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Research Paper

Evaluating tourists' emotional experiences regarding destination casino resorts: An impact-asymmetry analysis

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ABSTRACT

The aim of this study is to identify the basic, excitement, and performance emotions that influence tourists' satisfaction and dissatisfaction with destination casino resorts. The study develops a measurement scale that consists of both positive and negative emotions. Two hundred and ninety eight valid questionnaire responses are analyzed using an extended impact-asymmetry analysis (IAA) in order to explain how positive and negative emotions can influence overall satisfaction of gaming and non-gaming tourists. This study demonstrates how to use an IAA to classify negative emotions into negative basic, excitement, and performance factors. The study contributes to knowledge on how to combine three-factor theory with emotion theory. The results add to our understanding that most of the negative emotions generated from gaming will not result in tourist dissatisfaction with destination casino resorts. These findings lead on to further investigation of the effects of negative emotions towards destinations in the context of three-factor theory.

1. Introduction

Destination casino resorts have become iconic tourist attractions (McCartney, 2017) as they provide a wide range of facilities that allow tourists to engage in multiple activities such as leisure gambling, shopping, and enjoying musical theatre and acrobatic shows (Wu & Chen, 2015). The gaming and non-gaming activities in destination casino resorts stimulate tourists' different emotional experiences and these play an important role in tourists' satisfaction (Prayag, Hosany, & Odeh, 2013). Tourists' emotional experiences have been explored broadly in hedonic terms with respect to destinations associated with natural and heritage environments (Beeho & Prentice, 1997), hiking in nature (Chhetri, Arrowsmith, & Jackson, 2004), hedonic holidays (Hosany & Gilbert, 2010), adventure tourism (Faullant, Matzler, & Mooradian, 2011), but there are few studies concerning understanding and measuring tourists' emotional experiences with regard to destination casino resorts. Destination casino resorts attract tourists through their provision of gaming and non-gaming hedonic services and entertainment, and thus should be seen as a special kind of tourist attraction (MacDonlad & Eadington, 2008; Wong & Rosenbaum, 2010). In view of this, there is a need to explore emotional experiences in terms of tourist satisfaction.

Many studies make the assumption that there is a linear relationship between experiential factors and customer satisfaction (e.g. Milman & Tasci, 2018). An asymmetric relationship may, however, exist. According to Kano's (1984) quality attribute-satisfaction model and Matzler and Sauerwein's (2002) three-factor theory, factors can be classified into three categories: basic (must-be), excitement (attractive), and performance (one-dimensional). Matzler and Sauerwein maintain that basic factors unidirectionally influence customer dissatisfaction; excitement factors unidirectionally affect customer satisfaction; and performance factors generate both dissatisfaction and satisfaction. With regard to research on emotional factors, some authors have empirically demonstrated that human preferences do not conform to simple one-dimensional scalability (Lichtenstein & Slovic, 2006; Tversky & Thaler, 1990). Thus, emotions that influence customer satisfaction may also exhibit this kind of factor-structure. If so, basic emotions are must-have emotions that lead to customer dissatisfaction should they be absent. Even if tourists experience these emotions, satisfaction is not necessarily increased. Excitement emotions increase customer satisfaction when tourists experience it but do not generate dissatisfaction when absent. Finally, performance emotions work in both directions, generating satisfaction when tourists experience it and dissatisfaction when they do not (Alegre & Garau, 2010). Therefore, the identification of the factor-structure of emotions is very important for studying tourist satisfaction in destination casino resorts.

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The aim of this study is to identify the basic, excitement, and performance emotions that influence tourists' satisfaction and dissatisfaction with destination casino resorts. Destination casino resorts are resort complexes where tourists can enjoy a variety of services and entertainment including casino gambling, different types of restaurants, luxury shops, spas, 3D cinemas, convention centres, and concert theatres. The literature reveals that few destination emotional scales have been explored apart from Hosany and Gilbert's (2010) study that aims to measure the diversity and intensity of tourists' positive emotional experiences toward destinations. Since many tourism destinations increasingly opt to legalize casinos to address a variety of economic imperatives (Eadington, 1999), it is important to understand visitors' emotional experiences. However, no studies were found that attempt to measure tourists' emotional experiences in this context. In fact, gaming generates a rich set of emotions especially with regard side to the deployment of gaming tactics such as bluffing (Griffiths, 2007) that previous tourism studies do not cover. Thus, the second aim of this study is to develop a measurement scale for measuring tourists' emotional experiences concerning destination casino resorts. In order to explore these emotional reactions, Mikulic and Prebezac (2008) suggested using an impact-asymmetry analysis (IAA) to classify the factor-structure of positive factors. Subsequent researchers further applied IAA to identify the factor-structure of service attributes in different tourism contexts such as sun and sand destinations in general (Alegre & Garau, 2011) and Croatian nautical tourism in particular (Mikulic, Kresic, & Kozic, 2015). Many studies have examined tourists' positive emotional experiences, but tourists may experience negative emotions within the context of gaming (St-Pierre, Temcheff, Gupta, Derevensky, & Paskus, 2014) and as a consequence may develop a dissatisfaction with the resort. Since Mikulic and Prebezac's (2008) IAA only aimed to evaluate positive factors, the third aim of this study is to extend Mikulic and Prebezac's (2008) IAA to calculate both positive and negative emotions.

Tourists seek a variety of experiences in different tourism activities and as a consequence may exhibit different emotional responses (Io, 2016). For example, tourists may experience a “thrill” when playing games in casinos (Wan, 2012b) and consequently tourists engaging of gaming activities (referred to as gaming tourists) may exhibit emotional responses that other tourists (referred to as non-gaming tourists) do not have access to. Despite the possibility of experiencing a negative reaction, gaming tourists still want to gamble in casino resorts. One of the possible explanations is that experiences associated with negative emotions may not lead to dissatisfaction. However, the effects of positive and negative emotions on satisfaction and dissatisfaction between gaming and non-gaming tourists remain to be explored. The fourth aim of this study is to compare the factor-structure of emotions between gaming and non-gaming tourists in destination casino resorts. Knowing the factor-structure of emotions for these two groups of tourists provides guidance for the operators of destination casino resorts to build their facilities and design different activities for improving tourist satisfaction as well as reducing customer dissatisfaction.

This study therefore attempts to provide contributions from four aspects: (1) to identify the basic, excitement, and performance emotions that influence tourists' satisfaction and dissatisfaction with destination casino resorts so as to determine the existence of three-factor-structure of emotions; (2) to develop a measurement scale for measuring tourists' emotional experiences regarding destination casino resorts; (3) to extend existing IAA methods to evaluate both positive and negative emotions; and (4) to compare the factor-structure of emotions between gaming and non-gaming tourists in destination casino resorts. By using an extended IAA method to evaluate the tourists' positive and negative emotional experiences regarding destination casino resorts, this study crosslinks three-factor theory with emotion theory to compare the factor-structure of emotions between gaming and non-gaming tourists in destination casino resorts.

2. Literature review

2.1. Customer emotions

Three decades ago, researchers began investigating consumption-related emotions in order to illuminate satisfaction (attitudinal) responses to consumption, not least because customer emotions provided retailers with information on decision-making among customers (Oliver, 1993). Researchers have examined the emotions generated by different products such as Holbrook, Chestnut, Oliva, and Greenleaf (1984), who studied the roles of emotions in the enjoyment of games. Later, studies were extended to examine the emotions generated by different types of services, notably Oliver (1994) who examined the effects of consumption emotions in an adolescent health-care setting.

Researchers have studied consumption emotions based on the frameworks developed in psychology such as affect theory (Tomkins, 1962), cognitive arousal theory (Schachter & Singer, 1962), and motivations (Izard, 1972; Plutchik, 1962). The most-cited scales for studying consumption emotions include Izard's (1972, 1977) Differential Emotions Scale (DES), Mehrabian and Russell's (1974) Pleasure-Arousal-Dominance (PAD) Scale, Plutchik and Kellerman's (1974) Emotional Profile Index (EPI), and Watson, Clark, and Tellegen's (1988) Positive Affect and Negative Affect Schedule (PANAS). Table 1 lists the emotion items of the above scales. Researchers have also used these scales in different research contexts. Plutchik (1980), for example, used an evolutionary perspective of EPI to identify eight “primary” emotions – fear, anger, joy, sadness, acceptance, disgust, expectancy, and surprise – to measure these emotions in humans. Holbrook and Westwood (1989) shortened Plutchik's primary emotions to examine the roles of emotions in advertising, whereas Westbrook (1987) and Westbrook and Oliver (1991) replicated DES to study automobile and cable TV consumption. Richins (1997) developed a more comprehensive set (34 items for 13 dimensions), referred to as Consumption Emotion Set (CES), that more completely captures the variety of emotions experienced in the consumption content than does DES. Other researchers, meanwhile, have employed PANAS to evaluate product and service satisfaction (Mano & Oliver, 1993), post-purchase behaviors (Mooradian & Olver, 1997), and the experience of quality and satisfaction (Zins, 2002). They concluded that positive emotion is positively associated with customer satisfaction

Table 1
Emotion items developed in previous psychology studies.

Author(s)	Scale	Emotion items
Izard (1972, 1977)	Differential Emotions Scale (DES)	Ten fundamental emotions (interest, enjoyment, surprise, distress (sadness), anger, disgust, contempt, fear, shame/shyness, and guilt) (30 descriptors)
Mehrabian and Russell (1974)	Pleasure-Arousal- Dominance (PAD) Scale	P – pleasure, A – arousal, and D – dominance (18 semantic differential descriptors)
Plutchik and Kellerman (1974)	Emotional Profile Index (EPI)	Eight ‘primary’ emotions (fear, anger, joy, sadness, acceptance, disgust, expectancy, and surprise) (62 descriptor pairs)
Watson, Clark, and Tellegen (1988)	Positive Affect and Negative Affect Schedule (PANAS)	Ten positive affect items (enthusiastic, interested, determined, excited, inspired, alert, active, strong, proud, and attentive) and 10 negative affect items (scared, afraid, upset, distressed, jittery, nervous, ashamed, guilty, irritable, and hostile)

while negative emotion is negatively associated with customer satisfaction (Mano & Oliver, 1993; Oliver, 1992, 1993).

Emotions can be seen as the causes, mediators, or effects of other psychological processes such as attention, memory, and perception (Barrett, 2006). Therefore, researchers have shifted their focus to the evaluation of the effects of positive and negative emotions with regard to other variables. For example, White (2010) examined the impact of positive, bi-directional, and negative emotions on customer satisfaction, service quality, and positive word-of-mouth intention formation processes over time. Lo and Wu (2014) tested the impact of spa service quality, positive and negative consumption emotions, and hedonic and utilitarian perceived value on intentions to visit a spa in China. Song and Qu (2017) investigated the mediating role of positive and negative emotions between perceived value and customer satisfaction with regards to US Asian restaurants. In another study, Ou and Verhoef (2017) examined the interactive effects of positive and negative emotions between customer equity drivers and loyalty intentions in 18 service industries in the Netherlands.

2.2. Measurement of emotions in hospitality and tourism studies

With regard to tourism research, some measurement scales were developed for different tourism sectors, such as Han, Back, and Barret (2010), who created a consumption emotion scale for use in full-service restaurants, and Lee and Kyle (2013), who developed a Festival Consumption Emotion (FCE) scale to capture festival-goers' emotional experiences in Texas. Some empirical studies were also conducted to identify the roles of emotions on tourist satisfaction and repeat patronage. For example, Jang and Namkung (2009) found that emotions mediate the relationship between perceived quality and behavioural intentions in full-service restaurants in the US, and Hosany and Gilbert (2010) developed the Destination Emotion Scale (DES) and indicated that tourists' emotional experiences are related to satisfaction, which in turn has a significant influence on behavioural intentions. "Emotion" research in the hotel sector is important because the emotions that customers experience during a hotel stay differ in type and intensity (Barsky & Nash, 2002). There have been studies of various types of hotels in different countries such as Han and Back's (2007a, 2007b) research on the US lodging industry, Ladhari's (2009) study of the Canadian hotel industry, Bonnefoy-Claudet and Ghantous' (2013) investigation of ski resorts in the French Alps, and Ali, Amin, and Ryu's (2016) research into Chinese resort hotels. Table 2 shows the details of this research.

The development of large-scale destination casino resorts is an important trend in tourism, especially in Asia (Lai & Hitchcock, 2016). Destination casino resorts offer a variety of gaming and non-gaming activities such as acrobatic acts and musical theatre. Since many tourist destinations have already legalized (such as Singapore) or are planning to legalize casinos (such as Taiwan), understanding the effects of tourists' emotions generated by gaming and non-gaming activities on their behavioural intentions has become vital. Few studies in this area have been conducted, although Io (2016) recently explored the impact of hedonic activities on casino-hotel visitors' positive emotions and satisfaction in Macau. Her research has limitations, however, because it only examined a limited number of positive emotions (14 items) and did not consider negative emotions.

2.3. Three-factor theory and impact-asymmetry analysis

Kano (1984) first formulated the idea of five types of quality attributes (must-be, one-dimensional, attractive, indifferent, and reverse), and then Matzler and Sauerwein (2002) further developed their three-factor theory, which holds that attributes can be categorized into three factors (basic, excitement, and performance) as shown in Fig. 1a. Basic factors may be considered to be dissatisfiers as they comprise a basic set of requirements that cause dissatisfaction if not fulfilled but do not cause satisfaction even when implemented (Lee & Min, 2013). Therefore, for dissatisfiers there is an asymmetric relationship between factor-level performance and overall satisfaction as a low performance among these factors has a greater impact on overall satisfaction than high performance (Füller & Matzler, 2008; Anderson & Mittal, 2000). These factors are prerequisites that customers take for granted (Busacca & Padula, 2005). Likewise, excitement factors may be understood as satisfiers as they do not trigger dissatisfaction when absent but they enhance satisfaction when implemented (Lee & Min, 2013). In contrast to dissatisfiers, high performance on satisfiers has a greater impact on overall satisfaction than low performance (Füller & Matzler, 2008), and therefore an asymmetric relationship also exists. Hybrids (performance factors) also cause satisfaction if fully delivered and dissatisfaction if poorly or not delivered (Busacca & Padula, 2005) and in this case, the

Table 2
Measurement of emotions in previous hospitality and tourism studies.

Author(s)	Research area	Sample size	Emotion items
Han and Back (2007a, 2007b)	Lodging industry in USA	248 faculty members and graduates	Tested the impact of seven emotional dimensions (24 positive and 14 negative emotions) on customer satisfaction and repeat visit intentions.
Ladhari (2009)	Hotel industry in Canada	200	Used 3 measurable items (happiness, pleasantness, and joy) to measure emotional satisfaction.
Jang and Namkung (2009)	Full service restaurants in the USA	290	Positive (joy, excitement, peacefulness, and refreshment) and negative (anger, distress, disgust, fear and shame) emotion.
Hosany and Gilbert (2010)	Holiday destinations in UK	200 + 520	Destination Emotion Scale (joy, love, and positive surprise) which indicated that tourists' emotional experiences are related to satisfaction, which in turn has a significant influence on behavioural intentions.
Han, Back, and Barret (2010)	Full-service restaurant at Midwestern University	164 staff	32 items in four dimensions (excitement, comfort, annoyance, and romance), annoyance is a negative dimension that covers five negative emotions (irritated, frustrated, disappointed, anger, and sceptical)
Lee and Kyle (2013)	Festival goers' emotional experiences in Texas	743	Festival consumption emotion (FCE) scale that is comprised of 10 positive emotions (caring, loving, compassionate, happy, pleased, glad, delighted, contented, supervised, and astonished) in three dimensions (love, joy, and surprise) and 12 negative emotions (annoyed, frustrated, irritated, aggravated, unfulfilled, unhappy, unsatisfied, discontented, worried, tense, uneasy, and nervous)
Bonnefoy-Claudet and Ghantous (2013)	Ski resorts in the French Alps	137 + 540	The effects of 11 emotions (contented, pleased, warm hearted, optimistic, enthusiastic, joyful, passionate, calm, happy, excited, and peaceful) on perceived value and customer satisfaction
Ali, Amin, and Ryu (2016)	Resort hotels in China	340	Measurable items (elated, related, and happy) to measure customer consumption emotions
Io (2016)	Casino-hotels in Macau	500 Chinese tourists	Light pleasure (fun, interesting, relax, pleasant), intensive fun (challenging, surprised, romantic, entertained, love)

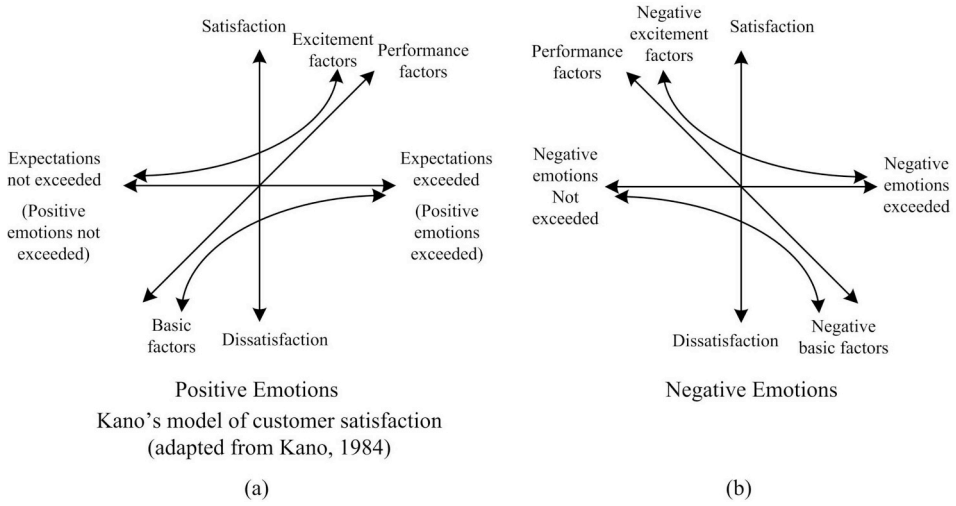

Fig. 1. Factor-structure for positive and negative emotions.

performance-overall satisfaction relationship may be conceived of as being linear and symmetric (Füller & Matzler, 2008).

In order to correctly test asymmetric relationships between attributes and satisfaction/dissatisfaction, Mikulic and Prebezac (2008) developed an approach called Impact Asymmetry Analysis (IAA), which is based on a multiple regression analysis with dummy variables (Brandt, 1987). There are two sets of dummy variables in which the penalty dummy set is obtained by using the coding of 1 where the value of attribute-satisfaction is low (e.g. value = 1) and as 0 for other values of attribute-satisfaction. The reward dummy set is obtained by coding it as 1 where the value of attribute-satisfaction is high (e.g. value = 5 on a 5-point scale) and as 0 for other values of attribute-satisfaction. Equation (1) is the basic formula to explain the concept of calculating reward-index and penalty-index. Equations (2)–(4) are used to identify the factor-structure. When the value of the reward-index is larger than the value of penalty-index, this attribute is an excitement factor (Equation (2)). The attribute is a basic factor in case its value of reward index is smaller than its value of penalty-index (Equation (3)). Accordingly, the attribute is a performance factor if its value of reward index is approximately equal to its value of penalty index (Equation (4)).

$$OS = C + reward_{index} \times reward\_dummy + penalty_{index} \times penalty\_dummy + err \quad (1)$$

where OS = overall satisfaction, C = constant, and err = error

$$reward_{index} > |penalty_{index}| \rightarrow \text{excitement factor} \quad (2)$$

$$reward_{index} < |penalty_{index}| \rightarrow \text{basic factor} \quad (3)$$

$$|reward_{index}| \approx |penalty_{index}| \rightarrow \text{performance factor} \quad (4)$$

Mikulic and Prebezac (2008) calculated the scores in terms of an impact-asymmetry (IA) to classify different factor-categories. Equations (5)–(8) show the steps of the calculation for IA. The range of impact on overall satisfaction (RIOS) is the absolute sum of the reward-index and penalty-index (Equation (5)), the satisfaction-generating potential (SGP) is the ratio of reward-index over RIOS (Equation (6)), the dissatisfaction-generating potential (DGP) is the ratio of penalty-index over RIOS (Equation (7)), and IA index of an attribute is equal to SGP minus DGP (Equation (8)). From the values of IA, the attributes can be classified as follows: frustrators ($IA < -0.6$), dissatisfiers ($-0.6 \leq IA \leq -0.2$), hybrids ($-0.2 < IA < 0.2$), satisfiers ($0.2 \leq IA \leq 0.6$), and delighters ($IA > 0.6$).

$$RIOS = reward_{index} + |penalty_{index}| \quad (5)$$

$$SGP = \frac{reward_{index}}{RIOS} \quad (6)$$

$$DGP = \frac{|penalty_{index}|}{RIOS} \quad (7)$$

$$IA = SGP - DGP \quad (8)$$

Table 3 shows a number of studies on tourism that have been conducted by following or extending Mikulic and Prebezac's (2008) IAA. None of them, however, has used IAA to measure negative attitudes and also none of them has involved the measurement of emotional experiences.

3. Research method

Since the aim of this study is to identify the three factor-structure categories of emotions that influence tourists' satisfaction and dissatisfaction with destination casino resorts, the first step is to develop the emotional measurement scale for these facilities.

3.1. Scale development

This study adopts Hosany and Gilbert's (2010) Destination Emotion Scale as a base because this scale provides a rich list of 23 emotional items. This study also considers whether or not tourists' emotional responses may be influenced by their gaming activities, and accordingly emotional items of gaming in casinos are included. Prasad and Whitney (2005) argued that when playing games, people may exhibit what they called "sassy primitive" emotions. These include feelings of grief, sorrow, fear, remorse, loss, suffer, endure, distress, anxiety, apprehension, fretfulness, nervous, anger, fright, hate, pain, rage, and thrill. A focus group discussion was conducted with seven tourists and three employees of destination casino resorts in order to validate and improve the emotional measurement scale for the study. Six negative (bluff, vengeance, selfishness, prejudice, jealousy, greed) and three positive (pride, advanced, and concern) emotional items were further added which mainly reflect the feelings concerned with gaming and non-gaming activities in destination casino resorts. In total, there are 50 emotional items where 23 items were borrowed from Hosany and Gilbert (2010), 18 items were selected from Prasad and Whitney (2005), and nine items were developed by the focus group discussion.

3.2. Questionnaire design

The questionnaire comprised three sections with two filter

Table 3
Pervious IAA studies in tourism.

Author(s)	Research area	Sample size	Attributes
Mikulic and Prebezac (2008)	Croatian airport	1049	Nine attributes (Ease of finding your way, check-in procedure, offer of restaurants, shopping possibilities, cleanliness, comfort level of the building, staff politeness, offer of flights, and availability of luggage carts)
Alegre and Garau (2011)	Sun and sand destinations	1786	18 attributes (Accommodation, cultural activities, nightlife, climate, local cuisine, local lifestyle, easy access to information or easy holiday to arrange, cleanliness and hygiene, scenery, beaches, doing sports, familiar destination, interesting towns or cities, getting to know other tourists, safety, tranquillity, prices in line with budgets, and historic sites)
Mikulić and Prebežac (2011)	Hotel animation programs at Mediterranean sun-and-sea resorts	994	16 attributes: Sports animation (Variety of sports, quality of facilities and equipment, number of participants, staff competence, staff politeness), Evening entertainment (Program attractiveness, quality of performance, program variety during the week, ambience of the location, and duration of the program), and Entertainment programs for children (Variety of activities, quality of facilities and equipment, number of participants, staff competence, staff's knowledge of foreign languages, and staff politeness)
Back (2012)	Korean restaurants	239	14 attributes, Food (Food taste, food variety, food temperature, presentation, portion size), Atmosphere (Cleanliness, comfortable atmosphere, aroma of the restaurant, decor and design), Service (Attentive service, reliable service, prompt service), Value (Accurate check, fair price)
Mikulic, Kresic, and Kozic (2015)	Croatian nautical tourism	2171	23 attributes (Service attitude of people, berths, cleanliness of sanitary facilities, water supply, quality of technical services, quality of catering services, landscaping and tidiness, shopping facilities, water and electricity connections, availability of destination-related information, transfer at airport, transfer at marina, vessel supply, vessel condition, beauty of nature and scenery, personal safety, access to the departure port, geographical spread, a wealth of gastronomic offers, variety of cultural manifestations, variety of sports activities, and variety of entertainment, shopping opportunities)
Ye, Fu, and Law (2016)	Online travel agents website quality	289	15 attributes, Customer relationship (Easy for users, provides assistance, responds to user inquiries promptly, platform for users to exchange travel experiences, features personalization, FAQ), Information (Information updated, information accurate, information concise, easy to find wanted information), Security (adequate security, full confirmation of online payment, reputable company behind the site), Function (Easy to navigate, enables quick links)
Mikulic, Kresic, Milicevic, Seric, and Curkovic (2016)	Destination attractiveness	679	21 attributes (Quality of public transportation, quality of hostel accommodation, kindness of the hostel staff, friendliness of local people, availability of Wi-Fi Internet hotspots, gastronomic offer, picturesqueness of the destination, cultural sights, events and festivals, nightlife and evening entertainment, street performances, souvenir offer, landscape decoration, shopping possibilities, quality of tourist information, clarity of tourist signalization, opening times of shops, cafes and restaurants, opening times of cultural institutions, feeling of personal safety, offer of nearby excursions, and value for money)
Lai and Hitchcock (2017)	Luxury hotels	293	49 attributes in eight dimensions (tangible, reliability, responsiveness, assurance, empathy, core benefit, technology, and entertainment)

questions. The first was used to qualify the respondents who were guests and who had experiences in non-gaming and/or gaming activities in the destination casino resorts in Macau. The second was used to clarify whether or not they were frequent or professional gamblers. Only the respondents who were neither frequent nor professional gamblers were invited to complete the questionnaire. The first section asked respondents about their overall satisfaction with destination casino resorts that they were visiting. Four questions adapted from Gao and Lai (2015) were asked for respondents to rate their overall satisfaction on a seven-point Likert-type scale with 1 = "strongly disagreed" to 7 = "strongly agreed". The questions were: OS1 – "Overall I was fully satisfied with this destination casino resort"; OS2 – "Overall I think it is value for money and time to visit this destination casino resort"; OS3 – "Overall the experiences I have in this destination casino resort met my expectation"; and "OS4 – Overall the level of satisfaction of this destination casino resort is high". Consistent with previous research (Hosany & Gilbert, 2010; Nyer, 1997), the second section asked respondents about their immediate emotions in a range of 50 items (for e.g. "I felt a sense of pleasure") on a seven-point Likert-type scale with 1 = "not at all" to 7 = "very much". In order to reduce the likelihood of common method variance, the positive and negative emotions were sorted alternatively (Chang, van Witteloostuijn, & Eden, 2010). The final section concerned the background of the respondents. In 2016, 90.3% of tourists in Macau were Chinese (Macao Tourism Data plus, 2017) and so this questionnaire was developed in English and then back-translated to Chinese. The questionnaire was then cross-checked by two teachers who teach English-Chinese translation in higher education to ascertain the accuracy of the English to Chinese translation. The questionnaire was administered in both English and Chinese.

With regard to assessing content validity, the draft of the questionnaire was checked by two professors of hospitality and tourism. A pilot survey was then conducted with 30 guests at three destination resorts during 20–26 July 2017. Some respondents stated that the meanings of some emotions were easily confused, so further explanations for some emotions were provided such as: "remorse" – deep guilt for making a wrong decision.

3.3. Data collection

The research site of this study was Macau: the world's largest gaming destination and thus the setting provides a good opportunity for distinguishing all three categories of emotions. In order to achieve the maximum precision of the population and avoid bias in the selection procedure (sampling bias) (Moser & Kalton, 1971), a systematic sampling method was employed at all the destination resorts in Macau from August to September 2017. The questionnaires were administrated by two trained research assistants. 312 sets of questionnaires were collected at regular sampling intervals (every 30 min) from 9.00 to 23.00 h

Table 4
Description of respondents (n = 298).

		Frequency	Percentage (%)
Gender	Males	139	46.6
	Females	159	53.4
Age	18–29	156	52.3
	30–39	81	27.2
	40–49	43	14.4
	50 or over	18	6.0
Income(USD)	Below 1000	112	37.6
	1000–2999	111	37.2
	3000–4999	48	16.1
	5000 or over	27	9.0
Education	Primary school	2	0.7
	Secondary school	45	15.1
	College	92	30.9
	Undergraduate	117	39.3
	Postgraduate	42	14.1
No. of visits	1	110	36.9
	2–5	89	29.9
	6–10	32	10.7
	Over 10	67	22.5
Country	China	165	55.4
	Hong Kong	53	17.8
	Taiwan	18	6.0
	Asia	29	9.7
	Europe	13	4.4
	North America	3	1.0
	Australia	3	1.0
	Other	14	4.7
Gaming	Yes	129	43.3
	No	169	56.7

inside the destination resorts. To prevent response (habituation) bias, 14 questionnaires, which respondents consistently gave the same rating for most items, were removed (Jackson, 2015). A total of 298 sets were identified as being valid for analysis. The distribution of the sample population is similar to previous studies in destination casino resorts in Macau (e.g. Lai & Hitchcock, 2016).

4. Findings

4.1. Respondent characteristics

Table 4 presents the respondent characteristics. The sample of respondents was composed of 46.6% males and 53.4% females, and the majority of the respondents were in the 18–29 age group (52.3%). Respondents with a monthly income below US$1000 accounted for 37.6% and followed by US$1000–2999 (37.2%). Over one-third of respondents were the first-time visitors to Macau and 43.3% of respondents had participated in gaming activities in the destination.

4.2. Impact-asymmetry analysis of positive and negative emotions

In this study, the proposed emotions are comprised of 26 positive and 24 negative emotions. As mentioned above, Mikulic and Prebezac's (2008) IAA was designed for assessing positive attributes that influence overall satisfaction. An excess of negative emotions would lead to overall dissatisfaction and vice versa and thus the factor-structure for negative emotions was revised as shown in Fig. 1b.

With regard to a negative emotion, presence causes dissatisfaction but the absence of it does not automatically lead to customer satisfaction. This negative emotion is viewed as a negative basic factor. On the other hand, the absence of a negative emotion will improve customer satisfaction, but its existence does not necessarily lead to customer dissatisfaction. This negative emotion is counted as a negative excitement factor. Then, a negative emotion that leads to dissatisfaction if it is high and leads to satisfaction if it is low. This negative emotion has a negative correlation with customer satisfaction and thus this negative emotion is a negative performance factor. Table 5 shows the characteristics of positive and negative emotions.

The formulas for identifying negative excitement, basic, and performance factors are shown as follows:

$$|reward_{index}| > |penalty_{index}| \rightarrow \text{negative basic factor} \quad (9)$$

$$|reward_{index}| < |penalty_{index}| \rightarrow \text{negative excitment factor} \quad (10)$$

$$|reward_{index}| \approx |penalty_{index}| \rightarrow \text{negative performance factor} \quad (11)$$

The formulas for calculating RIOS and SGP are rewritten as:

$$RIOS = |reward_{index}| + |penalty_{index}| \quad (12)$$

$$DGP = \frac{|reward_{index}|}{RIOS} \quad (13)$$

$$SGP = \frac{|penalty_{index}|}{RIOS} \quad (14)$$

$$IA = SGP - DGP \quad (15)$$

According to the value of IA, the negative emotions can be classified as: delighters ($IA > 0.6$), satisfiers ($0.2 \leq IA \leq 0.6$), hybrids ($-0.2 < IA < 0.2$), dissatisfiers ($-0.6 \leq IA \leq -0.2$), and frustrators ($IA < -0.6$).

4.3. Scale purification

The scale purification process was performed through the use of the exploratory factor analysis (EFA) and conducted by SPSS version 16. After six cycles of reducing the number of items, 43 items in six dimensions were retained for which the criteria for retaining items with loadings was 0.5 or higher with no cross-loadings (Hair, Black, Babin, & Anderson, 2010). Table A1 in the Appendix shows the results of the EFA that account for 59.6% of the total variance. The six dimensions were catalogued as “primitive negative”, “joy”, “loss”, “positive surprise”, “love”, and “caring”.

4.4. Construct reliability and validity

For establishing construct validity, a PLS-SEM analysis was executed (Lowry & Gaskin, 2014) through using SmartPLS v.3.2.6 package (Ringle, Wende, & Becker, 2015) to assess the quality of the factor structure (Lai & Hitchcock, 2015). Table 6 shows the mean, standard deviation, and PLS factor loading for each emotion item. Table 7 shows the values of Cronbach's alpha, composite reliability (CR), and average

Table 5
Characteristics of positive and negative emotions.

Factor structure	Positive Emotion	Satisfaction	Dissatisfaction	Negative Emotion	Satisfaction	Dissatisfaction
Performance	High	High		High		High
	Low		High	Low	High	
Basic	High	No effect		High		High
	Low		High	Low	No effect	
Excitement	High	High		High		No effect
	Low		No effect	Low	High	

Table 6
Mean, standard deviation, and factor loadings.

	Mean	S.D.	PLS factor loading
Primitive negative			
Rage	1.987	1.524	0.718
Suffer	1.856	1.466	0.840
Grief	1.792	1.460	0.856
Sorrow	1.812	1.490	0.842
Pain	1.809	1.472	0.801
Fear	1.852	1.411	0.819
Vengeance*	1.755	1.418	0.780
Apprehension	2.332	1.626	0.699
Bluff*	2.312	1.768	0.649
Selfishness*	2.215	1.669	0.694
Anxiety	2.232	1.706	0.762
Remorse	2.128	1.646	0.739
Anger	1.889	1.487	0.755
Distress	1.946	1.538	0.715
Prejudice*	2.185	1.494	0.629
Thrill	2.332	1.763	0.608
Fretfulness	2.205	1.623	0.652
Jealousy*	2.396	1.824	0.584
Joy			
Entertained	5.070	1.650	0.720
Comfortable	5.154	1.606	0.784
Pleasure	4.862	1.609	0.771
Joy	4.940	1.575	0.819
Delight	5.205	1.538	0.803
Enjoyment	4.329	1.764	0.721
Cheerful	4.745	1.568	0.713
Advanced*	4.383	1.902	0.626
Enthusiasm	4.550	1.745	0.759
Positive surprise			
Surprise	4.671	1.699	0.849
Fascinated	4.131	1.905	0.800
Amazement	4.030	1.901	0.718
Pride*	3.772	1.879	0.683
Astonishment	4.091	1.911	0.780
Love			
Love	4.440	1.779	0.758
Happiness	4.956	1.612	0.840
Romantic	4.537	1.847	0.726
Tenderness	5.490	1.427	0.822
Loss			
Loss	2.648	1.778	0.724
Fright	1.980	1.458	0.812
Hate	1.953	1.456	0.874
Nervous	2.591	1.786	0.594
Caring			
Caring	3.245	1.929	0.667
Concern*	3.775	1.813	0.852
Warm-hearted	3.128	1.783	0.698
Items were dropped from the EFA			
Affection	3.094	1.880	
Sentimental	2.235	1.658	
Compassionate	2.644	1.836	
Inspired	3.980	1.861	
Greed*	3.312	2.108	
Endure	2.319	1.627	
Passionate	3.426	1.777	
Overall Satisfaction			
OS1	5.523	1.419	
OS2	5.413	1.468	
OS3	5.503	1.448	
OS4	5.570	1.444	

Remark: *identifying by the focus group in this study, EFA - Exploratory Factor Analysis.

variance extracted (AVE) for each emotion dimension. These values exceed the threshold and support the convergent validity and reliability (Hair, Ringle, & Sarstedt, 2011). Table 7 also shows the correlation between the two emotion dimensions. Since the square root of the AVE for each construct exceeds its correlation with any other construct, the discriminant validity is considered to be adequate (Hair et al., 2010).

4.5. Results of the impact-symmetry analysis

After examining the construct reliability and validity, a PLS IAA was conducted to distinguish the factor-structure of each emotion and each dimension of tourists' emotional experiences. In this study, a seven-point Likert scale was used, so the penalty dummy set was obtained by using the coding of 1 where the values of emotions were low (1 and 2) and as 0 for other values of emotions. The reward dummy set was obtained by coding as 1 where the values of motions are high (5–7) and as 0 for other values of emotions. Bootstrapping using 298 cases and 5000 samples was performed to assess the path coefficients' significance for the reward-index and penalty-index of each emotion. The values of RIOS, SGP, DGP, and IA for positive emotions were calculated using Equations (2)–(8). The values of RIOS, SGP, DGP, and IA for negative emotions were calculated using Equations (9)–(15). Table 8 shows the values of reward-value, penalty-value, RIOS, SGP, DGP, IA, and factor-structure for 21 positive and 22 negative emotions. For positive emotions, there are six delighters, seven satisfiers, seven hybrids, and one dissatisfier. For negative emotions, there are ten delighters, seven satisfiers, two hybrids, one dissatisfier, and two frustrators. For both positive and negative emotions, the numbers of excitement factors are more than the number of basic factors.

4.6. Factor-structure of six emotion dimensions

Since emotions belonging to the same dimension are not interchangeable, and accordingly, these motions belonged to the same dimension are considered to be formative indicators. For measuring the factor-structure of six emotion dimensions, this study followed Lai and Hitchcock's (2017) PLS IAA method taking the analysis one dimension by one dimension. Fig. 2 shows the PLS setting for measuring the factor-structure of the "love" dimension.

Table 8 also shows the structure of factor for six dimensions of emotions. With regard to the dimensions of positive emotions, "joy" and "love" dimensions are satisfiers, and the "positive surprise" and "caring" dimensions are delighters. For the dimensions of negative emotions, both "loss" and "primitive negative" dimensions are satisfiers.

4.7. Comparison of the factor-structure of emotions for gaming and non-gaming tourists

Gaming and non-gaming tourists may have different expectations when visiting destination casino resorts (Io, 2016). Thus they may experience different emotions and may have different responses to experiencing the same emotion. There are two groups of tourists who may be characterised as group 1, those who have experienced gaming activities and Group 2, those who have only experienced non-gaming activities. An IAA was separately performed on each group in order to understand the differences of factor-structure of emotions experienced between two groups.

For positive emotions: for Group 1, there are five delighters, seven satisfiers, seven hybrids, and two dissatisfiers (as shown in Table A2 in the Appendix). For Group 2, there are five delighters, seven satisfiers, seven hybrids, and two dissatisfiers (as shown in Table A3 in the Appendix). Table 9 shows the results of the comparison of positive emotions between two groups. Only seven emotions (advanced, amazement, caring, delight, joy, love, and enjoyment) are classified into the same categories for both groups. The experiences described as "comfortable", "entertained", and "astonishment" show great differences in their factor-structure.

Regarding negative emotions, there are great differences between these two groups. For Group 1, there were nine delighters, six satisfiers, six hybrids, and one frustrator (as shown in Table A2 in Appendix). For Group 2, there are three delighters, six hybrids, six dissatisfiers, and seven frustrators (as shown in Table A3 in Appendix). Table 9 shows the

Table 7
Reliability, construct validity, and correlation.

	Cronbach's Alpha	CR	AVE	Primitive negative	Joy	Loss	Positive Surprise	Love	Caring	OS
Primitive negative	0.949	0.954	0.540	*0.735*						
Joy	0.902	0.919	0.560	−0.125	*0.748*					
Loss	0.758	0.842	0.575	0.624	−0.147	*0.758*				
Positive Surprise	0.829	0.878	0.590	0.085	0.671	0.029	*0.768*			
Love	0.809	0.867	0.621	−0.159	0.656	−0.186	0.495	*0.788*		
Caring	0.620	0.786	0.553	0.212	0.406	0.097	0.444	0.303	*0.744*	
OS	0.941	0.957	0.849	−0.275	0.446	−0.330	0.300	0.571	0.149	*0.921*

Remark:
1. AVE - Average Variance Extracted, CR - Composite Reliability, OS – Overall Satisfaction.
2. Italic front = square-root of AVE.

Table 8
The factor-structure of positive and negative emotions.

	Reward index	t-statistics	Penalty index	t-statistics	BIOS	SGP	DGP	IA	Factor category
Positive emotions									
Fascinated	0.266	4.444	−0.024	0.341	0.290	0.917	0.083	0.834	Delighter
Amazement	0.207	3.295	0.019	0.275	0.226	0.916	0.084	0.832	Delighter
Caring	0.123	1.821	0.017	0.242	0.140	0.879	0.121	0.757	Delighter
Enthusiasm	0.276	4.687	−0.044	0.627	0.320	0.863	0.138	0.725	Delighter
Warm-hearted	0.174	2.998	0.034	0.509	0.208	0.837	0.163	0.673	Delighter
Pleasure	0.227	3.833	−0.050	0.597	0.277	0.819	0.181	0.639	Delighter
Concern	0.229	4.015	0.081	1.155	0.310	0.739	0.261	0.477	Satisfier
Joy	0.325	5.830	−0.132	1.692	0.457	0.711	0.289	0.422	Satisfier
Surprise	0.231	3.820	−0.102	1.364	0.333	0.694	0.306	0.387	Satisfier
Tenderness	0.390	6.842	−0.188	2.482	0.578	0.675	0.325	0.349	Satisfier
Happiness	0.321	5.629	−0.192	2.419	0.513	0.626	0.374	0.251	Satisfier
Cheerful	0.142	2.318	−0.085	1.079	0.227	0.626	0.374	0.251	Satisfier
Astonishment	0.129	1.990	−0.080	1.124	0.209	0.617	0.383	0.234	Satisfier
Pride	0.107	1.717	−0.075	1.127	0.182	0.588	0.412	0.176	Hybrid
Comfortable	0.247	4.166	−0.197	2.736	0.444	0.556	0.444	0.113	Hybrid
Enjoyment	0.160	2.763	−0.129	1.789	0.289	0.554	0.446	0.107	Hybrid
Delight	0.229	3.755	−0.190	2.910	0.419	0.547	0.453	0.093	Hybrid
Advanced	0.157	2.651	−0.149	2.276	0.306	0.513	0.487	0.026	Hybrid
Romantic	0.140	2.305	−0.143	2.098	0.283	0.495	0.505	−0.011	Hybrid
Love	0.152	2.444	−0.176	2.596	0.328	0.463	0.537	−0.073	Hybrid
Entertained	0.112	1.785	−0.172	2.398	0.284	0.394	0.606	−0.211	Dissatisfier
Negative emotions									
Fretfulness	0.003	0.032	0.202	2.626	0.205	0.985	0.015	0.971	Delighter
Bluff	−0.004	0.053	0.091	1.152	0.095	0.958	0.042	0.916	Delighter
Suffer	0.014	0.151	0.262	3.181	0.276	0.949	0.051	0.899	Delighter
Prejudice	−0.021	0.275	0.209	2.896	0.230	0.909	0.091	0.817	Delighter
Remorse	−0.025	0.317	0.224	2.939	0.249	0.900	0.100	0.799	Delighter
Anger	0.026	0.288	0.227	2.704	0.253	0.897	0.103	0.794	Delighter
Hate	−0.043	0.490	0.331	5.240	0.374	0.885	0.115	0.770	Delighter
Apprehension	0.025	0.323	0.149	2.275	0.174	0.856	0.144	0.713	Delighter
Fright	−0.037	0.414	0.202	2.892	0.239	0.845	0.155	0.690	Delighter
Rage	−0.049	0.568	0.251	3.324	0.300	0.837	0.163	0.673	Delighter
Distress	−0.044	0.505	0.173	2.215	0.217	0.797	0.203	0.594	Satisfier
Sorrow	−0.045	0.467	0.160	1.902	0.205	0.780	0.220	0.561	Satisfier
Thrill	−0.012	0.125	0.041	0.453	0.053	0.774	0.226	0.547	Satisfier
Jealousy	−0.037	0.446	0.092	1.306	0.129	0.713	0.287	0.426	Satisfier
Pain	−0.075	0.885	0.155	2.040	0.230	0.674	0.326	0.348	Satisfier
Anxiety	−0.065	0.769	0.131	1.826	0.196	0.668	0.332	0.337	Satisfier
Vengeance	−0.084	1.049	0.141	1.620	0.225	0.627	0.373	0.253	Satisfier
Nervous	−0.045	0.534	0.064	0.760	0.109	0.587	0.413	0.174	Hybrid
Grief	−0.122	1.201	0.092	0.972	0.214	0.430	0.570	−0.140	Hybrid
Loss	−0.234	3.425	0.068	1.059	0.302	0.225	0.775	−0.550	Dissatisfier
Fear	−0.148	1.837	0.033	0.425	0.181	0.182	0.818	−0.635	Frustrator
Selfishness	−0.185	2.374	−0.014	0.194	0.199	0.070	0.930	−0.859	Frustrator
The factor-structure of six emotion dimensions									
Joy	0.341	6.383	−0.220	3.532	0.561	0.608	0.392	0.216	Satisfier
Positive surprise	0.279	4.944	−0.073	1.123	0.352	0.793	0.207	0.585	Delighter
Love	0.433	7.691	−0.203	2.640	0.636	0.681	0.319	0.362	Satisfier
Caring	0.237	4.306	0.032	0.359	0.269	0.881	0.119	0.762	Delighter
Primitive negative	−0.181	3.027	0.339	6.528	0.520	0.652	0.348	0.304	Satisfier
Loss	−0.170	2.509	0.289	4.765	0.459	0.630	0.370	0.259	Satisfier

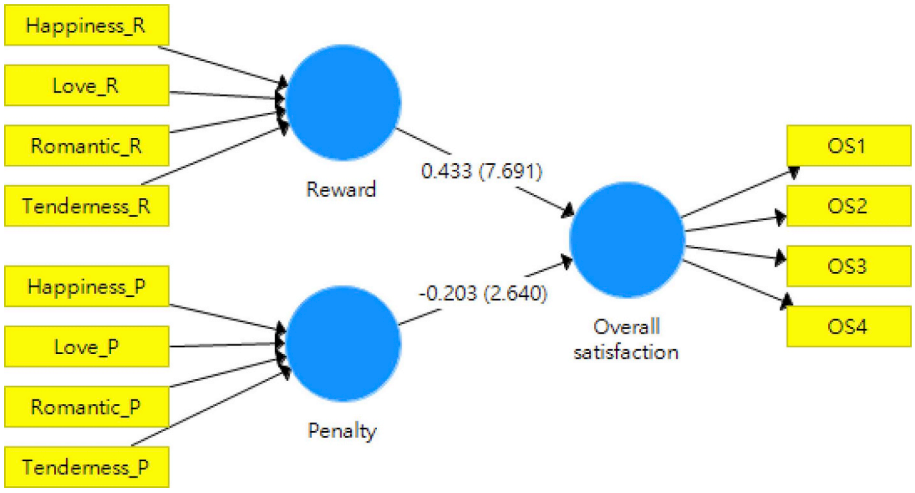

Fig. 2. PLS IAA method for measuring factor-structure of 'love' dimension.

results of the comparison on negative emotions. Six emotions (anger, apprehension, freight, loss, prejudice, and selfishness) belong to same categories for both groups; however, nine emotions (bluff, fear, grief, pain, remorse, sorrow, suffer, thrill, and vengeance) show the opposite factor-structure.

Table 9 also shows the comparison of factor-structure of emotion dimensions between these two groups. For Group 1, for positive emotions, "joy" and "love" dimensions are hybrids, "caring" dimension is a satisfier, and "positive surprise" dimension is a delighter. For Group 2, all positive dimensions are satisfiers. For negative emotions, for Group 1, "loss" dimension is a hybrid and "primitive negative" dimension is a satisfier. For Group 2, all negative dimensions are hybrids.

5. Conclusion and discussion

5.1. Conclusion

Through a combination of the literature review, focus group discussion, questionnaire survey, and scale purification, a measurement scale was developed which consists of 21 positive and 22 negative emotions for measuring tourists' emotional experiences concerning destination casino resorts. For identifying the factor-structure of these 43 emotional experiences, this study extended extant IAA methods to classify both positive and negative emotions into basic, excitement, and performance factors. The results of the extended IAA indicate that most of the positive and negative emotions are excitement factors. The result of the comparison of the factor-structure of emotions between gaming and non-gaming tourists indicates that there were great differences between these two groups in negative emotional experiences in which nine negative emotions even showed the opposite factor-structure between these two groups. The following sections will discuss the four aspects of contributions and the implication in practice from the results of this study.

5.2. Theoretical contribution

5.2.1. Three-factor-structure for emotions

Through the identification of the basic, excitement, and performance emotions that influence tourists' satisfaction and dissatisfaction with destination casino resorts, this study is the first to confirm that human emotions as attitudes can also be classified into three-factor catalogues (basic emotions, excitement emotions, and performance emotions). For example, "amazement" is a delighter, if a tourist who does not have an "amazement" feeling from a destination casino resort, he or she will not be unhappy; but he or she will be very happy if he or she has an amazing experience in the destination casino resort. This study finds that "entertained" is a dissatisfier; tourists expect to have a certain level of entertainment such as music recitals (opera singers on gondolas in the case of the Venetian), masquerade characters in lobbies aside from the more formal, and paid for cabarets and shows during visits to a destination casino resorts. They will be dissatisfied if the entertainment in the destination casino resort does not meet their expectations. Therefore, "entertained" is a "must" emotion for tourists visiting destination casino resorts in Macau because it is an essential component of what may be called a luxury experience set aside from everyday life. Consequently, this study is a pioneer in that it crosslinks three-factor theory with emotion theory together.

5.2.2. A new emotion measurement scale

From the literature review and the results of a focus group discussion, this study listed 26 positive and 24 negative emotions for destination casino resorts. The results of EFA retain 21 positive and 22 negative emotions in six dimensions. For positive emotions, "joy", "positive surprise", "love", and "caring" dimensions are derived from Hosany and Gilbert's (2010) destination emotion scale where the original "love" dimension is divided into "love" and "caring" dimensions. Tourists can have a set of "love" emotions when they observe that the resort's environment is romantic and tender. However, they only have a set of "caring" emotions when they encounter the caring services provided by the staff of destination casino resorts. That is why the "love" dimension is a satisfier and the "caring" dimension is a delighter. In contrast, for negative emotions, "primitive negative" and "loss£ dimensions are extended from "sassy primitive" emotions. Primitive negative emotions may be said to be "raw" or "innate" emotions which are stimulated when tourists encounter an unfavourable situation when playing games. The "loss" related emotions are generated when tourists lose the game. This study confirms that both positive and negative emotions exist which influence tourist satisfaction and dissatisfaction with destination casino resorts. So, researchers should consider both positive and negative emotions when conducting research into emotional states. Thus, this study provides a new measurement scale of emotions for destination casino resorts.

5.2.3. IAA approach for measuring positive and negative attitudes

During the past decades, the Kano model has gained increasing popularity within tourism research area (Mikulic & Prebezac, 2016) and the IAA developed by Mikulic and Prebezac (2008) is one of the methods that aim to distinguish the three categories of factors. A number of researchers have successfully applied this method in tourism studies as is shown in Table 3. However, in the actual situation,

Table 9
The factor-structure of positive and negative emotions for gaming and non-gaming tourists.

	Gaming activities		Non-gaming activities	
	IA	Factor category	IA	Factor category
Positive emotions				
Advanced	*0.122*	*Hybrid*	*−0.111*	*Hybrid*
Amazement	*0.733*	*Delighter*	*0.727*	*Delighter*
Astonishment	**0.753**	**Delighter**	**−0.376**	**Dissatisfier**
Caring	*0.220*	*Satisfier*	*0.354*	*Satisfier*
Cheerful	0.230	Satisfier	0.045	Hybrid
Comfortable	**−0.238**	**Dissatisfier**	**0.409**	**Satisfier**
Concern	0.408	Satisfier	0.636	Delighter
Delight	*0.044*	*Hybrid*	*0.148*	*Hybrid*
Enjoyment	*−0.137*	*Hybrid*	*0.114*	*Hybrid*
Entertained	**0.399**	**Satisfier**	**−0.883**	**Frustrator**
Enthusiasm	0.975	Delighter	0.418	Satisfier
Fascinated	*0.419*	*Satisfier*	*0.271*	*Satisfier*
Happiness	−0.090	Hybrid	0.294	Satisfier
Joy	*0.321*	*Satisfier*	*0.457*	*Satisfier*
Love	*−0.145*	*Hybrid*	*−0.162*	*Hybrid*
Pleasure	0.701	Delighter	0.128	Hybrid
Pride	0.664	Delighter	−0.136	Hybrid
Romantic	−0.266	Dissatisfier	0.147	Hybrid
Surprise	0.584	Satisfier	0.183	Hybrid
Tenderness	0.129	Hybrid	0.364	Satisfier
Warm-hearted	0.162	Hybrid	−0.253	Dissatisfier
Negative emotions				
Anger	*0.177*	*Hybrid*	*0.069*	*Hybrid*
Anxiety	0.197	Hybrid	−0.821	Frustrator
Apprehension	*0.802*	*Delighter*	*0.423*	*Delighter*
Bluff	**0.229**	**Satisfier**	**−0.297**	**Dissatisfier**
Distress	0.604	Delighter	−0.195	Hybrid
Fear	**0.311**	**Satisfier**	**−0.484**	**Dissatisfier**
Fretfulness	0.358	Satisfier	0.021	Hybrid
Fright	*0.181*	*Hybrid*	*−0.127*	*Hybrid*
Grief	**0.418**	**Delighter**	**−0.768**	**Frustrator**
Hate	0.531	Delighter	0.122	Hybrid
Jealousy	0.118	Hybrid	−0.686	Frustrator
Loss	*0.145*	*Hybrid*	*0.162*	*Hybrid*
Nervous	0.085	Hybrid	−0.990	Frustrator
Pain	**0.544**	**Delighter**	**−0.426**	**Dissatisfier**
Prejudice	*0.921*	*Delighter*	*0.738*	*Delighter*
Rage	0.226	Satisfier	1.000	Delighter
Remorse	**0.401**	**Delighter**	**−0.422**	**Dissatisfier**
Selfishness	*−0.676*	*Frustrator*	*−0.760*	*Frustrator*
Sorrow	**0.375**	**Satisfier**	**−0.209**	**Dissatisfier**
Suffer	**0.289**	**Satisfier**	**−0.398**	**Dissatisfier**
Thrill	**0.504**	**Delighter**	**−0.739**	**Frustrator**
Vengeance	**0.513**	**Delighter**	**−0.722**	**Frustrator**
The factor-structure of six emotion dimensions				
Joy	0.039	Hybrid	0.322	Satisfier
Positive surprise	0.971	Delighter	0.255	Satisfier
Love	0.058	Hybrid	0.378	Satisfier
Caring	*0.362*	*Satisfier*	*0.304*	*Satisfier*
Primitive negative	0.275	Satisfier	−0.031	Hybrid
Loss	*0.135*	*Hybrid*	*−0.016*	*Hybrid*

Remark: Italic front = same factor-structure, both front = opposite factor-structure.

negative factors also exist that negatively influence customer experiences. This fact not only limits the application of IAA but also prohibits researchers investigating negative attributes using the Kano model because the tools to evaluate the factor-structure for negative factors are insufficient. This study therefore helps to fill the gap by extending Mikulic and Prebezac's (2008) IAA for identifying the factor-structure for negative attitudes that affect customer satisfaction and dissatisfaction. In this study, 22 negative emotions are classified into five factor-categories. For example, “anger” is a delighter, so a tourist will be satisfied if he/she is not angered. Gaming necessarily involves risk taking, but if that risk extends to feelings of fearfulness, this will enhance dissatisfaction among tourists and so “fear” is a frustrator. This study demonstrates how to use the extended IAA to classify negative attitudes into “negative” basic, excitement, and performance factors. This extended IAA method can stimulate researchers' interests in studying three-factor-structure of negative attributes, enable researchers to analyse the asymmetry effects of negative attributes, and encourage researchers to employ other methods (such as importance grid developed by Vavra, 1997) for classifying Kano's three categories of negative factors.

5.2.4. Negative emotions

Many tourist cities, such as Singapore, are developing destination casino resorts and casinos have long been part of the discrete offering in places like London and Lucerne, as well as more prominent in places like Monte Carlo. However, tourists will experience different emotions in gambling destinations. Generally speaking, the relationship between tourism and gaming is an under-researched field considering its financial importance. The results of this study clearly show that there are great differences in tourists' perceptions of negative emotions. The non-gaming tourists realize the “primitive negative” dimension as a hybrid but gaming tourists view it as a satisfier (see Table 9). For the tourists who play games in casinos, they perceive most of the negative emotions (15 out of 22) as negative excitement factors that do not lead to dissatisfaction. However, tourists who only participate in non-gaming activities in the resorts count most of the negative emotions (13 out of 22) as negative basic factors that lead to their dissatisfaction. Within 22 negative emotions, gaming tourists treat four negative emotions (thrill, vengeance, grief, and pain) as delighters but non-gaming tourists view them as frustrators. In the real situation, non-gaming tourists who do not gamble are unlikely to experience such emotions and so they are likely to be satisfied when exposed to excitement emotions such as amazement and enthusiasm during visiting destination casino resorts. Even gaming tourists experience these emotions such as when they lose a game, though they do not feel dissatisfied with the destination casino resorts. Therefore, for gaming tourists, it is known from the literature that they are ‘experiencing satisfaction in the case of a win’ (Bussu & Detotto, 2013). This study adds the further understanding that they will not experience dissatisfaction from most of the negative emotions even if they lose a game. These results add to the understanding that negative emotions (generated from gaming) will not have negative effects on tourist behaviours toward a destination. Thus, positive emotions (such as pleasure) associated with good experiences (winning) in gaming will lead to tourist satisfaction. However, negative emotions (such as vengeance) associated with bad experiences (loss) in gaming will not cause tourist dissatisfaction. The gaming tourists possibly simultaneously experience the mixes of positive and negative emotions and, as a consequence, ultimately feel satisfied with the destination casino resorts. This study aims to lead a discussion on the effects of negative emotions and endeavours to stimulate further studies on the effects of negative emotions towards destinations in terms of the three-factor theory.

5.3. Implication in practice

The results of the study indicate that “entertained” is a “must” emotion. Therefore, the operators of destination casino resorts should provide entertainment that fulfils tourists’ expectations so as to prevent tourist dissatisfaction. In order to retain the interest of their customers, casino resorts might consider hosting a wide variety of entertainments of the kind that already exist (e.g. mime artists and jugglers), as well as investing in entirely new an experimental one (e.g. artificial intelligence animated shows). The operators can think creatively in terms of what may stimulate “amazement”, “caring”, “concern”, “enthusiasm”, “fascinated”, and “joy” as these are excitement factors for both gaming and non-gaming tourists (see Table 9). Operators should design facility settings (e.g. more seating areas), activities (e.g. child-care activities for parents), and entertainment that can provide tourists with the above feelings in terms of experiences and not just the provision of goods and services. A combination of new experiences such as

investment in life-like robots and old ones such as the re-introduction of mechanical slot machines could help diversify what is already on offer.

Since non-gaming tourists will not have negative emotions generated from gaming, so operators should put their efforts into diluting those negative emotions (negative hybrid and basic factors) that cause gaming tourist dissatisfaction. For example, “loss” is a hybrid emotion for gaming tourists in a case where tourist loses a significant amount of money in gaming, operators can offer in cuisine coupons and free accommodation as a compensation. These compensatory actions can dilute the “loss” feeling and reduce tourist dissatisfaction. In order to reduce the “nervous” emotion, operators can arrange relaxing entertainments such as dance shows. Even playing a musical instrument or engaging the services of mime artist can effectively enhance the atmosphere of relaxation. When faced with the introduction of casinos in order to develop tourism, many people globally react negatively, not least because of a widespread and cross-cultural negative association with gambling. Of course, they are aware that destination casino resorts can attract tourists, especially Chinese ones (the top source of tourists). Gaming features highly in Chinese expectations because of its importance in Chinese culture (Wan, 2012a). One of the reasons for objecting to casino development is that the negative emotions generated from gaming may cause tourist dissatisfaction against the destination. The results of this study may help counterbalance these misconceptions by providing are more carefully researched perspective for the government, policymakers, and investors.

5.4. Limitation and further studies

This study showed how to measure the factor-structure of negative emotions by using IAA, but this method still has its limitations such as only a small number of respondents were identified with a high grade to negative emotions. Therefore, the number of reward dummy for certain negative emotions would be less, especially for non-gaming tourists rating the negative emotions because they did not have high-level negative emotions.

This study only compared the emotions among gaming and non-gaming tourists. Since negative emotions for non-gaming tourists were shown to be low, the results of the comparison are quite significant. However, this study did not measure the differences in the changes in levels of emotions when tourists playing games. For example, tourists who play games over a short period (say < 4 h) versus those who play games for a long period of time (say > 4 h). So further studies are recommended to find the ideal time periods for playing games to optimize tourist satisfaction and minimize dissatisfaction.

Although this study identified the factor-structure of positive and negative emotions experienced in the destination casino resorts in Macau, these results may not be generalized for other destination cities since Chinese tourists are the major sources of tourists in Macau. Therefore, further studies are recommended to test the factor-structure of emotions in other tourist cities.

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Appendix

Table A1
Exploratory factor analysis (KMO = 0.917)

	1	2	3	4	5	6
Rage	**0.601**	−0.046	0.019	−0.045	0.452	−0.059
Suffer	**0.852**	−0.073	−0.038	0.060	0.090	−0.038
Grief	**0.867**	−0.051	−0.032	0.038	0.082	0.012
Sorrow	**0.844**	−0.095	−0.119	0.030	0.107	0.035
Pain	**0.835**	−0.059	−0.107	0.125	0.021	0.022
Fear	**0.796**	−0.080	0.109	−0.035	0.146	0.094
Vengeance	**0.789**	−0.035	−0.028	0.009	0.058	0.070
Apprehension	**0.746**	0.109	0.007	−0.033	0.018	0.061
Bluff	**0.728**	0.184	−0.064	−0.051	−0.044	0.035
Selfishness	**0.711**	−0.029	0.150	−0.011	0.043	0.014
Anxiety	**0.667**	−0.047	0.082	−0.091	0.421	0.069
Remorse	**0.666**	−0.051	0.115	−0.163	0.234	0.148
Anger	**0.666**	−0.136	0.012	−0.016	0.323	−0.024
Distress	**0.641**	−0.176	0.016	0.077	0.230	0.244
Prejudice	**0.593**	−0.066	0.267	−0.112	0.152	0.024
Thrill	**0.583**	0.048	0.338	−0.066	0.197	0.079
Fretfulness	**0.576**	−0.061	0.221	0.023	0.256	0.096
Jealousy	**0.574**	0.130	−0.029	−0.177	0.181	0.143
Entertained	−0.006	**0.778**	0.100	−0.072	−0.031	0.037
Comfortable	−0.108	**0.767**	0.015	0.148	−0.012	0.110
Pleasure	−0.086	**0.731**	0.255	0.160	−0.112	−0.015
Joy	−0.140	**0.710**	0.277	0.171	−0.071	0.138
Delight	−0.153	**0.671**	0.155	0.343	0.012	0.097
Enjoyment	0.071	**0.644**	0.053	0.344	0.013	0.184
Cheerful	−0.033	**0.641**	0.119	0.294	0.094	0.133
Advanced	0.065	**0.629**	0.183	0.039	−0.113	0.024
Enthusiasm	−0.022	**0.608**	0.342	0.320	0.121	0.151
Surprise	0.037	0.401	**0.653**	0.244	−0.069	0.076
Fascinated	0.059	0.363	**0.648**	0.188	−0.080	−0.024
Amazement	0.004	0.394	**0.632**	−0.066	0.066	0.191
Pride	0.125	0.243	**0.571**	0.268	0.073	0.237
Astonishment	0.101	0.425	**0.525**	0.236	0.197	0.257
Love	0.035	0.329	0.234	**0.727**	−0.075	0.135
Happiness	−0.134	0.412	0.113	**0.679**	−0.043	0.025
Romantic	0.048	0.316	0.205	**0.675**	0.009	0.044

(*continued on next page*)

Table A1 (*continued*)

	1	2	3	4	5	6
Tenderness	−0.169	0.376	−0.011	**0.532**	−0.142	0.095
Loss	0.262	0.038	0.009	−0.115	**0.680**	0.000
Fright	0.383	−0.117	−0.090	0.074	**0.670**	0.072
Hate	0.453	−0.230	−0.017	0.106	**0.592**	−0.023
Nervous	0.334	0.123	0.171	−0.157	**0.565**	−0.033
Caring	0.179	0.091	0.144	0.153	0.001	**0.748**
Concern	0.071	0.305	0.021	0.042	0.081	**0.670**
Warm-hearted	0.203	0.188	0.258	0.048	−0.097	**0.599**

Remark:
1. KMO - Kaiser-Meyer-Olkin.
2. Factor loadings greater than 0.5 are presented in boldface.

Table A2
The factor-structure of positive and negative emotions for gaming tourists

	Reward index	t-statistics	Penalty index	t-statistics	BIOS	SGP	DGP	IA	Factor category
Positive emotions									
Enthusiasm	0.401	4.614	0.005	0.039	0.406	0.988	0.012	0.975	Delighter
Astonishment	0.234	2.348	−0.033	0.290	0.267	0.876	0.124	0.753	Delighter
Amazement	0.338	3.904	0.052	0.437	0.390	0.867	0.133	0.733	Delighter
Pleasure	0.302	3.361	0.053	0.377	0.355	0.851	0.149	0.701	Delighter
Pride	0.109	0.926	−0.022	0.204	0.131	0.832	0.168	0.664	Delighter
Surprise	0.217	2.333	−0.057	0.472	0.274	0.792	0.208	0.584	Satisfier
Fascinated	0.293	2.827	0.120	1.039	0.413	0.709	0.291	0.419	Satisfier
Concern	0.290	3.556	0.122	0.971	0.412	0.704	0.296	0.408	Satisfier
Entertained	0.240	2.583	−0.103	0.732	0.343	0.700	0.300	0.399	Satisfier
Joy	0.309	3.923	−0.159	1.194	0.468	0.660	0.340	0.321	Satisfier
Cheerful	0.158	1.730	−0.099	0.768	0.257	0.615	0.385	0.230	Satisfier
Caring	0.155	1.272	0.099	0.777	0.254	0.610	0.390	0.220	Satisfier
Warm-hearted	0.330	3.659	0.238	2.145	0.568	0.581	0.419	0.162	Hybrid
Tenderness	0.275	2.761	−0.212	1.658	0.487	0.565	0.435	0.129	Hybrid
Advanced	0.216	2.621	−0.169	1.471	0.385	0.561	0.439	0.122	Hybrid
Delight	0.272	0.000	−0.249	0.000	0.521	0.522	0.478	0.044	Hybrid
Happiness	0.222	2.440	−0.266	2.129	0.488	0.455	0.545	−0.090	Hybrid
Enjoyment	0.126	1.208	−0.166	1.403	0.292	0.432	0.568	−0.137	Hybrid
Love	0.148	1.547	−0.198	1.844	0.346	0.428	0.572	−0.145	Hybrid
Comfortable	0.198	2.376	−0.322	2.728	0.520	0.381	0.619	−0.238	Dissatisfier
Romantic	0.106	1.093	−0.183	1.561	0.289	0.367	0.633	−0.266	Dissatisfier
Negative emotions									
Prejudice	−0.008	0.062	0.195	1.704	0.203	0.961	0.039	0.921	Delighter
Apprehension	0.019	0.118	0.173	1.576	0.192	0.901	0.099	0.802	Delighter
Distress	0.063	0.435	0.255	2.189	0.318	0.802	0.198	0.604	Delighter
Pain	0.073	0.454	0.247	1.859	0.320	0.772	0.228	0.544	Delighter
Hate	0.142	0.859	0.464	4.797	0.606	0.766	0.234	0.531	Delighter
Vengeance	0.086	0.549	0.267	1.722	0.353	0.756	0.244	0.513	Delighter
Thrill	0.030	0.208	0.091	0.625	0.121	0.752	0.248	0.504	Delighter
Grief	0.076	0.478	0.185	1.167	0.261	0.709	0.291	0.418	Delighter
Remorse	0.179	1.345	0.419	3.396	0.598	0.701	0.299	0.401	Delighter
Sorrow	0.105	0.701	0.231	1.726	0.336	0.688	0.313	0.375	Satisfier
Fretfulness	0.148	1.258	0.313	2.658	0.461	0.679	0.321	0.358	Satisfier
Fear	0.124	1.071	0.236	1.928	0.360	0.656	0.344	0.311	Satisfier
Suffer	0.259	1.633	0.470	4.119	0.729	0.645	0.355	0.289	Satisfier
Bluff	0.106	0.837	0.169	1.436	0.275	0.615	0.385	0.229	Satisfier
Rage	−0.120	0.822	0.190	1.962	0.310	0.613	0.387	0.226	Satisfier
Anxiety	0.191	1.330	0.285	2.169	0.476	0.599	0.401	0.197	Hybrid
Fright	0.176	1.242	0.254	2.058	0.430	0.591	0.409	0.181	Hybrid
Anger	0.211	1.701	0.302	2.206	0.513	0.589	0.411	0.177	Hybrid
Loss	0.148	1.534	−0.198	1.914	0.346	0.572	0.428	0.145	Hybrid
Jealousy	0.246	1.931	0.312	2.451	0.558	0.559	0.441	0.118	Hybrid
Nervous	0.134	0.984	0.159	1.139	0.293	0.543	0.457	0.085	Hybrid
Selfishness	−0.124	0.891	0.024	0.181	0.148	0.162	0.838	−0.676	Frustrator

Table A3
The factor-structure of positive and negative emotions for non-gaming tourists

	Reward index	t-statistics	Penalty index	t-statistics	BIOS	SGP	DGP	IA	Factor category
Positive emotions									
Amazement	0.120	1.280	−0.019	0.198	0.139	0.863	0.137	0.727	Delighter
Concern	0.193	2.297	0.043	0.474	0.236	0.818	0.182	0.636	Delighter
Joy	0.333	4.635	−0.124	1.296	0.457	0.729	0.271	0.457	Satisfier
Enthusiasm	0.185	2.329	−0.076	0.815	0.261	0.709	0.291	0.418	Satisfier
Comfortable	0.274	0.000	−0.115	0.000	0.389	0.704	0.296	0.409	Satisfier
Tenderness	0.472	0.000	−0.220	0.000	0.692	0.682	0.318	0.364	Satisfier
Caring	0.109	1.182	−0.052	0.583	0.161	0.677	0.323	0.354	Satisfier
Happiness	0.370	5.199	−0.202	2.708	0.572	0.647	0.353	0.294	Satisfier
Fascinated	0.258	3.451	−0.148	1.488	0.406	0.635	0.365	0.271	Satisfier
Surprise	0.258	3.237	−0.178	2.139	0.436	0.592	0.408	0.183	Hybrid
Delight	0.198	2.476	−0.147	2.238	0.345	0.574	0.426	0.148	Hybrid
Romantic	0.164	1.928	−0.122	1.337	0.286	0.573	0.427	0.147	Hybrid
Pleasure	0.172	2.179	−0.133	1.343	0.305	0.564	0.436	0.128	Hybrid
Enjoyment	0.161	1.988	−0.128	1.323	0.289	0.557	0.443	0.114	Hybrid
Cheerful	0.129	1.635	−0.118	1.078	0.247	0.522	0.478	0.045	Hybrid
Advanced	0.116	1.379	−0.145	1.814	0.261	0.444	0.556	−0.111	Hybrid
Pride	0.102	1.259	−0.134	1.511	0.236	0.432	0.568	−0.136	Hybrid
Love	0.137	1.751	−0.190	1.982	0.327	0.419	0.581	−0.162	Hybrid
Warm-hearted	0.065	0.743	−0.109	1.313	0.174	0.374	0.626	−0.253	Dissatisfier
Astonishment	0.054	0.608	−0.119	1.168	0.173	0.312	0.688	−0.376	Dissatisfier
Entertained	0.014	0.152	−0.225	2.963	0.239	0.059	0.941	−0.883	Frustrator
Negative emotions									
Rage	0.000	0.003	0.310	2.812	0.310	1.000	0.000	1.000	Delighter
Prejudice	−0.034	0.351	0.226	2.494	0.260	0.869	0.131	0.738	Delighter
Apprehension	0.082	0.820	0.202	2.074	0.284	0.711	0.289	0.423	Delighter
Loss	0.137	1.698	−0.190	2.089	0.327	0.581	0.419	0.162	Hybrid
Hate	−0.197	2.222	0.252	3.196	0.449	0.561	0.439	0.122	Hybrid
Anger	−0.154	1.412	0.177	1.669	0.331	0.535	0.465	0.069	Hybrid
Fretfulness	−0.116	1.179	0.121	1.333	0.237	0.511	0.489	0.021	Hybrid
Fright	−0.226	2.340	0.175	2.134	0.401	0.436	0.564	−0.127	Hybrid
Distress	−0.193	2.124	0.130	1.319	0.323	0.402	0.598	−0.195	Hybrid
Sorrow	−0.182	1.529	0.119	1.056	0.301	0.395	0.605	−0.209	Dissatisfier
Bluff	−0.094	0.837	0.051	0.478	0.145	0.352	0.648	−0.297	Dissatisfier
Suffer	−0.223	2.131	0.096	0.901	0.319	0.301	0.699	−0.398	Dissatisfier
Remorse	−0.246	2.751	0.100	1.072	0.346	0.289	0.711	−0.422	Dissatisfier
Pain	−0.231	2.360	0.093	0.947	0.324	0.287	0.713	−0.426	Dissatisfier
Fear	−0.385	4.181	−0.134	1.783	0.519	0.258	0.742	−0.484	Dissatisfier
Jealousy	−0.252	2.931	−0.047	0.594	0.299	0.157	0.843	−0.686	Frustrator
Vengeance	−0.272	3.161	0.044	0.417	0.316	0.139	0.861	−0.722	Frustrator
Thrill	−0.060	0.497	0.009	0.077	0.069	0.130	0.870	−0.739	Frustrator
Selfishness	−0.264	2.510	−0.036	0.369	0.300	0.120	0.880	−0.760	Frustrator
Grief	−0.305	2.485	0.040	0.302	0.345	0.116	0.884	−0.768	Frustrator
Anxiety	−0.325	3.891	0.032	0.406	0.357	0.090	0.910	−0.821	Frustrator
Nervous	−0.202	1.831	−0.001	0.007	0.203	0.005	0.995	−0.990	Frustrator

Appendix A. Supplementary data

Supplementary data to this article can be found online at https://doi.org/10.1016/j.jdmm.2019.05.008.

References

Alegre, J., & Garau, J. (2010). Tourist satisfaction and dissatisfaction. *Annals of Tourism Research, 37*(1), 52–73.

Alegre, J., & Garau, J. (2011). The factor structure of tourist satisfaction at sun and sand destinations. *Journal of Travel Research, 50*(1), 78–86.

Ali, F., Amin, M., & Ryu, K. (2016). The role of physical environment, price perceptions, and consumption emotions in developing customer satisfaction in Chinese resort hotels. *Journal of Quality Assurance in Hospitality & Tourism, 17*(1), 45–70.

Anderson, E. W., & Mittal, V. (2000). Strengthening the satisfaction-profit chain. *Journal of Service Research, 3*(2), 107–120.

Back, K. J. (2012). Impact-range performance analysis and asymmetry analysis for improving quality of Korean food attributes. *International Journal of Hospitality Management, 31*(2), 535–543.

Barrett, L. F. (2006). Are emotions natural kinds? *Perspectives on Psychological Science, 1*(1), 28–58.

Barsky, J. D., & Nash, L. (2002). Evoking emotion: Affective keys to hotel loyalty. *Cornell Hotel and Restaurant Administration Quarterly, 43*(1), 39–46.

Beeho, A. J., & Prentice, R. C. (1997). Conceptualizing the experiences of heritage tourists: A case study of New Lanark World Heritage Village. *Tourism Management, 18*(2), 75–87.

Bonnefoy-Claudet, L., & Ghantous, N. (2013). Emotions' impact on tourists' satisfaction with ski resorts: The mediating role of perceived value. *Journal of Travel & Tourism Marketing, 30*(6), 624–637.

Brandt, R. D. (1987). A procedure for identifying value-enhancing service components using customer satisfaction survey data. In C. Suprenant (Ed.). *Add value to your service* (pp. 61–65). Chicago, IL: American Marketing Association.

Busacca, B., & Padula, G. (2005). Understanding the relationship between attribute performance and overall satisfaction: Theory, measurement and implications. *Marketing Intelligence & Planning, 23*(6), 543–561.

Bussu, A., & Detotto, C. (2013). The effect of socio-economic and emotional factors on gambling behaviour. *Working paper CRENoS* Contributi Di Ricerca Crenos.

Chang, S., van Witteloostuijn, A., & Eden, L. (2010). From the editors: Common method variance in international business research. *Journal of International Business Studies, 41*(2), 178–184.

Chhetri, P., Arrowsmith, C., & Jackson, M. (2004). Determining hiking experiences in nature-based tourist destinations. *Tourism Management, 25*(1), 31–43.

Eadington, W. R. (1999). The spread of casinos and their role in tourism development. In D. C. Pearce, & R. W. Butler (Eds.). *Contemporary issues in tourism development* (pp. 127–142). London: Routledge Kegan Paul.

Faullant, R., Matzler, K., & Mooradian, T. A. (2011). Personality, basic emotions, and satisfaction: Primary emotions in the mountaineering experience. *Tourism Management, 32*(6), 1423–1430.

Füller, J., & Matzler, K. (2008). Customer delight and market segmentation: An application of the three-factor theory of customer satisfaction on life style groups. *Tourism*

Management, 29(1), 116–126.
Gao, B. W., & Lai, I. K. W. (2015). The effects of transaction-specific satisfactions and integrated satisfaction on customer loyalty. *International Journal of Hospitality Management, 44*(1), 38–47.
Griffiths, M. (2007). Gambling psychology: Motivation, emotion and control. *Casino & Gaming International, 3*(4), 71–76.
Hair, J. F., Jr., Black, W. C., Babin, B. J., & Anderson, R. E. (2010). *Multivariate data analysis* (7th ed.). Englewood Cliffs, NJ: Prentice-Hall Inc.
Hair, J. F., Jr., Ringle, C. M., & Sarstedt, M. (2011). PLS-SEM: Indeed a silver bullet. *Journal of Marketing Theory and Practice, 19*(2), 139–151.
Han, H., & Back, K. J. (2007a). Investigating the effects of consumption emotions on customer satisfaction and repeat visit intentions in the lodging industry. *Journal of Hospitality & Leisure Marketing, 15*(3), 5–30.
Han, H., & Back, K. J. (2007b). Assessing customers emotional experiences influencing their satisfaction in the lodging industry. *Journal of Travel & Tourism Marketing, 23*(1), 43–56.
Han, H., Back, K. J., & Barrett, B. (2010). A consumption emotion measurement development: A full-service restaurant setting. *Service Industries Journal, 30*(2), 299–320.
Holbrook, M. B., Chestnut, R. W., Oliva, T. A., & Greenleaf, E. A. (1984). Play as a consumption experience: The roles of emotions, performance, and personality in the enjoyment of games. *Journal of Consumer Research, 11*(2), 728–739.
Holbrook, M. B., & Westwood, R. A. (1989). The role of emotion in advertising revisited: Testing a typology of emotional responses. In P. Cafferata, & A. M. Tybout (Eds.). *Cognitive and affective responses to advertising* (pp. 353–371). Lanham, MD: Lexington Books.
Hosany, S., & Gilbert, D. (2010). Measuring tourists' emotional experiences toward hedonic holiday destination. *Journal of Travel Research, 49*(4), 513–526.
Io, M. U. (2016). Exploring the impact of hedonic activities on casino-hotel visitors' positive emotions and satisfaction. *Journal of Hospitality and Tourism Management, 26*, 27–35.
Izard, C. E. (1972). *Patterns of emotions.* New York, NY: Plenum Press.
Izard, C. E. (1977). *Human emotions.* New York, NY: Plenum Press.
Jackson, S. L. (2015). *Research methods: A modular approach* (3rd ed.). Belmont, CA: Cengage Learning.
Jang, S., & Namkung, Y. (2009). Perceived quality, emotions, and behavioral intentions: Application of an extended Mehrabian-Russell model to restaurants. *Journal of Business Research, 62*(4), 451–460.
Kano, N. (1984). Attractive quality and must be quality. *The Journal of Japanese Society for Quality Control, 14*(2), 147–156.
Ladhari, R. (2009). Service quality, emotional satisfaction, and behavioural intentions: A study in the hotel industry. *Managing Service Quality, 19*(3), 308–331.
Lai, I. K. W., & Hitchcock, M. (2015). Importance-performance analysis in tourism: A framework for researchers. *Tourism Management, 48*, 242–267.
Lai, I. K. W., & Hitchcock, M. (2016). A comparison of service quality attributes for stand-alone and resort-based luxury hotels in Macau: 3-Dimensional importance-performance analysis. *Tourism Management, 55*, 139–159.
Lai, I. K. W., & Hitchcock, M. (2017). Sources of satisfaction with luxury hotels for new, repeat, and frequent travelers: A PLS impact-asymmetry analysis. *Tourism Management, 60*, 107–129.
Lee, J. J., & Kyle, G. T. (2013). The measurement of emotions elicited within festival contexts: A psychometric test of a festival consumption emotions (FCE) scale. *Tourism Analysis, 18*(6), 635–649.
Lee, J. S., & Min, C. (2013). Prioritizing convention quality attributes from the perspective of three-factor theory: The case of academic association convention. *International Journal of Hospitality Management, 35*, 282–293.
Lichtenstein, S., & Slovic, P. (2006). *The construction of preference.* Cambridge: Cambridge University Press.
Lowry, P. B., & Gaskin, J. (2014). Partial least squares (PLS) structural equation modeling (SEM) for building and testing behavioral causal theory: When to choose it and how to use it. *IEEE Transactions on Professional Communications, 57*(2), 123–146.
Lo, A. S., & Wu, C. (2014). Effect of consumption emotion on hotel and resort spa experience. *Journal of Travel & Tourism Marketing, 31*(8), 958–984.
Macao Tourism Data plus (2017). *Top ten visitor source markets 2016, Macao Tourism Data plus.* Retrieved 29.09.17. from: http://dataplus.macaotourism.gov.mo/Indicator/VisitorsInPlace/Top10Map?lang=E.
MacDonlad, A., & Eadington, W. R. (2008). *The case for integrated resort development.* Retrieved 29.09.17. from: http://creba.ph/images/propertyindustrydatasearch/pidsfile/2009/Mcdonald-Eadington-Integrated-Resorts.pdf.
Mano, H., & Oliver, R. L. (1993). Assessing the dimensionality and structure of the consumption experience: Evaluation, feeling, and satisfaction. *Journal of Consumer Research, 20*(3), 451–466.
Matzler, K., & Sauerwein, E. (2002). The factor structure of customer satisfaction: An empirical test of the importance grid and the penalty-reward-contrast analysis. *International Journal of Service Industry Management, 13*(4), 314–332.
McCartney, G. (2017). Betting on casino tourism resilience: A case study of casino expansion in Macao and the Asia region. In R. W. Bulter (Ed.). *Tourism and resilience* (pp. 195–205). Wallingford: CABI.
Mehrabian, A., & Russell, J. A. (1974). *An approach to environmental psychology.* Cambridge: MIT Press.
Mikulic, J., Kresic, D., & Kozic, I. (2015). Critical factors of the maritime yachting tourism experience: An impact-asymmetry analysis of principal components. *Journal of Travel & Tourism Marketing, 32*(sup1), S30–S40.
Mikulic, J., Kresic, D., Milicevic, K., Seric, M., & Curkovic, B. (2016). Destination attractiveness drivers among urban hostel tourists: An analysis of frustrators and delighters. *International Journal of Tourism Research, 18*(1), 74–81.
Mikulic, J., & Prebezac, D. (2008). Prioritizing improvement of service attributes using impact range-performance analysis and impact-asymmetry analysis. *Managing Service Quality, 18*(6), 559–576.
Mikulić, J., & Prebežac, D. (2011). Evaluating hotel animation programs at Mediterranean sun-and-sea resorts: An impact-asymmetry analysis. *Tourism Management, 32*(3), 688–696.
Mikulic, J., & Prebezac, D. (2016). The Kano model in tourism research: A critical note. *Annals of Tourism Research, 61*, 25–27.
Milman, A., & Tasci, A. D. A. (2018). Exploring the experiential and sociodemographic drivers of satisfaction and loyalty in the theme park context. *Journal of Destination Marketing & Management, 8*, 385–395.
Mooradian, T. A., & Olver, J. M. (1997). I can't get no satisfaction: The impact of personality and emotion on postpurchase processes. *Psychology and Marketing, 14*(4), 379–393.
Moser, C. A., & Kalton, G. (1971). *Survey methods in social investigation.* London: Heinemann.
Nyer, P. U. (1997). A study of the relationships between cognitive appraisals and consumption emotions. *Journal of the Academy of Marketing Science, 25*(4), 296–304.
Oliver, R. L. (1992). An investigation of the attribute basis of emotion and related affects in consumption. *Advances in Consumer Research, 19*(2), 237–244.
Oliver, R. L. (1993). Cognitive, affective, and attribute bases of the satisfaction response. *Journal of Consumer Research, 20*(3), 418–430.
Oliver, R. L. (1994). Conceptual issues in the structural analysis of consumption emotion, satisfaction, and quality: Evidence in a service setting. *Advances in Consumer Research, 21*(1), 16–22.
Ou, Y. C., & Verhoef, P. C. (2017). The impact of positive and negative emotions on loyalty intentions and their interactions with customer equity drivers. *Journal of Business Research, 80*, 106–115.
Plutchik, R. (1962). *The emotions: Facts, theories, and a new model.* New York, NY: Random House.
Plutchik, R. (1980). *Emotion: A psychoevolutionary synthesis.* New York, NY: Harper and Row.
Plutchik, R., & Kellerman, H. (1974). *Emotions profile index manual.* Los Angeles, CA: Western Psychological Services.
Prasad, B., & Whitney, C. (2005). *Stop gambling for good: Overcome reckless risk taking with Dr. Prasad's proven program.* New York, NY: Avery Trade.
Prayag, G., Hosany, S., & Odeh, K. (2013). The role of tourists' emotional experiences and satisfaction in understanding behavioral intentions. *Journal of Destination Marketing & Management, 2*(2), 118–127.
Richins, M. L. (1997). Measuring emotions in the consumption experience. *Journal of Consumer Research, 24*(2), 127–146.
Ringle, C. M., Wende, S., & Becker, J. M. (2015). *SmartPLS 3. Boenningstedt: SmartPLS GmbH.* http://www.smartpls.com Retrieved 29.09.17. from.
Schachter, S., & Singer, J. E. (1962). Cognitive, social and physiological determinants of the emotional state. *Psychological Review, 69*(5), 379–399.
Song, J., & Qu, H. (2017). The mediating role of consumption emotions. *International Journal of Hospitality Management, 66*, 66–76.
St-Pierre, R. A., Temcheff, C. E., Gupta, R., Derevensky, J., & Paskus, T. S. (2014). Predicting gambling problems from gambling outcome expectancies in college student-athletes. *Journal of Gambling Studies, 30*(1), 47–60.
Tomkins, S. S. (1962). *Affect imagery consciousness: The positive affects., Vol. 1.* New York, NY: Springer.
Tversky, A., & Thaler, R. H. (1990). Anomalies: Preference reversals. *The Journal of Economic Perspectives, 4*(2), 201–211.
Vavra, T. G. (1997). *Improving your measurement of customer satisfaction.* Milwaukee, WI: ASQ Quality Press.
Wan, W. (2012a). *Capturing the Chinese outbound tourism market: Lessons for Las Vegas casino operators, UNLV theses, Dissertations, professional Papers, and Capstones. 1484.* Retrieved 29.09.17. from https://digitalscholarship.unlv.edu/thesesdissertations/1484.
Wan, Y. K. P. (2012b). Increasing Chinese tourist gamblers in Macao: Crucial player characteristics to identify and exploit. *UNLV Gaming Research and Review Journal, 15*(1), 51–70.
Watson, D. L., Clark, L. A., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect: The PANAS scales. *Journal of Personality and Social Psychology, 54*(6), 1063–1070.
Westbrook, R. A. (1987). Product/Consumption-based affective responses and post-purchase processes. *Journal of Marketing Research, 24*(3), 258–270.
Westbrook, R. A., & Oliver, R. L. (1991). The dimensionality of consumption emotion patterns and customer satisfaction. *Journal of Consumer Research, 18*(1), 84–91.
White, C. J. (2010). The impact of emotions on service quality, satisfaction, and positive word-of-mouth intentions over time. *Journal of Marketing Management, 26*(5–6), 381–394.
Wong, I. A., & Rosenbaum, M. S. (2010). Beyond hardcore gambling: Understanding why mainland Chinese visit casinos in Macau. *Journal of Hospitality & Tourism Research, 36*(1), 32–51.
Wu, S. T., & Chen, Y. S. (2015). The social, economic, and environmental impacts of casino gambling on the residents of Macau and Singapore. *Tourism Management, 48*, 285–298.
Ye, B. H., Fu, H., & Law, R. (2016). Use of impact-range performance and asymmetry analyses to improve OTA website quality. *Journal of Hospitality and Tourism Management, 26*, 9–17.
Zins, A. (2002). Consumption emotions, experience quality and satisfaction. *Journal of Travel & Tourism Marketing, 72*(2/3), 3–18.