorts refer to resorts that offer not only casinos but also a combination of hotels, convention centers, theme parks, performance halls, recreational facilities, restaurants, and shopping centers [31]. According to the Casino Tourism Association, the casino industry not only serves as a tourism industry for attracting foreign tourists and securing foreign currency but also has a significant employment creation effect [26]. To prevent the outflow of foreign currency by domestic citizens and increase fiscal

revenue, countries are competitively constructing casino-inclusive integrated resorts and expanding casino extensions and support [23]. Global companies are also focusing on increasing competitiveness through large-scale investments, expansion, theming, and differentiation in places such as Macao, Singapore, the Philippines, and Vietnam [25]. Nearby Japan also passed the Integrated Resort (IR) bill in 2018 to promote the casino industry and revitalize the stagnant economy [45].

In response to such trends, casino companies operating casino integrated resorts must strive to not only improve the

quality of their services to compete with neighboring countries but also to develop optimal solutions for the casino integrated resort environment and attract visitors to secure a leading position in the international tourism market. Creating a service environment that delivers high-quality services in the third places such as theme parks, hotels, conventions, food and beverage, galleries, and performance halls, in addition to the physical attributes of the casino gaming facilities themselves, is considered an essential element for the success of casino integrated resorts. However, there is still a lack of research on the casino integrated resort service environment and the development and management of large-scale complex facilities in Korea.

In recent domestic and international research, based on the conceptual foundation of Attention Restoration Theory (ART) and Bitner's (1992) physical servicescape structure, theoretical discussions and verification studies are being conducted on the factor structure of 'restorative servicescape' such as the recoverable natural environment provided as a service environment in a specific place [79, 80]. It has been reported that commercial service environments in specific places can include restorative servicescape factors that help consumers recover from symptoms related to directed attention fatigue [78]. Considering the recent research trends in restorative servicescape related to specific commercial service environments, it is highly significant to study on how restorative servicescape, which is perceived as a recovery environment that helps recover symptoms related to visitors' fatigue or stress, affects visitors' place attachment and place loyalty in large commercial service environments such as casino integrated resorts. Due to the nature of the industry, visitors' mental fatigue and stress are relatively high, making it crucial to examine how the benefits of restorative servicescape in the third places, such as casino floors, hotels, theme parks, F&B facilities, shopping malls, and golf courses, which visitors prefer and seek within casino integrated resorts, affect consumers who use these places.

The direction of this research can predict visitors' approach/avoidance decisions and consumption behavior, helping to restrain indiscriminate development and contribute to cost savings in the increasingly large-scale casino integrated resort development and operation, while also providing suitable environmental management strategies for efficient customer management outcomes. Therefore, this research is expected to be highly useful in the practical aspect of operating large-scale casino integrated resorts.

In addition to the research on restorative servicescape, this study also aims to investigate the impact of place attachment in commercial service environments such as casino integrated resorts. Since visits can be temporary and one-time events, this research intends to expand the theoretical application of place attachment by incorporating it into commercial service environments rather than natural environments, which have been outside the scope of marketing research so far. Qualitative studies on place attachment-place loyalty suggest that when consumers form place attachment through recovery experiences in consumer spaces such as restaurants, nursing homes, cafes, university

classrooms, libraries, banks, boarding houses, pensions, and clothing stores, they exhibit place loyalty in terms of repeated revisits and voluntary place-supporting behaviors [13].

This study aims to analyze the relationship between restorative servicescape perceived by visitors to casino integrated resorts, place attachment, and place loyalty. Additionally, it focuses on empirically clarifying the mediating effect of place attachment in this relationship. Through this research, the exploration of suitable restorative service environment strategies and efficient place marketing practices for large-scale casino integrated resorts is expected.

## 2. Theoretical Background

### 2.1. Restorative Servicescape

The term 'servicescape' refers to the environment in which services are created and interactions occur between service providers and customers in the service sector [35]. It is a place where service providers offer services and products, or in other words, a place where service employees and customers participate to facilitate the service [32]. A new area of servicescape, 'restorative servicescape', is defined as the physical environment that includes the conditions of a restorative environment as perceived by visitors [2, 14, 15].

Early marketing researchers' studies on servicescape generally focused on physical elements [79] and tended to regard the place as a simple geographic location where consumers interact [79, 85]. They did not pay attention to the social or symbolic dimensions of the specific places that make up the service environment in which the service is provided [24]. Bitner (1992), who first introduced the term servicescape, revealed that physical servicescape elements, such as temperature, scent, and music [42, 85], affect consumers' approach and avoidance behaviors [68, 71, 91]. Although Bitner's research was significant, it overlooked the fact that the social and symbolic meanings of some commercial places [78] can be essential for customers' health and individual well-being [79].

Rosenbaum (2009) introduced the term 'restorative servicescape' based on the attention restoration theory [61], which has been mainly explored in environmental and natural psychology. Rosenbaum (2009) provided evidence that restorative characteristics, previously studied in natural environments, could also be applied to the service environments of commercial spaces [2, 17, 79]. According to the attention restoration theory, a 'restorative environment' is not a specific physical environment but an environment perceived to be psychologically [1, 17, 27, 29, 41, 54, 61, 63, 89, 92, 94]. People can naturally recover from 'directed attention fatigue (DAF)' through restorative environments that stimulate 'involuntary attention' without making any special effort [1, 40, 54, 61, 79]. In the context of restorative environments derived from attention restoration theory, the scope of servicescape can include restorative environmental elements that help consumers recover [79]. Restorative servicescape, which convey restorative meanings that can be enhanced depending on the environment, have the

characteristic of alleviating the negative aspects of directed attention fatigue (fatigue, stress, depression, ADHD, etc.) and helping consumers recover [79, 80]. Such restorative servicescape help develop attachment to places where people have restorative experiences and assist in regulating emotional balance [62, 79]. Moreover, restorative servicescape perceived as attached to restorable third places are significantly correlated with commercial and social support for places, place attachment, and customer health [79]. Restorative servicescape in elderly centers or cancer centers form deep bonding attachment relationships with people, alleviating negative symptoms related to fatigue, and enabling more tasks to be accomplished with fewer resources through social interaction [81, 82]. Therefore, restorative servicescape provided as service environments can interact with 'physical environment' factors, 'social environment' factors such as employee behavior, customer relationships, and density, and 'socio-symbolic environment' factors related to specific places. These interactions influence the approach/avoidance decision-making of employees and customers, and can either enhance or limit their social interaction behaviors [80].

Recently, researchers in the servicescape field have argued that service environments that interact with humans, in addition to natural environments, can also function as restorative environments that reduce stress if they possess the four restorative characteristics of 'being away', 'fascination', 'coherence', and 'compatibility' [14]. The first characteristic of a restorative servicescape, 'being away', provides people with a break from everyday worries or a temporary escape to another place [79], regardless of distance, giving people the feeling of being momentarily transported to another world [80]. The second characteristic, 'fascination', refers to the ability of an attractive service environment to capture a person's attention [80], providing psychological pleasure and soft fascination [28, 61]. The third characteristic, 'coherence', is an overall emotion of perceiving spatial freedom and seamlessness in a restorative environment through a certain scale [39], to the extent that an environment can constitute a completely different world from the perspective of a person [79]. The fourth characteristic, 'compatibility', is the ability of an environment to provide a sense of belonging [79] or individual place congruence [68] to an individual [77, 80], reducing or eliminating a person's directed attention and enabling them to perform their activities smoothly [79].

According to recent research, it has been reported that the restorative characteristics obtainable from nature can be replicated in the service environment of a integrated resort, creating a restorative environment [14]. The restorative servicescape of hotels or resorts impacts the perceived value of customers through the mediating effect of restorative experiences [2], and the servicescape of resorts perceived as restorative environments is emphasized as a necessary condition for improving customer leisure satisfaction and revisit intentions [17].

## 2.2. Place Attachment

Place attachment was first derived from 'attachment', an

intimate emotional relationship formed with a caregiver or special social subject based on trust, as proposed by psychoanalyst Bowlby (1969) [11]. Environmental psychologists Stokols and Shumaker (1981) explained the concept of attachment as 'sense of place', providing a conceptual basis for place attachment that human perception of a specific place affects behavior [16]. Humanist geographer Tuan (1976) defined 'attachment' as a personal bond concerning geographical places and 'place attachment' as a bond that includes geographical piety (geopiety) and topophilia (place love), showing sympathy, respect, gratitude, and interest in a specific place, as well as attachment to family and hometown [22, 70, 90]. This place attachment can be understood as being formed through the interaction between place identity, which includes physical setting, human activity, and meaning, and the person, and is synonymous with 'sense of place' [9, 70, 76].

Since the 1980s, studies on 'attachment' as a 'familiarity with physical places' have begun in the field of tourism [38], [84]. In tourism studies, 'place attachment' refers to the emotional bond or connection, belonging, and psychological solidarity between a person and a special place [19]. Place attachment formed by assigning value through experiences in a specific place is reported to stem from persistent psychological attitudes and tendencies towards the specific place [48].

Among place attachment factors, 'place dependence' is the functional attachment of a place perceived by humans, evaluating whether a place or community is functionally suitable for specific tourism activities [30, 93]. 'Place identity' is an emotional attachment to a place, where individuals consider themselves part of the place emotionally and symbolically, valuing the place for emotional and symbolic reasons [33, 60, 93]. 'Affective attachment' refers to the emotions individuals feel towards a special place [53], an emotional bond shared with the place, and a sense of place emotion in the aspect of individuals' bonding, either positively or negatively [25, 58, 59]. 'Social attachment' is the social affinity and bonding that reproduces stability and bonding within a specific group or community through positive relationships among individuals or groups [6].

In recent research, it has been confirmed that cognitive and emotional experiences have a positive impact on place attachment, and place identity among place attachment factors fully mediates the relationship between cognitive experience and word-of-mouth [75]. Additionally, it has been confirmed that among the brand experiences of a destination, emotional, behavioral, and intellectual experiences, excluding sensory experiences, influence place dependence. Furthermore, all sensory, emotional, behavioral, and intellectual experiences affect place identity. Place attachment has been found to influence destination loyalty, leading to revisits, positive word-of-mouth, and preferred choices [4]. Such place attachment is a precursor mediator of place loyalty, which can enhance visitors' involvement in specific leisure activities and induce continuous visits to the place [36], and a precursor variable of place loyalty that positively influences cognitive loyalty and emotional loyalty [20].

### 2.3. Place Loyalty

The conceptual basis for loyalty can be traced back to social psychologist Leon Festinger's (1957) 'Theory of Cognitive Dissonance' [34]. According to this theory, people tend to rationalize their decisions rather than admitting their mistakes in order to resolve cognitive dissonance. They adopt an attitude of blocking out information they don't want to perceive and accepting only what they want to perceive [67]. Therefore, 'loyalty' is a deep commitment to continuously repurchasing or reusing preferred products or services in the future, despite the fact that situational influences and marketing efforts can provoke switching behavior. It implies that people will repeatedly purchase the same brand or use the same service [73, 95]. Based on Oliver's (1999) research, Yuksel et al., (2010), Han Ji-hun (2011), and Choi Seong-beom et al., (2013) defined 'place loyalty' as a state of deep immersion with the intention to consistently visit one place, preferring it over others [36, 38, 95]. They applied Oliver's (1999) comprehensive concept of loyalty to the context of places in a step-by-step manner. The first stage of place loyalty is 'cognitive loyalty', which is an attitude towards the perceived value and perception of place experience through comparisons with other places [10]. The second stage of place loyalty is 'affective loyalty', which is an emotional response of consumers, such as subjective preferences and enjoyment based on place experiences [10]. The third stage of place loyalty is 'conative loyalty', which represents a more profound loyalty in terms of attachment to a place than affective loyalty [10]. Place loyalty is formed step-by-step in the service provider's efforts, related to other components, and has a structural stage where attitudes become loyal at each stage [38, 73, 95]. It has been found that each stage of loyalty influences the others [47, 95]. Therefore, people who perceive a high level of satisfaction in a specific place tend to have the intention to revisit the destination repeatedly [66] and continuously visit the same place, exhibiting a preference for it over other places [95].

Recent research has shown that tourists' cognitive loyalty to specific destination attributes affects both affective and conative loyalty. Notably, a stronger relationship has been established between affective loyalty and conative loyalty compared to the path between cognitive loyalty and conative loyalty [10, 95]. Additionally, it has been confirmed that place identity, a factor of place attachment, has a sequential positive impact on visitors' cognitive and affective loyalty [38], and it has been confirmed that a sequential as the level of place attachment to a destination increases, place loyalty also rises [38] and as the level of place attachment to a destination increases, place loyalty also rises [38].

## 3. Research Design

### 3.1. Research Model and Hypotheses

This study aims to investigate the relationship between the perceived restorative servicescape of casino integrated resort visitors and their place attachment and place loyalty, as well

as the mediating effect of place attachment, as shown in Figure 1 research model.

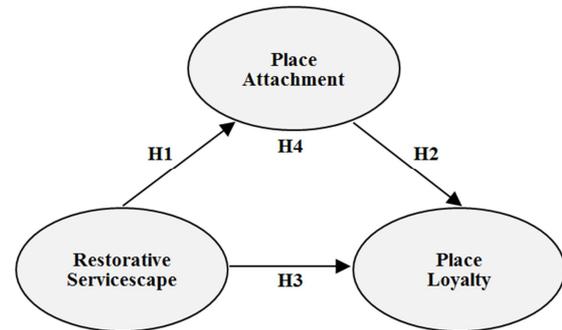


Figure 1. Research model.

#### 3.1.1. The Correlation Between Restorative Servicescape and Place Attachment

Based on the studies on the relationship between 'restorative environmental perception', which has a similar context to restorative servicescape, and place attachment, it can be hypothesized that restorative servicescape has a significant positive(+) influence on place attachment. Kim Jae-hyung and Choi Suk-hwan's (2018) study, which found that golfers' recovery effects from golf courses' natural environment increased their attachment to the golf course, supports the hypothesis that restorative servicescape in a commercial service environment will have a significant impact on place attachment. Additionally, Kim Beom-joon and Kim Jae-hyung's (2019) study confirmed that the natural fatigue recovery effect felt in the natural environment of golf courses increased the attachment to specific golf courses, supporting the hypothesis that the perceived restorative servicescape in a commercial service environment like casino integrated resorts will have a significant positive(+) influence on place attachment. Based on these previous studies, the following research hypothesis was set.

<H1> Restorative servicescape will have a significant positive(+) influence on place attachment.

#### 3.1.2. The Correlation Between Place Attachment and Place Loyalty

Previous research has reported that variables such as place attachment or place bonding can become an essential part of one's identity and evoke strong emotions that can influence a person's behavior, including loyalty [44, 50, 51, 57, 64, 65, 66, 83, 95]. Place attachment is an important factor in predicting place loyalty intentions and can be a predictor of place loyalty behavior [95]. Raana (2020) confirmed that strong place attachment to the city among residents of Iran's Baharestan new town positively influenced civic participation and place loyalty. This finding demonstrates that place attachment, as a bond between people and places, can influence their intentions and behaviors related to the place. Moreover, these intentions and behaviors can play a decisive role in the vitality of life in the new town and its development [74]. Park Jun-beum and Choi Jae-wo (2018) found that both place dependence and place identity aspects of place attachment had a positive influence on

cognitive and affective loyalty factors in their analysis centered on Daecheon Beach in Boryeong City. La Sun-a (2018) suggested, through a qualitative study using narrative analysis, that when a commercial space is given a sense of place by the consumer, the consumer feels place attachment as they pass through that place, and they form place loyalty to the attached place, leading to revisits [12, 13]. Based on these previous studies, the following research hypothesis was set.

<H2> Place attachment will have a significant positive(+) influence on place loyalty.

### 3.1.3. Relationship Between Restorative Servicescape and Place Loyalty

According to previous research, when consumers experience fascination, healing, enlightenment, rest, and fulfillment in a commercial space, they feel place attachment and demonstrate place loyalty through repeat visits or spontaneous place-supportive behaviors [13, 46]. Mody, Suess, and Dogru (2020) found that the perceived restorative servicescape in healthcare facilities with hotel-like features enhances patient happiness and has a positive influence on their behavioral intentions. They demonstrated that patients are more likely to experience recovery benefits in such facilities and are more willing to pay higher prices for these rooms. In Sun, Xiao-li and Kim, Young-hyun (2021)' study, It found that the restorative servicescape factors of being away, fascination, compatibility, and coherence among Chinese urban tourists had varying effects on perceived social value, emotional value, and monetary value but all had positive influences on loyalty [21]. Furthermore, the results of the analysis on the restorative servicescape and satisfaction and revisit intentions of pension guests are as follows: The factors of being away and coherence in the restorative servicescape influenced satisfaction, while only the fascination factor affected revisit intentions. It was also confirmed that the satisfaction of pension guests influenced by the restorative servicescape has a significant impact on their revisit intentions [15]. Based on the previous research, the following research hypotheses have been established.

<H3> The restorative servicescape will have a significant positive(+) influence on place loyalty.

<H4> Place attachment will mediate the relationship between the restorative servicescape and place loyalty.

### 3.2. Survey Composition

To conduct this study, the variables were operationally defined to suit the research purpose.

'Restorative servicescape' is defined as a service environment with restorative characteristics that provide psychological assistance to people in the process of service production and consumption, based on the studies by Kwon Hyuk-jung (2018), Moon Chang-Ho (2014), Park Kyoung-heum and Kim Young-kyu (2019). The measurement of restorative servicescape was based on the RPRS (Revised Perceived Restorativeness Scale) by Hartig, Korpela, Evans, and Garling (1997a) and the 16-item RPRS proposed by Rosenbaum (2009), LIU CHANG (2019), Kwon Hyuk-jung (2018), Moon Chang-Ho (2014), and Park Min-ah

(2016). The four sub-dimensions with a total of 16 items were measured using a Likert 5-point scale, including 3 items for 'being away', 4 items for 'fascination', 4 items for 'coherence', and 5 items for 'compatibility.'

'Place attachment' was defined as the cognitive, functional, and emotional bond between a person and a place formed through the interaction between people and places [10, 11, 25]. The measurement of place attachment was based on the research items of Raana (2020) and the studies of Kim Hyo-jung (2014), Yoon Hyun-Hee (2012), Choi Byung Sook and Kim Suk-Kyung (2011), and Han Ji-hun (2011). The scale consisted of a total of 20 items in 4 sub-dimensions, measured using a 5-point Likert scale. These included 4 items for 'place dependence', such as 'I was able to satisfy my needs at this casino resort', 7 items for 'place identity', 5 items for 'affective attachment, and 4 items for 'social attachment.'

'Place loyalty' was defined as the intention to prefer a specific place over other places and visit it consistently [10, 38]. The measurement of place loyalty was based on the survey items of Yuksel et al., (2010) for the Didim region [95], and the research of Kim Jin-kyung (2018), Kim Hyo-jung (2018), and Han Ji-hun (2011). The scale consisted of a total of 9 items in 3 sub-dimensions, measured using a 5-point Likert scale. These included 4 items for 'cognitive loyalty', such as 'This casino resort provided excellent service quality compared to other tourist places I have visited', 3 items for 'affective loyalty, and 2 items for 'conative loyalty.'

### 3.3. Data Collection and Analysis Method

Due to the environmental impact of COVID-19, this study could not survey visitors who have visited casino resorts at the current time. A preliminary survey of 50 copies was conducted from July 3rd to July 5th, 2020, targeting the general public. However, the survey faced difficulties in the concept delivery process due to low awareness of casino resorts, and most of the responses were incomplete, lacked consistency, and had low reliability; thus, they were not used in the analysis of this study. To increase the validity of the questionnaire and obtain a sample with a high understanding of the concept of casino resorts, a face-to-face offline survey was conducted with employees in the management department of Paradise City Casino Resort on Yeongjongdo in Incheon. Although they are employees, many casino management workers are experts with accurate knowledge of casino resorts and are also visitors to other casino resorts. Thus, they can be considered as a sample with a high understanding of the concept of casino resorts. Among them, visitors aged 20 and above who had visited overseas casino resorts in Macau, the Philippines, Singapore, Vietnam, and Las Vegas within the past two years were selected as samples. A total of 410 questionnaires were distributed and collected from July 3rd to August 11th, 2020. Out of the 410 collected questionnaires, 36 were excluded due to inaccurate or insincere tendencies, and only 374 valid questionnaires were used for the analysis. The empirical analysis was conducted using SPSS 23.0 (for Windows, NY, IBM Corporation) and AMOS 23.0. The structural equation modeling (SEM) was utilized to verify the hypotheses, and

Sobel's Z test was employed to examine the mediating effect of place attachment in the relationship between restorative servicescape and place loyalty.

## 4. Empirical Analysis

### 4.1. Demographic Characteristics of Respondents

The demographic characteristics of the collected data are shown in Table 1. Out of the total 374 respondents who participated in the survey, 218 (58.3%) were males, outnumbering females. In terms of age, the majority were in

their 30s with 186 respondents (49.7%), representing over half of the total sample. Regarding the highest level of education, 323 respondents (86.4%) held a bachelor's degree, accounting for over 80% of the sample. In terms of job position, 138 respondents (36.9%) were deputy managers, which was the largest group. The monthly average household income was highest for the 129 respondents (34.5%) earning between 3 million and less than 4 million won. The frequency of casino resort visits was highest for those who visited 2-3 times, with 128 respondents (34.2%). Further details are provided in the table below.

Table 1. Demographic characteristics of study participants.

Item	N	%	Item	N	%		
Gender	Male	218	58.3%	Position	Company employee*	63	16.8%
	Female	156	41.7%		Assistant manager	138	36.9%
Age	20~30	35	9.4%	section chief	80	21.4%	
	31~40	186	49.7%	Deputy director	78	20.9%	
	41~50	132	35.3%	manager or higher	15	4.0%	
	Over 51	21	5.6%	Income	less than 20 million won	3	0.8%
Education	High school	4	1.1%	20~30 million won	88	23.5%	
	College	31	8.3%	30~40 million won	129	34.5%	
	University	323	86.4%	40~50 million won	102	27.3%	
	Graduate school	16	4.3%	Over 50 million won	52	13.9%	
				Number	1	65	17.4%
			of visits	2~3	128	34.2%	
				4~5	103	27.5%	
				Over 5	78	20.9%	

Table 2. Reliability for measurement factors analysis.

factors		N	Cronbach's $\alpha$
being away	01. Spending time in this CIR give me a good break from my day-to-day routine.	3	.848
	02. Being in this CIR, It is an escape experience from a difficult reality.		
	03. Being in this CIR, I felt like I forgot everything else and left somewhere.		
	04. I would like to get to know this CIR better.		
fascination	05. This CIR's setting has fascinating qualities.	4	.844
	06. I would like to spend more time at the surroundings in this CIR.		
	07. There is much to explore and discover at this CIR.		
	09. This CIR is a confusing place.		
coherence	10. There is a great deal of distraction in this CIR.	3	.875
	11. It is chaotic in this CIR.		
	12. Being in this CIR suits my personality.		
	13. This CIR is suitable for doing what I like.		
compatibility	14. I have a sense that I belong to this CIR.	5	.874
	15. I have a sense of oneness with this CIR's setting.		
	16. I could find ways to enjoy in this CIR like this.		
	01. My needs can be met in this CIR,		
place dependence	03. In this CIR, I can do what I like.	3	.835
	04. My demands for leisure and entertainment can be met in this CIR.		
	05. I am rooted to this CIR.		
	07. I feel this CIR is a part of me.		
place identity	08. I think I am a local resident of this CIR.	6	.890
	09. I defend this CIR when somebody criticizes it.		
	10. The tolerant and integrative atmosphere in this CIR is in congruence with my personal values.		
	11. Living in this CIR says a lot about who I am.		
Affective attachment	12. I am proud of this CIR.	4	.879
	13. If I have been away from this CIR for a long time, I will miss it.		
	14. I like this CIR.		
	15. I am happy to live in this CIR.		
social attachment	17. There are strong ties among neighbors in my neighborhood in this CIR.	4	.810
	18. I feel loyal to the people in this CIR.		
	19. I usually speak with my neighbors about neighborhood problems in this CIR.		
	20. I have good friends in this CIR.		

factors		N	Cronbach's $\alpha$
Place Loyalty	cognitive loyalty	01. this CIR provides me superior service quality as compared to other places I have been to.	.848
		02. No other destination performs better than this CIR.	
		03. Overall quality of this CIR is the best as a tourism destination	
	affective loyalty	04. I believe this CIR provides more benefits than other places	
		05. I love staying in this CIR.	
		06. I feel better when I stay in this CIR.	
	conative loyalty	08. If I am given a chance, I intend to continue making my holiday in this CIR.	
		09. I consider this CIR to be my first holiday choice.	
		Total	

Note 1. CIR = casino integrated resort.

Note 2. neighbors = The people involved in this CIR

**4.2. Reliability and Validity of Measurement Variables**

Table 2 presents the reliability analysis of the measurement factors for confirming the validity of the measurement tools. The measurement items used in this study were derived from sub-factors in previous studies, but to improve the model's fitness, some items were removed: item 8 in the recovery service scape factor extraction process ('This CIR is too much going on. '), items 2 ('No other town can compare to this CIR. '), 6 ('I identify strongly with this CIR. '), and 16 ('I am attached to this CIR. ') in the place attachment factor extraction process, and item 7 ('I like this CIR more than other destinations. ') in the place loyalty factor extraction process. These items were removed because their factor loadings and communalities were below 0.4, which is considered to violate convergent validity and involve factor complexity [52]. Reliability measures the consistency of the results regarding a single concept through the validity verification of the measurement items. If Cronbach's  $\alpha$  value of the measured variables is 0.5 or higher, and the individual item level is 0.9 or higher, the reliability is considered high, and generally, if it is 0.7 or higher, there is no problem with reliability [3]. In this study, the Cronbach's  $\alpha$  values of the

survey items were all 0.800 or higher, confirming that each measurement item consistently measured the underlying concept. Based on these results, the model was deemed to be at an acceptable level.

Table 3 is the confirmatory factor analysis (CFA) for verifying the validity of the measurement tools. As a result of the convergent validity check, all construct reliabilities (CR) were 0.8 or higher, and all average variance extracted (AVE) values were 0.6 or higher, ensuring stable convergent validity and confirming that the factor structure of the proposed factors was reliable. The chi-square and Q values ( $= \chi^2/df$ ) of the model were  $\chi^2=91.079$  (df=49) and  $\chi^2/df=1.859$ , respectively, which were suitable, and the  $\chi^2/df$  value is generally considered satisfactory if it is 3 or lower. In this study, the goodness of fit index (GFI) was .964, the comparative fit index (CFI) was .989, and the Tucker-Lewis index (TLI) was .983, all showing very high fit values over 0.9. The root mean residual (RMR) criterion is .050 or lower, but the result of this study was .012. The root mean square error of approximation (RMSEA) criterion is .070 to .080 or lower, and the result of this study was .048 (90% confidence interval=[.032~.063]), satisfying the accuracy of the estimate.

Table 3. Result of the confirmatory factor analysis.

Factor		Coefficient		Standard Error	Critical Ratio (t)	Measurement Error	CR* (AVE**)
		Unstandardized	Standardized				
Restorative Servicescape	being away	1.000	.791	.058	16.719	.178	.898 (.688)
	fascination	.975	.795				
	coherence	.780	.735				
	compatibility	1.057	.883				
Place Attachment	place dependence	1.000	.841	.060	12.438	.134	.897 (.695)
	place identity	.751	.602				
	affective attachment	1.036	.866				
	social attachment	.596	.503				
Place Loyalty	cognitive loyalty	1.000	.782	.067	17.496	.191	.916 (.785)
	affective loyalty	1.167	.835				
	conative loyalty	1.334	.859				

$\chi^2=91.079$ , df=49, Q=1.859, GFI=.964, AGFI=.933, TLI=.983, CFI=.989, RMR=.012, RMSEA=.048 (90% C.I=[.032~.063])

Next, discriminant validity was tested in Table 4. According to Fornell and Larcker (1981), discriminant validity is assumed when the average variance extracted (AVE) is greater than the square of the correlation coefficient. The result of checking whether the AVE is greater than the square of the correlation coefficient showed that 'the minimum value of AVE (=0.688) is greater than the maximum value of

the squared correlation coefficient ( $=.794^2=.630$ ). ' This finding confirms that the convergent validity within the factors and the discriminant validity between factors in this study are statistically valid.

Table 5 presents the verification of the hypotheses of this study through the structural analysis model. The structural model showed a very high degree of fit, with  $\chi^2=86.682$

(df=36),  $\chi^2/df=2.408$ ,  $Q(=\chi^2/df)$  value below 3, GFI=.955, AGFI=.912, CFI=.976, and TLI=.961. RMR=.017, and RMSEA=.073 (90% confidence interval=[.057 ~.090]),

satisfying the accuracy of estimation. As the goodness of fit of the research model was confirmed, the research hypotheses were statistically tested, and the results are presented in Figure 2.

**Table 4.** Convergent validity and discriminant validity among variables.

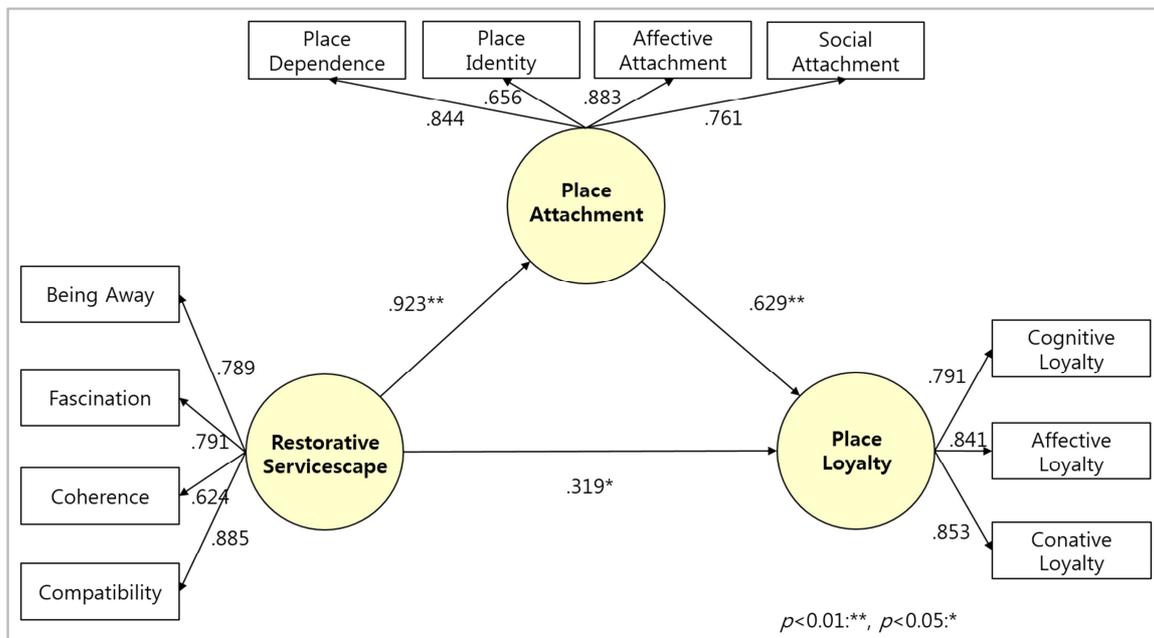
Factor	Restorative Servicescape	Place Attachment	Place Loyalty
Restorative Servicescape	.688		
Place Attachment	.477	.695	
Place Loyalty	.552	.630	.785

Note 1. \*\*The correlation coefficient is significant at the 0.01 level (two-tailed), squared correlation coefficient value =  $r^2$ , ■: AVE value

**Table 5.** Results of hypotheses testing.

Hypothesis	Coefficient		Standard Error	t	p
	Standardized	Unstandardized			
H1 Restorative Servicescape → Place Attachment	.923	.972	.055	17.658**	.000
H2 Place Attachment → Place Loyalty	.629	.611	.133	4.588**	.000
H3 Restorative Servicescape → Place Loyalty	.319	.327	.135	2.425*	.015

$\chi^2=86.682$ ,  $df=36$ ,  $Q=2.408$ , GFI=.955, AGFI=.912, TLI=.961, CFI=.976, RMR=.017, RMSEA=.073 (90% Confidence interval=[.057 -.090])  
 \*\* $p<.01$ , \* $p<.05$ .



**Figure 2.** Results of the research model.

**4.3. Hypothesis Testing**

**Table 6.** Results of Total effect, direct effect and Indirect effect of path coefficients.

Path	Total effect	Direct effect	Indirect effect
Restorative Servicescape → Place Attachment	.923** (.972)	.923** (.972)	
Place Attachment → Place Loyalty	.629** (.611)	.629** (.611)	
Restorative Servicescape → Place Loyalty	.900** (.921)	.319* (.327)	.581** (.594)

Note 1. The values in ( ) are unstandardized coefficients.  
 \*\* $p<.01$ , \* $p<.05$

Table 6 presents the decomposition results for the total path coefficients of this study. In Sobel's Z test, if the test statistic Z value is greater than 1.96 and less than 2.54, it is

significant at the 0.05 level, and if the Z value is greater than 2.54, it is significant at the 0.01 level. In this study, the indirect effect or mediating effect size of the relationship

between restorative servicescape and place loyalty through place attachment was calculated and the Sobel's  $Z$  test was performed to determine whether the indirect effect was

significant. The result showed an absolute value of  $Z=4.446$ , which is greater than 2.54, confirming statistical significance at the 0.01 level Table 7.

Table 7. Sobel's  $Z$  test results for mediating effects.

Path	Indirect effect (Unstandardized coefficient)	Sobel's $Z$
H4 Restorative Servicescape → Place Attachment → Place Loyalty	.594	4.446**

\*\* $p < .01$ , \* $p < .05$

## 5. Discussion

The empirical analysis results of this study are as follows:

First, as a result of verifying '[Hypothesis 1] The restorative servicescape perceived by casino integrated resort visitors will have a positive effect on place attachment', the path 'restorative servicescape → place attachment' ( $r=.923$ ,  $p < 0.01$ ) was statistically significant at the 0.01 level, and [H1] was accepted. This indicates that the restorative servicescape of a casino integrated resort includes four recovery characteristics as environmental factors that help alleviate negative symptoms related to visitor fatigue. As visitors perceive a higher level of restorative stimuli in the restorative servicescape, their place attachment strengthens. Therefore, considering the restorative servicescape, which includes a psychologically distinct environment, an attractive service environment, and a relaxed and harmonious environment that matches the visitor's purpose, is a necessary condition for enhancing the cognitive response of the visitor's recovery environment perception and developing the emotional response of place attachment.

Second, as a result of verifying '[Hypothesis 2] Place attachment of casino integrated resort visitors will have a positive effect on place loyalty', the path 'place attachment → place loyalty' ( $r=.629$ ,  $p < 0.01$ ) was statistically significant at the 0.01 level, and [H2] was accepted. Place attachment has a strong interrelationship with the place loyalty of casino integrated resort visitors, increases the comfort and safety of visitors to the place, promotes the tendency to stay for a long time [56], and acts as a precursor to place loyalty that induces continuous visits. Therefore, as the level of place attachment increases, the effect of increasing place loyalty to the casino integrated resort is confirmed, and considering the positive bond with the place, place attachment is a necessary condition for enhancing the cognitive response of visitors' internal emotions and developing a positive response in place loyalty.

Third, as a result of verifying '[Hypothesis 3] The restorative servicescape perceived by casino integrated resort visitors will have a positive effect on place loyalty', the path 'restorative servicescape → place loyalty' ( $r=.319$ ,  $p < 0.05$ ) was statistically significant at the 0.05 level, and [H3] was accepted. Therefore, the restorative servicescape perceived by visitors to the casino integrated resort interacts with physical, social, and socio-symbolic service environment factors, influencing the visitor's approach/avoidance decisions, and in particular, has a strong positive effect on place loyalty factors such as willingness to pay, intention to revisit, intention to

recommend, and prioritized selection.

Fourth, as a result of verifying the direct effects of this study, both the 'restorative servicescape → place attachment' and 'place attachment → place loyalty' paths were statistically significant, and the indirect effect of the 'restorative servicescape → place attachment → place loyalty' path was also statistically significant. When conducting the Sobel's  $Z$  test to see if this indirect effect is significant, it was confirmed that place attachment is statistically significant as a mediator in the relationship between restorative servicescape and place loyalty ( $|Z|=4.446$ ,  $p < 0.01$ ). Therefore, [Hypothesis 4] stating 'place attachment of casino integrated resort visitors will mediate the relationship between restorative servicescape and place loyalty' was accepted. As a result of the study, it was confirmed that both direct and indirect paths were statistically significant, and place attachment partially mediates the relationship between restorative servicescape and place loyalty. Therefore, similar to the natural environment, the restorative servicescape in a commercial service environment can ultimately reach place loyalty through the emotional response of place attachment. It was clarified that place attachment is an important antecedent variable and a mediator that can enhance place loyalty, improving visitor's revisit intentions, recommendations, willingness to pay, and supportive behavior.

## 6. Conclusion

The implications of this study are as follows:

First, This study demonstrated that if a casino integrated resort, as a commercial service environment, possesses the conditions of a recoverable environment being away, fascination, coherence, and compatibility, it can create a service environment with a restorative dimension that positively influences visitors' place attachment and place loyalty. the restorative servicescape factors of being away, fascination, coherence, and compatibility can help create a differentiated image for visitors to a casino integrated resort compared to other resorts, leading to positive emotions such as place attachment. This, in turn, results in increased place loyalty through revisits or willingness to pay, ultimately providing efficient assistance to the casino's business performance. Therefore, casino integrated resort companies should create a harmonious service environment that matches visitors' purposes and intentions during the development and operation stages of various spaces such as casinos, hotels, restaurants, cafes, theme parks, conference facilities, and shopping malls. This will allow visitors to be naturally drawn

to the space without any extra effort or attention.

Second, this study contributed to expanding the theoretical application of place attachment by empirically analyzing it in a commercial service environment, which could be temporary or one-time visits, differentiating it from previous researchers who applied place attachment only to natural environments. In other words, it was clarified that place attachment is an antecedent variable that has a significant positive effect on place loyalty in the commercial service environment of a casino integrated resort and a variable mediating the positive relationship between restorative service scape and place loyalty. Therefore, during the development and operation stages of casino integrated resorts, companies should also implement place marketing strategies that enhance visitors' place attachment, enabling them to feel positive emotions in terms of emotional bonds and connections shared with the unique place of the casino integrated resort. Proactively reflecting place attachment in creating a differentiated landmark within the service environment can influence visitors' preferences, ultimately contribute to the efficient management and success of the casino integrated resort.

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## References

- [1] Kang, Young-Ae. Lee, Ji-Yoon. & Lee, Su. (2013). Influences of Perceived Restorative Environment toward Leisure Satisfaction in a Waterfront Park. *International Journal of Tourism Management and Sciences*, 28 (3), 353-373.
- [2] Kwon, Hyuk-Jung. (2018). A Study on the Effects of Restorative Servicescape on Perceived Value in Hotel or Resort: Focusing on the Mediation Role of Recovery Experience. Department of Hotel Management Graduate School Kyonggi University.
- [3] Kim, Gye-soo. (2010). Structural equation model analysis. Seoul: Han Na-rae Academy.
- [4] Kim, Ki Hyun, Yoon Yoo-Shik & Lee Hey-Ryon. (2014). A Study on The Effect of Convention Destination's Brand Experience on Place Attachment and Loyalty. *Korea Academic Society of Hotel Administration*, 23 (2), 151-166.
- [5] Kim, Beom-Joon & Kim, Jae-Hyung. (2019). The Relationship among leisure constraints negotiation, recreation specialization, perceived restorative environment and place Attachment for golf rounding participants. *Journal Coaching Development*, 21 (1), 26-34.
- [6] Kim, Yeong-kyo & Nam gung-Mi. (2019). A Study on Factors Influencing the Residents' Participation of Urban Regeneration: Focused on the Mediating Effect of Place Attachment. *Journal of the Korean Regionl Deveioement Association*, 31 (3), 43-65.
- [7] Kim, Jae-Hyung & Choi, Suk-Hwan. (2018). The Relationship among perceived restorative environment, place Attachment and psychological happiness for golf participants. *The Korean Journal or Sports Science*, 27 (5), 333-342.
- [8] Kim, Jin-Kyung. (2018). The Effect of a Hotel Loyalty Program on Cognitive, Affective, Conative Loyalty and Action Loyalty Formation. *Journal of Tourism Sciences*, 42 (2), 139-155.
- [9] Kim, Hye-Jin. (2018). Analysis on the Contents of 'Sense of Place' Represented in Elementary Geography Education. *Journal of the association of Korean geographers*, 7 (3), 275-287.
- [10] Kim, Hyo-Jung. (2014). A Study on the Relationship among Selection Attributes for Tourism Destination Storytelling, Place Attachment, Satisfaction, and Loyalty: Focused on the Moderating Effect of Involvement. Department of Business Administration Major of Tourism Management The Graduate School of Woosong University.
- [11] Taniguchi Kiyomi. (2018). A Study on the Influence of Tourism Experience to Brand Equity, Place Attachment and Loyalty: Focused on the 6 th Industrialization Areas in Korea and Japan. Dept. of Hotel, Tourism and Food Service Management, Graduate School, Dong-Eui University.
- [12] La, Sun-a. (2018). Consumer Responses to Retro Marketing Applied to Consumer Places - Focusing on Place Nostalgia and Place Attachment. *Journal of Marketiong Management Research*, 23 (4), 25-58.
- [13] La, Sun-a, Kim Gho, Lee June-young & Kim So-yun. (2017). An Exploratory Study on Consumer Experience of Place Happiness: Developing a Dynamic Model of 'Consumer Place' by Using Narrative Analysis. *Journal of Consumer Studies*, 28 (5), 25-70.
- [14] Moon, Chang-Ho. (2015). A study on the effect of the restorative servicescape on customer satisfaction and loyalty: focusing on the mediating effect of emotional state. Department of Hotel Management Graduate School, Kyonggi University.
- [15] Park, Kyoung-gheum & Kim, Young-kyu. (2019). The Effect of Pension's Restorative Servicescape on Customer Satisfaction and Revisit Intention. *International Journal of Tourism Management and Sciences*, 34 (8), 169-183.
- [16] Park, Deuk-Hee. (2015). Exploring an Antecedent Tourism Destination Choice and Some Consequences: A Network Theory Approach. Dept. Tourism The Graduate School of Kyung Hee University.
- [17] Park, Min-ah. (2016). Structural Relationships among Servicescape, Perceived Restorativeness, and Leisure Satisfaction in Re. Department of Hotel Management The Graduate School of Kyonggi University.
- [18] Park, Min-ah & Yoon, Se-mok. (2018). Structural Relationships among Servicescape, Perceived Restorativeness, and Leisure Satisfaction in Reso. *Journal of Tourism Management Research*, 83, 447-47.
- [19] Park, Yong-soon & Shim, Won-seop. (2017). Relationship between Place Attachment to Emotional Solidarity in Rural Community. *International Journal of Tourism Management and Sciences*, 32 (5), 399-422.
- [20] Park, Jun-beum & Choi, Jae-wo. (2018), A Study on the motives of tourists, attachment and royalties in marine tourism: Focusing on the Boryeong-si Daecheon Beach. *Journal of the Tourism Management*, 82, 871-891.
- [21] Sun, Xiao-li & Kim, Young-hyun. (2021). The Effect of City Tour's Restorative Servicescape on Tourist Satisfaction and Loyalty in China - Focusing on the Moderating Effect of Perceived Values. *Tourism Research*, 46 (4), 199-223.

- [22] Oh, In-Hye. (2013). A Study on the Korean-American's Sense of Place and Behavioral Characteristic on North Korea: Place-Based Psychological Approach. Department of Geography The Graduate School Seoul National University.
- [23] Yonhap News Agency. (2019.02.07). Casino Association "The deprivation of the right to choose a place of business violates the principle of excessive prohibition"
- [24] Yoo, Kwang-Min. (2013). Extension of the Concept of Servicescape. *Journal of Tourism Studies*, 25 (1), 125-143.
- [25] Yoon, Hyun-Hee. (2013). Influences of Brand Equity of Rural Tourism Village on Place Attachment and Pro-environmental Behavior Intentions. Major of Travel, Airline & Cruise Service Management Graduate School of Tourism & Hospitality Kyonggi University.
- [26] E-Daily. (2019.02.07). Blocking Casino Relocation "Jeju Island Announces Legislation. Casino industry backlash"
- [27] Lee, Seung-Hoon. (2011). The Comparisons of Urban, Green Roof, and Forest Scenes by Rating Psychological Indices. *Seoul City Research*, 12 (3), 53-65.
- [28] Lee, Seung-Hoon & Hyun, Myoung-ho. (2004). The comparison of natural environment and restorative environment in stress-buffering effects. *Korean Journal of Health psychology*, 9 (3), 609-632.
- [29] Yi, Young-Kyuong. (2013). Restorative Quality of Traditional Landscape and Visiting Experience -Based on the Assessment of Visitors of An-Ap-Ji in Kyong Ju. *Journal of the Korean Institute of Landscape Architecture*, 41 (4), 68-76.
- [30] Lee, Ji-Won. (2017). The Effects of Tourism Destination Brand Equity and Place Attachment on Perceived Fit and Behavior Intention - Focused on Gangwon MICE Industry. Department of Business Administration The Graduate School Hallym University.
- [31] Lee, Choong-Ki & Kim, NAM-hyun. (2015), Analysis of Strategic Factors and Priority for Developing Integrated Resort Casino Using AHP. *Journal of Tourism Sciences*, 39 (2): 69-84.
- [32] Lee, Hyeong-Lyong, Wang, Sang & Kim, Tae-Gu. (2002). The Effect of the Perceived Service Quality by Physical Environment of the Hotel Western Restaurant on Customer Satisfaction. *International Journal of Tourism Management and Sciences*, 17 (2), 177-197.
- [33] Je, Sang-Ho. (2019). The Influence of Mindfulness to Place Attachment, Quality of Experience and Emotional Solidarity in Rural Tourism Villages. Major of Culture Tourism Contents & Resort Development Graduate School of Tourism and Hospitality Kyonggi University.
- [34] Jo, jung-sun. (2010). A study of factors influencing on Place Choice' and 'Place Loyalty Development': focusing on place identity, place experience and place personality. Graduate School of Seoul National University.
- [35] Cha, Gil-Soo. (1995). Influences of Physical Evidence and Service Personnel Mixes on Post - purchase Evaluation. *Journal of Tourism Science*, 18 (2), 155-178.
- [36] Choi, Seong-Beom, Jung, Woo-Jin, & Han, Tae-Yong. (2013). The relationships of involvement and destination's place attachment and loyalty of Gangwon province East Sea beach visitor. *Korean Journal of sports science*, 22 (5), 197-210.
- [37] Choi, Byung-Sook & Kim, Suk-Kyung. (2011). The Effects of Place Attachment to Childhood Home to the Housing Satisfaction. *Journal of the Korean Housing Association*, 22 (2), 111-120.
- [38] Han, Ji-Hun. (2011). A Study on the Structural Relations among Involvement in Leisure Activities, Place Attachment, Satisfaction and Place Royalty. Dept. of Hospitality & Tourism Management The Graduate School Kyung Hee University.
- [39] Han, Jang-Hun. (2019). The Effects of Perceived Restoration Environment on Subjective Well-being and Behavioral Intention in a Blue Space - Focused on Aquarium Tourist. Department of Tourism The Graduate School of Kyung Hee University.
- [40] LIU CHANG. (2019). A structural relationship among tourists' experience of sensory heritage, attention restoration, healing effect, hedonic value, and brand value recognition - Case of Jeju Olle Road. Dept. of Hospitality & Tourism Management The Graduate School Kyung Hee University.
- [41] Berto, R. (2005). Exposure to restorative environments helps restore attentional capacity. *Journal of Environmental Psychology*, 25 (3), 249-59.
- [42] Bitner, M. J. (1992). Servicescape: The impact of physical surroundings on customers and employees. *Journal of Marketing*, 56 (April), 57-71.
- [43] Bowlby, J. (1969). Attachment and Loss. Vol. 1. Attachment. New York. Basic.
- [44] Brocato, E. D. (2006). Place attachment: an investigation of environments and outcomes in service context. Doctoral Thesis, The University of Texas at Arlington.
- [45] CASINO BUSINESS REVIEW. (2019). MARCH + APRIL.
- [46] Debenedetti, A., Oppewal, H., & Arsel, Z. (2014). Place attachment in commercial settings: A gift economy perspective. *Journal of Consumer Research*, 40 (5), 904-923.
- [47] Evanschitzky, H., & Wunderlich, M. (2006). An examination of moderator effect in the four-stage loyalty model. *Journal of Service Research*, 8 (4), 330-345.
- [48] Felman, R. (1990). Tourism and place identity. Unpublished dissertation, Dept. of Recreation, Parks, and Tourism Science, Texas A & M University, College Station, TX.
- [49] Fornell, C., & Larcker, D. F. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research*, 18 (2), 39-50.
- [50] George, B., & Alexandru, N. (2005). Holiday attachment: The construct and its measurement. *Anfiteatru Economic*, 18, 24-38.
- [51] George, B. P., & George, B. P. (2004). Past visit and the intention to revisit a destination: place attachment as the mediator and novelty seeking as the moderator. *The Journal of Tourism Studies*, 15 (2), 51-66.
- [52] Hair, J., Black, W., Babin, B., & Anderson, R. (2010). Multivariate data analysis: A global perspective (7th ed.). New Jersey: Pearson Education.
- [53] Halpenny, E. A. (2006). Environmental Behaviour, Place Attachment and Park Visitation: A Case Study of Visitors to Point Pelee National Park. A Thesis Presented to the University of Waterloo in Fulfillment of the Thesis Requirement for the Degree of Doctor of Philosophy in Recreation and Leisure Studies, Waterloo, Ontario, Canada.

- [54] Hartig, T., & Staats, H. (2003). Guest editors' introduction: restorative environments. *Journal of Environmental Psychology*, 23 (2), 103-7.
- [55] Hartig, T., Korpela, K., Evans, G., & Garling, T. (1997a). A Measure of Restorative Quality in Environments. *Scandinavian Housing & Planning Research*, 14, 175-194.
- [56] Hidalgo, C. M., & Hernandez, B. (2001). Place attachment: conceptual and empirical questions. *Journal of Environmental Psychology*, 21, 273-281.
- [57] Hou, J. S., Lin, C. H., & Morais, D. B. (2005). Antecedents of attachment to a cultural tourism destination: the case of Hakka and non-Hakka Taiwanese visitors to Pei-Pu, Taiwan. *Journal of Travel Research*, 44, 221-233.
- [58] Jorgensen, B. S., & Stedman, R. C. (2001). Sense of Place as an attitude: Lakeshore owners Attitudes Toward their Properties. *Journal of Environmental Psychology*, 21 (3), 233-248.
- [59] Kals, E., & Maes, J. (2002). Sustainable development and emotions. In P. Schmuck & W. Schultz (Ed.), *Psychology of sustainable development*, 97-122, Norwell, MA: Kluwer.
- [60] Kaltenborn, B. P., & Williams, D. R. (2002). The meaning of place attachments to Femundsmarka National Park, Norway, among tourists and locals. *Norwegian Journal of Geography*, 56, 189-198.
- [61] Kaplan, S. (1995). The restorative benefits of nature: toward an integrative framework. *Journal of Environmental Psychology*, 15 (3), 69-82.
- [62] Korpela, K., Hartig, T., Kaiser, F. G., & Fuhrer, U. (2001). Restorative experience and self-regulation in favorite places. *Environment & Behavior*, 33 (4), 572-589.
- [63] Kuo, F. E., & Taylor, F. A. (2004). A potential natural treatment for attention deficit/hyperactivity disorder: evidence from a natural study. *American Journal of Public Health*, 94 (9), 1580-6.
- [64] Kyle, G., Absher, J. D., & Graefe, A. R. (2003). The Moderating role of place attachment on the relationship between attitudes towards fees and spending preferences. *Leisure Sciences*, 33 (5).
- [65] Lee, J. (2003). Examining the antecedents of loyalty in a forest setting: relationships among service quality, satisfaction, activity involvement, place attachment, and destination loyalty. Unpublished Dissertation, The Pennsylvania State University.
- [66] Lee, J., Graefe, A., & Burns, R. (2007). Examining the antecedents of destination loyalty in a forest setting. *Leisure Science*, 29, 463-481.
- [67] Leon Festinger. (1957). A Theory of Cognitive Dissonance 2 권/Mass communication series Voice of America forum lectures, Stanford University Press.
- [68] Michon, R., Chebat, J. C., & Turley, L. W. (2005). Mall atmospherics: the interaction effects of the mall environment on shopping behavior. *Journal of Business Research*, 58 (5), 576-83.
- [69] Mody, M., Suess, C., & Dogru, T. (2020). Restorative Servicescapes in Health Care: Examining the Influence of Hotel-Like Attributes on Patient Well-Being. *Cornell Hospitality Quarterly*, 61 (1), 19-39.
- [70] Moore, R. L., & Graefe, A. R. (1994). Attachments to Recreation Settings: the Case of Rail-Trail Users. *Leisure Sciences*, 16, 17-31.
- [71] Oakes, S., & North, A. C. (2008). Reviewing congruity effects in the service environment musicscape. *International Journal of Service Industry Management*, 9 (1), 63-82.
- [72] Oliver, R. L. (1997). Satisfaction: a behavioral perspective on the consumer. New York: Irwin/McGraw-Hill.
- [73] Oliver, R. L. (1999). Whence consumer loyalty? *Journal of Marketing*, 63, 33-44.
- [74] Raana Shaykh-Baygloo. (2020). A multifaceted study of place attachment and its influences on civic involvement and place loyalty in Baharestan new town, Iran. Department of Geography, School of Economics. Management & Social Sciences, Shiraz University, Shiraz, Iran. *Cities*, 96 (2020), 102473 Google Scholar.
- [75] Rajaobelina L., Dusseault P., & Ricard L. (2019). The mediating role of place attachment in experience and word of mouth: The case of music and film festivals. *International Journal of Arts Management*, 21 (2), 43-54.
- [76] Relph, E. (1976), Place and Placelessness, Pion, London.
- [77] Rosenbaum, M. S. (2005). The symbolic servicescape: your kind is welcomed here. *Journal of Consumer Behaviour*, 4 (4), 257-67.
- [78] Rosenbaum, M. S., & Montoya, D. Y. (2007), Am I welcome here? Exploring how ethnic consumers assess their place identity. *Journal of Business Research*, 60 (3), 206-14.
- [79] Rosenbaum, M. S (2009), Restorative servicescapes: restoring directed attention in third places. *Journal of Service Management*, 20 (2), 173-91.
- [80] Rosenbaum, M. S., & Massiah, C. (2011). An expanded servicescape perspective. *Journal of Service Management*, 22 (4), 471-490.
- [81] Rosenbaum, Mark S., & Smallwood, Jillian. (2011) Cancer resource centres: Transformational services and restorative servicescapes. *Journal of Marketing Management*, 27 (13-14), 1404-1425.
- [82] Rosenbaum, Mark S., Sweeney, Jillian., & Smallwood, Jillian. (2011). Restorative cancer resource center servicescapes. *Managing Service Quality*, 21 (6), 599-616.
- [83] Simpson, M. P., & Siquaw, J. (2008). Destination word-of-mouth: the role of traveler type, residents, and identity salience. *Journal of Travel Research*.
- [84] Schreyer, R., Jacobs, G. R., White, R. G., Frazier, J. W., & Epstein, B. J. (1981). Environmental meaning as a determinant of spatial behavior in recreation. In *Proceedings of Applied Geography Conferences*, 4 (2), 294-300.
- [85] Sherry, J. F. Jr. (1998), Servicescapes: The Concept of Place in Contemporary Markets, NTC, Lincolnwood, IL.
- [86] Stokols, D., & Shumaker, S. A. (1981). People in places: A transactional view of settings. In Harvey, J. H. (Ed.), *Cognition social behavior and the environment*, 441-488, Hillsdale, NJ: Lawrence Erlbaum Assoc.
- [87] Stokowski, P. A., & Lee, R. G. (1991). The Influence of social network ties on recreation and leisure: An exploratory study. *Journal of Leisure Research*, 23 (2), 95-113.

- [88] Taylor, A. F., Kuo, F. E., & Sullivan, W. C. (2001). Coping with add: the surprising connection to green play settings. *Environment & Behavior*, 33 (1), 54-77.
- [89] Tennessen, C. M., & Cimprich, B. (1995). Views to nature: effects on attention. *Journal of Environmental Psychology*, 15 (1), 77-88.
- [90] Tuan, Yi-Fu. (1976). Humannistic Geography. *Annals of the Association of American Geographers*, 66, 206-276.
- [91] Turley, L. W., & Milliman, R. E. (2000). Atmospheric effects on shopping behavior: a review of the experimental evidence. *Journal of Business Research*, 49 (2), 193-211.
- [92] Ulrich, R., Simons, R., Losito, B., Fiorito, E., Miles, M., & Zelson, M. (1991). Stress Recovery during Exposure to Natural and Urban Environments. *Journal of Environmental Psychology*, 11, 201-230.
- [93] Williams, D. R., Patterson, M. E., Roggenbuck, J. W., & Watson, A. E. (1992). Beyond the commodity metaphor: Examining emotional and symbolic attachment to place. *Leisure Sciences*, 14 (1), 29-46.
- [94] Wells, N. M. (2000). At home with nature: effects of 'greenness' on children's cognitive functioning. *Environment & Behavior*, 32 (6), 773-95.
- [95] Yuksel, A., Yuksel, F., & Bilim, Y. (2010). Destination attachment: Effects on customer satisfaction and cognitive, affective and conative loyalty. *Tourism Management*, 31 (2), 274-284.