EI SEVIER

Contents lists available at ScienceDirect

Tourism Management

journal homepage: www.elsevier.com/locate/tourman



Drug tourism motivation of Chinese outbound tourists: Scale development and validation



Jun Wen ^a, Fang Meng ^b, Tianyu Ying ^{c, *}, Hongxia Qi ^d, Tim Lockyer ^e

- ^a Department of Marketing (Tourism), Waikato Management School, University of Waikato, Hamilton, New Zealand
- ^b School of Hotel, Restaurant, and Tourism Management, University of South Carolina, Columbia, SC 29208, United States
- ^c Department of Tourism and Hotel Management, School of Management, Zhejiang University, Hangzhou, Zhejiang, 310058, PR China
- ^d School of Management, Victoria University of Wellington, Wellington, New Zealand
- ^e Dept of Marketing, Waikato Management School, The University of Waikato, Hamilton 3240, New Zealand

HIGHLIGHTS

- Chinese tourists visiting Amsterdam for commercial cannabis were investigated.
- A scale was developed to measure Chinese tourists' motivations for drug tourism.
- 10 interviews and 2 surveys were conducted to construct and validate the scale.
- 6 dimensions of drug tourism motivation were identified and discussed.

ARTICLE INFO

Article history: Received 3 March 2017 Received in revised form 20 May 2017 Accepted 1 August 2017

Keywords:
Drug tourism
Motivation
Commercial cannabis consumption
Measurement scale development
Chinese outbound tourists

ABSTRACT

Drug-taking behaviours have been extensively studied in psychology, behavioural science and health studies, yet, limited effort has been invested in understanding the factors that motivate tourists to engage in drug tourism. Given the increasing numbers of tourists who are exposed to commercially available cannabis in overseas destinations, developing a measurement scale for their motivation offers an effective tool to understand drug tourists more comprehensively. Using samples of Chinese outbound tourists who travelled to Amsterdam for consuming commercial cannabis, this study adopted a mixed methods approach and collected two rounds of quantitative data for scale development and empirical test. The results suggested a six-factor motivation scale: spiritual and emotional healing; social prestige; relaxation and escape; cannabis authenticity; commercial cannabis availability; and, cannabis experimentation. The resulting measurement scale demonstrated accepted reliability and validity. Findings further indicated that commercial cannabis availability is the strongest motivation for predicting drug tourists' future behavioural intention.

© 2017 Elsevier Ltd. All rights reserved.

1. Introduction

Drug tourism is not a new phenomenon and it has been examined from different social and psychological perspectives. Most researchers to date have portrayed drug tourism as *deviant* or *marginal* tourist behaviour, a western lifestyle highlighted in developed countries (Bandyopadhyay, 2013; Uriely & Belhassen, 2006). Studies on drug issues in the tourism context have

E-mail addresses: wenjun_513@hotmail.com (J. Wen), fmeng@hrsm.sc.edu (F. Meng), yingtianyu@zju.edu.cn (T. Ying), Hongxia.Qi@vuw.ac.nz (H. Qi), tim. lockyer@waikato.ac.nz (T. Lockyer).

addressed a variety of topics including certain destinations attracting foreign travellers (e.g., Korf, 2002) and tourist motivations (e.g., Sellars, 1998). At the same time, prior studies (e.g., Prayag, Mura, Hall, & Fontaine, 2015) suggest that the existing definitions are too general and that different groups of tourists such as drug tourists and spiritual tourists exist in terms of their motivations and self-perceptions. It appears, however, that, due to the sensitiveness of this topic and the difficulty of collecting quantitative data, this body of literature is still mostly descriptive and based on qualitative methodologies.

Motivation is stressed as an important precondition for behavioural intention in the tourism field. Tourists may undertake some risky or adventurous behaviours as they perceive tourism as being

^{*} Corresponding author.

away-from-routine, less restrained, and thrill-seeking. Drug use in the tourism context is perceived as less threatening, although it still involves legal, social, and medical risks (Uriely & Belhassen, 2005). Regarding the motivation of drug use in tourism, prior literature mainly focuses on specific destinations such as the Amazon (De Rios, 1994), or occasions such as students on spring break (Josiam, Hobson, Dietrich, & Smeaton, 1998). The extant drug tourism motivation studies mainly use qualitative methods including observations and in-depth interviews, while a standardised measurement for drug tourism motivations has largely been overlooked. This lack of a specific measurement scale for drug tourism motivation leaves a crucial knowledge gap, and opens up the opportunity for a meaningful and much-needed investigation to examine the intention and behaviour of drug tourists in a more generalizable setting. Furthermore, most, if not all, of the current drug tourism studies focus on western perspectives only, and lack a conceptualised and systematic investigation to advance our understanding of drug tourism in a more global setting. Despite the fact that the outbound tourist flow from the emerging Asian markets has been booming in the past two decades; and particularly China has now become one of the largest tourist-generating countries in the world (UNWTO, 2017), it is unclear if there are Chinese outbound tourists travelling overseas for drug consumption, and, if they do, why they do so.

The primary purpose of this research is, therefore, to develop a measurement scale on drug tourism motivations. Due to the scarce literature in this area with quantitative approach, this study is exploratory in nature, and attempts to contribute to an understanding of the underlying motives that lead tourists to take drugs during travel through an examination of what they seek from this particular behaviour. In the meantime, the study aims to test a drug tourism motivation model using Chinese outbound tourists as the subjects. At the outset, it should be noted that it is not the intent of this study to engage in a debate regarding the tourists' varied levels of focus on drug use during their travel. This study responds to the call for a better understanding of the motivations of individuals who travel for drug consumption (e.g., Belhassen, Santos, & Uriely, 2007; Korf, 2002). In the context of commercial drug tourism destinations such as Amsterdam, the major soft drug tolerated by local government for tourists' consummation in licensed coffee shops is cannabis. We, therefore, chose to examine drug tourists' cannabis-taking motivations and related behaviours because cannabis-taking motives have received little attention in the extant literature.

The subsequent sections of this article are organized as follows: The literature section summarizes the extant literature on motivations for drug taking, drug and tourism, and drug and culture. Following Churchill's (1979) recommendations, the method section presents the processes and results of the major steps involved in developing and validating a drug tourism motivation measurement scale. Discussion and conclusions of this study are finally provided, followed by a discussion of the limitations of this study and directions for future research.

2. Literature review

2.1. Motivations for drug taking

Drug use motivation has been a popular topic in social and psychology research in the past few decades. Although researchers have tried to explore the reasons for drug use (e.g., Comeau, Stewart, & Loba, 2001; Bachman, Wadsworth, O'Malley, Johnston, & Schulenberg, 2013; Pomazal & Brown, 1977; Simons, Correia, & Carey, 2000; Simons, Correia, Carey, & Borsari, 1998, 2005), no clear consensus has been reached. The fields of psychology and

sociology have posited drug-taking from multiple perspectives to account for the intentions to consume drugs (Baker, Piper, McCarthy, Majeskie, & Fiore, 2004; Dakwar, Levin, Foltin, Nunes, & Hart, 2014; Pomazal & Brown, 1977). Scholars have reported that drug use tends to be associated with psychological factors such as anxiety, curiosity, and loneliness, but due to the complexity of the phenomenon, few research appears to provide an adequately comprehensive interpretation for why people use drugs. Studies have reported a wide array of factors related to drug use, suggesting that drug use motivations could be grouped into particular categories including: escapism, seeking personal identity, feeling high, rebelling against authority, relaxation, socialising, drug-related expectations, curiosity, individual willingness, and intrinsic and extrinsic rewards (e.g., Boys, Marsden, & Strang, 2001; Goode, 1970; Jurich & Polson, 1984; Roshanfekr, Noori, Dejman, Geshnigani, & Raffey, 2015). However, as yet, there has been neither systematic examination of drug-taking motivation nor measurement scale development in the tourism setting.

Recent studies focusing on young people and women have identified their motives for drug use (e.g., Roshanfekr et al., 2015; Shek, 2007; Wu et al., 2014). These studies suggested that drugtaking behaviour has its own group characteristics and was influenced by gender, age, and the normal social parameters. For example, taking youths in Hong Kong as a case, Shek (2007) emphasised the roles of curiosity and undesirable peer influence among adolescents using drugs. Examining Asian drug users in the U.S., Nemoto et al. (1999) further validated the idea that the patterns of drug use were unique to the users' ethnicity, gender, immigrant status, age groups, and cultural constructs. This body of literature has seen drug use as a predominantly abnormal behaviour, with the notable exception of studies such as Riemer (1981), which looked at drug-taking from the perspectives of recreation or leisure, and suggested viewing cannabis as a recreational drug. Despite the vast amount of attention that scholars have paid to drug use motivations as discussed above, little effort has been expended on investigating drug-taking motivations in the context of travel, where motivations could arguably be distinctively different from the general or habitual drug-use motives identified in the extant literature.

2.2. Drugs and tourism

According to Valdez and Sifaneck (1997, p. 880), drug tourism is "the phenomenon by which persons become attracted to a particular location because of the accessibility of licit or illicit drugs and related services." Drug tourism usually refers to a noninstitutionalised form of tourism (Belhassen et al., 2007). Nevertheless, other scholars have claimed that drug tourism definitions should take the multiactivity nature of tourism into consideration, and posited that this type of tourism also includes tourists who refer to "their drug taking merely as a by-product of their travel experience and tourists who become aware of the accessibility of drugs only during their stay in a particular destination" (Uriely & Belhassen, 2005, p. 244). Generally, the existing literature on drugs and tourism does not distinguish between tourists with diverse drug-driving motives. Nevertheless, the phenomenon of drug use in the context of tourism often falls within the area of marginal tourism (Uriely & Belhassen, 2005). In the current study, drug tourists are defined as those who see drug consumption as one of the major motivations for travelling, i.e., they can be seen as drug-oriented tourists.

Many countries like the Netherlands, Australia, and Brazil have gradually established the image of a drug culture and attracted tourists from all over the world (e.g., Kjellgren, Eriksson, & Norlander, 2009). The popularity of drug use in contemporary

society has been accompanied by a growing body of literature focused on understanding tourists' drug-taking experience during their vacation (e.g., Josiam et al., 1998), as well as drug culture at destinations (e.g., Buultjens, Neale, & Lamont, 2013). Drug use in the context of travel has been a key issue in the tourism literature since the early 1970s. With regard to the Netherlands specifically, several studies have explored the phenomenon of foreign tourists attracted by the country's liberal policies (e.g., Korf, 1995, 2002; Van den Brink, 1996). Uriely and Belhassen (2006, p. 340) explained tourists' drug-using behaviour as voluntary risk-taking with the notion of a "license for thrill", which provided a new perspective on this phenomenon.

The existing drug tourism literature provides a cognitive appraisal explanation of why tourists consume drugs during their travels. In their investigation, Kjellgren et al. (2009) identified seeking knowledge, exploring the inner and outer worlds, desires for healing, and desires for personal development as drug tourists' motives. In their investigation into the social forces that shape tourists' motivations to consume cannabis during vacation, Belhassen et al. (2007) proposed four groups of motivations: experimentation, pleasure and diversion-seeking, the quest for authenticity, and accessible purchasing. Notably, besides identifying fun and recreation seekers, searching for authentic personal experience, which was depicted as "staged authenticity," was also illustrated in de Rios's (1994) study. However, it is important to note that, to the best of the authors' knowledge, all of the extant studies on tourists' drug consumption motives have used qualitative methods with small numbers of participants, and no research has empirical tested the validity of the motives through quantitative investigation with a large sample. Given the plethora of activities and characteristics of drug users, this group of tourists are believed to have many diverse motives and needs. A better understanding of their motivations is essential for tourism destinations and tourism industries if they are to manage their long-term development.

2.3. Drugs and cultural context

In terms of research into drugs and culture, a dominant perspective sees cultural change such as weakened ethnic and cultural identify and lower levels of ethnic pride as a factor that influences individuals' drug use (Felix-Ortiz, Fernandez, & Newcomb, 1998; Vega et al., 2002; Warner et al., 2006). Most of the extant research focuses on drug use in Britain, Europe, the U.S. and other advanced "western" societies such as Australia and Canada; however, little attention has been paid to the drug use in non-western societies (Coomber & South, 2004). There is a lack of research on drug use in an Asian, and particularly Chinese setting, and investigating drug use motivation in the travel or vacation setting has largely been overlooked.

With the number of Chinese outbound travellers reaching 135 million in 2016, a 6% increase from 2015, China has been the world's largest outbound tourism source market since 2012 (UNWTO, 2017). Given the enormous potential of this market, there has been a growing interest in researching outbound Chinese tourists (e.g., Lai, Li, & Harrill, 2013; Sparks & Pan, 2009; Wu & Pearce, 2014). Along with the ever growing diversity in Chinese outbound tourists' market demands and interest, it is of great value to explore the Chinese tourists' drug use motivation when travelling overseas. China's collectivist culture influences people's behaviour. People' motivations to act are primarily shaped by their perceptions of how other people perceive their behaviours (Hsu, Cai, & Wong, 2007). More importantly, wealth and material possessions, along with access to publically unavailable resources and lifestyles, are essential as a means to recognise and differentiate

people's social status. Drug use during overseas travel can be influenced by multiple factors. Amongst these are the cultural differences in drug use in a tourist's home country and the destination which may induce behaviours that depart from a tourist's "normal" behaviours.

The Netherlands provides a unique cultural setting to investigate cannabis use and cannabis outlets (Dutch 'coffee shops') that offer a real-life setting where individuals can buy and use cannabis. Amsterdam has long been known for its accessibility in commercial drugs and sex, making it one of the world's few drug tourism destinations. The Dutch have generally tolerant attitudes toward drugs, although coffee shops are subject to certain policies (Van Ooyen-Houben, Bieleman & Korf, 2016). Amsterdam's coffee shops (not to be confused with cafés) have been a part of the city since the 1970s and the city has 200 coffee shops. While it is legal and common that people can buy soft drugs (e.g., weed, magic truffles, and salvia) from coffee shops in Amsterdam, as in other countries, hard drugs like cocaine and heroin are forbidden in the Netherlands. The Amsterdam Tourism and Convention Board advises tourists to go to coffee shops to buy weed and makes these shops easy to identify. According to the BBC News (1 November 2012), each year approximately 1.5 million tourists visit Amsterdam to consume cannabis. In order to keep and increase tourist arrivals, the Mayor of Amsterdam claimed that drug-oriented tourism does not have any obviously negative influence on the city but, rather, that it promoted the local economy' development.

Contrasting with Amsterdam, drugs are generally demonised in China, despite the country's long history with drugs and drugtaking. The illegal trafficking of opium from British India to China in the 1760s led to the prevalence of drug-taking all over China, which resulted in a series of social problems (Fang, Wang, Shi, Liu, & Lu, 2006; Lowinger, 1977). When the People's Republic of China was established in 1949, the new Chinese government clamped down heavily on drugs and took a series of steps to control drug abuse. Strict laws stipulate citizens found taking drugs can be detained for up to 15 days and sent to rehabilitation centres. The Chinese National Narcotics Control Commission (NNCC), together with other government organisations, promotes the nation's antidrug acts (Lu, Fang, & Wang, 2008). The general public has been educated to keep away from any kind of drugs. However, as the Chinese outbound tourism market continues to expand, it is inevitable that more and more Chinese tourist will have the chance to be exposed to drugs when they travel overseas, especially to those destinations (e.g., Amsterdam, the Netherlands) where some drugs are legally and commercially available. It remains unknown if there exists a Chinese outbound tourist segment that travels for drug consumption; and what roles drug consumption plays in their decision-making and travel experiences. Thus, identifying why Chinese tourists decide to consume drugs when travelling overseas is of considerable theoretical and practical importance.

3. Methods

Churchill (1979) recommends four major steps when designing scale development procedures; these have been widely employed by previous studies (e.g. DeVellis, 2003; Hung & Petrick, 2010; Kim & Eves, 2012; Netemeyer, Bearden, & Sharma, 2003; Yi & Gong, 2013). These steps include: (1) initial item generation; (2) item purification; (3) measurement scale dimensionality determination; and, (4) measurement scale reliability assessment and construct validation. The research design of this study consisted of the same four phases as in line with Churchill's (1979) approach.

3.1. Initial item generation

This research generated its initial item pool in two stages. The first stage involved conducting an extensive literature review to identify relevant motivation items in the context of tourism, especially drug tourism. Given the lack of systematic quantitative studies addressing what factors motivate tourists to participate in drug tourism, this review encompassed a wide range of motivation studies that could be related to drug use in tourism. A total of 12 items were eventually determined to be relevant and adapted to apply in the drug tourism context of this study (see Table 1).

The second stage of the initial item pool development involved conducting ethnographic fieldwork. Prayag et al. (2015) support this approach, indicating that the researcher's 'immersion' as participant observer makes it possible to understand participants' drug consuming behaviour in their social contexts. Ethnography has proven invaluable for identifying hidden populations of drug users (drug-oriented tourists) and for providing information on new drug-use trends (Beck & Rosenbaum, 1994; Morgan, Beck, Joe, McDonnell, & Gutierrez, 1994; Valdez & Sifaneck, 1997; Wiebel, 1990). An ethnographic methodology was employed for this stage; it included observation and in-depth interviews carried out by the first author of this study; its primarily purpose was to identify potential participants.

From November 2012 to September 2013, the first author conducted the ethnographic field study in Amsterdam with the help of five local university students. The ethnographic field study's secondary purpose was to understand the conceptualisation of the drug tourist from the tourists' perspectives and to establish certain criteria to be used later for selecting in-depth interviewees and questionnaire respondents. The first author who conducted the ethnographic field study is Chinese, fluent in Mandarin and familiar with Chinese cultures. He made a great effort to form positive relationships with Chinese drug-oriented tourists; to obtain trust from potential interview participants; and to encourage them to provide true responses based on their own experiences of consuming and smoking cannabis during trips, thus complying with Yang, Ryan, and Zhang's (2012) suggestion that "... in a relationship-oriented society such as China, there is a need to develop a relationship prior to revealing what may be truthful opinions" (p. 1692). The five local students were fluent in both Chinese and Dutch, and so could communicate with local people such as coffee shop owners or managers. All the research journals, documents, and memos/field notes were analysed by coding data to develop the initial item pool.

With the permission of 15 coffee shop owners/managers in Amsterdam, the first author and the five students were able to interact with Chinese tourists who smoked cannabis in coffee shops. Short field interviews (5—10 min, conversational style) were conducted at various stages to elicit answers to questions such as: "Why do you travel to Amsterdam?"; "Are you mainly driven by commercially available cannabis for this trip?"; "Is cannabis-related experience important for this trip?" and open-ended questions such as: "Do you regard yourself as a drug tourist? Why?" Analysis of the 30 short field interview' notes revealed that the majority of Chinese tourists who had smoked cannabis during travel concurred on the following four statements:

- (1) Cannabis smoking is one of my major leisure activities during this trip;
- (2) Cannabis smoking is one important part of this travelling experience;
- (3) I am mainly driven by cannabis smoking to take this trip; and
- (4) I travel to Amsterdam due to the accessibility of commercially available cannabis in coffee shops.

These four aspects for defining a drug tourist are in line with Valdez and Sifaneck's (1997) definition. They were, therefore, used as criteria to filter the mainly drug-oriented Chinese tourists in the current study. After selecting appropriate respondents on the basis of the inclusion criteria, in-depth interviews were then conducted to uncover participants' specific motivations for experiencing drug tourism in Amsterdam. The interviews were semi-structured and used both predetermined questions and subsequent probing questions informed by multiple significant research on drug tourism (Belhassen et al., 2007; Uriely & Belhassen, 2005; Winkelman, 2005). Each interview lasted 30–40 min.

Ten tourists agreed to be formally interviewed. The relatively low level of participation is explained by first, "... the intensely personal nature of the experience and the complex process of isolation and self-reflection by the tourist, making it difficult to share the experience with others (Prayag, Mura, Hall, & Fontaine, 2016, p. 319); second, in China, drug use, trafficking, and other drug-related problems have been consistently condemned by the government as social vices (Liang & Lu, 2013), and so Chinese tourists are reluctant to share their own drug-related experience with others. For this reason, during the interview process, special attention was given to the ethical issues and the need to gain the trust of interviewees in order to ensure they were comfortable, given the sensitivity of this investigated topic, to discuss what

Table 1The 12 motivation items derived from literature.

Motivation items	References/sources of construct
To learn about the local cannabis culture To learn about the local cannabis industry To learn about the local cannabis users	Crompton and McKay (1997); Kim and Eves (2012); McIntosh, Goeldner, & Ritchie, 1995 Ryan and Glendon (1998)
4. To relieve daily boredom and busyness 5. To get away from a stressful social environment 6. To temporarily escape from family	Beard and Ragheb (1983); Crompton (1979); Iso-Ahola and Weissinger (1990); Mayo and Jarvis (1981)
7. To fulfil the curiosity of having commercially available cannabis 8. To seek cannabis-related adventure and excitement 9. To seek life experience	Mayo and Jarvis (1981); Pizam et al. (2004); Urry (2002)
10. To show my socioeconomic status 11. To show my experience to others 12. To experience what others did not visit	Beard and Ragheb (1983); Botha, Crompton, and Kim (1999); Crompton and McKay (1997); Dann (1977); Ryan and Glendon (1998)

motivated them to be drug tourists. The researcher who is fluent in Chinese carefully explained the nature of this study to all potential respondents. Moreover, no private information was asked for during the interview. Verbal consent was obtained, in Chinese, from the interviewees before they were asked to participate in the interviews. All interviewees were allowed to choose where they wanted to be interviewed, with most choosing a quiet place such as a corner table in a café. For privacy reasons, the researcher did not record the interviews but took detailed notes instead. At the end of each interview, each interviewee had the chance to check the researcher's notes to ensure no confidential information had been included. All the interview notes were then compiled for content analysis in order to identify the motivation items nominated and to summarise them into the initial item pool. As a result, the in-depth interviews generated a list of 43 drug tourism motivation items.

3.2. Item purification

Based on the literature review and the in-depth interviews, 55 drug tourism motivation items were adopted to form the initial item pool for subsequent analyses. Ten Chinese drug tourists were asked to make comments on these motivation questions in order to enhance their clarity and readability. They all agreed that the questions were clearly stated and easily understood. The items developed from this original set of statements were next submitted to a panel of experts in order to assess the applicability, representativeness, accuracy, and redundancy of each item. The panel consisted of five academics with research expertise in tourism and five experienced industry leaders who had experience of working both in China and overseas. The experts were also asked to refine ambiguous items and check the final initial item pools of this study. Ultimately 39 motivation items (in Appendix - Questionnaire) were retained and applied in the questionnaire design and data collection.

3.3. Construct dimensionality determination of the measurement scale

The 39 measurement items were then developed into statements in preparation for a pre-test and the subsequent survey. In the pre-test, the first draft of the questionnaire was administrated to 15 Chinese drug tourists in Amsterdam; as a result, a few minor adjustments were made to finalize the questionnaire. It is important to note that four questions were added to the questionnaire in order to filter the right respondents (drug tourists). These four questions include: 1) Is cannabis smoking one of your major leisure activities during this trip? 2) Is cannabis smoking one important part of this travelling experience? 3) Are you mainly driven by cannabis smoking to take this trip? and 4) Do you regard yourself as a cannabis tourist? Only those who answered 'yes' to all these four filtering questions were regarded as the right respondents. The study used a seven-point Likert-type scale (1 = 'entirely disagree' to 7 = 'entirely agree') to examination drug tourists' motivations. The survey also gathered socio-demographic information on the respondents' age, gender, educational background, annual income, marital status, travelling style, information source, and previous experience of using drugs. The survey questionnaire was designed in English initially, then translated into Chinese by the first author, and reviewed by five bilingual (Chinese and English) experts. To ensure the Chinese translation's accuracy, the questionnaire was back-translated from Chinese to English (Behling & Law, 2000). As a result, discrepancies emerging from translation-back were addressed. At the end of the process the study's Chinese questionnaire was ready to be administered.

Using the inclusion criteria, a judgment sampling (known also as

purposive sampling) approach was used to identify the 'right' respondents for this study. Potential respondents were approached in Amsterdam between February 2014 and June 2015. Regarding the data collection process, the tourists were randomly approached and intercepted when they were either in or just about to leave a 'coffee shop'. Those who confirmed that they had consumed drugs were approached and asked to complete the questionnaire. This strategy allowed the respondents to reflect instantly on their drug-related experiences while they were still fresh in their minds. After a brief explanation and an assurance of confidentiality, those who agreed to complete the survey questionnaire were asked to move to a more private place to do so, thus guaranteeing their privacy and anonymity. Any participant who felt uncomfortable filling out the questionnaire had the right to withdraw from this study at any time. Next, the completed questionnaires were screened to remove those that did not meet the four filter questions' criteria and those with missing data. As a result, 346 completed, usable responses were retained for further analyses.

Analysis of the data revealed that 55.2% of the 346 respondents were male and 44.8% were female. The main age groups were 18-25 (32.9%) and 26-35 (59.8%); 42.2% were married and 57.8% were single. A majority of the respondents had a college or university degree or higher (82.3%), with an annual income over 100,000 RMB (62.4%). Slightly over half (53.2%) participated in drug tourism in small groups (<10 tourists in one group) with friends. A majority of the respondents had obtained drug tourism information from Internet (70%), and reported that they had no previous experience of using cannabis (79.5%). Due to the limited financial and human resources available to the research team, and the difficulties in recruiting the cannabis-driven Chinese tourists to participate in this study, this first round of survey data collections spanned 16 months. To test for possible temporal bias in response, wave analysis was performed by comparing those "late" respondents (i.e. those who were surveyed from January to June 2015, n = 143, 41.3%) to "early" respondents (i.e. those who were surveyed in 2014, n = 203, 58.7%) for any systematic difference in their socio-demographic attributes (i.e., age, gender, education, annual household income, and marital status) as well as travel behaviours and cannabis consumption experience. No significant difference was found between the two groups in any of the tested variables.

Thirty-nine items were used for an exploratory factor analysis (EFA) to identify the dimensional structure of the variables. In the process of EFA, principal components analysis with varimax rotation was applied to specify the relationships of the observed indicators to their posited underlying factors (see Table 2 for results). An iterative process eliminated items that had a factor loading below 0.50, cross-loaded on more than one factor, and low commonalities below 0.30 (Hair, Black, Babin, & Anderson, 2009). As a result, six dimensions with 22 items were identified which explained 69.49% of the total variance. The six dimensions were labelled as: (1) spiritual/emotional healing; (2) social prestige; (3) relaxation and escape; (4) cannabis authenticity; (5) commercial cannabis availability; and (6) cannabis experimentation. The Bartlett test of sphericity ($\chi^2 = 3790.71$, p < 0.001) was significant and the Kaiser-Meyer-Olkin (KMO) measure of sampling adequacy was 0.882, indicating that the patterns of correlations were relatively compact and that factor analysis should generate distinct and reliable factors (Field, 2005). Cronbach's alpha values for the six dimensions ranged from 0.618 to 0.888, all exceeding the 0.70 cutoff value recommended by Nunnally (1994), except for the "cannabis experimentation" dimension ($\alpha = 0.618$). However, given the exploratory and sensitive nature of the current study, the Cronbach's α score was higher than 0.60, which was considered as acceptable (Hair et al., 2009; Hung & Petrick, 2010), thereby demonstrating adequate reliabilities. The items comprising the six

Table 2EFA results

	Component					
	F1	F2	F3	F4	F5	F6
Factor 1: Spiritual/emotional healing						
To have a different mindset	0.800					
To obtain the power to see inside myself	0.771					
To have more imagination	0.757					
To get a wider philosophical and spiritual understanding	0.732					
To find something greater than myself	0.558					
Factor 2: Social prestige						
To show my experience to others		0.865				
To experience what others did not visit		0.845				
To show my socioeconomic status		0.789				
I think smoking cannabis is a fashion		0.705				
Factor 3: Relaxation and escape						
To get away from a stressful social environment			0.862			
To relieve daily boredom and busyness			0.861			
To temporarily escape from family			0.722			
Smoking cannabis makes me feel high			0.598			
Factor 4: Cannabis authenticity						
To learn about the local cannabis industry				0.864		
To learn about the local Cannabis users				0.790		
To learn about the local cannabis culture				0.789		
Factor 5: Commercially available cannabis						
Commercial cannabis itself makes me unworried about any social risk					0.814	
Commercial cannabis itself makes me unworried about any legal risk					0.808	
Commercial cannabis itself makes me feel safe to use cannabis					0.666	
Factor 6: Cannabis experimentation						
To temporarily experience a crazy lifestyle						0.747
To fulfil the need for an inversion of ordinary life						0.653
To have a look at real cannabis						0.638
Eigenvalue	7.396	2.307	1.94	1.358	1.246	1.041
Percentage of variance explained	33.619	10.488	8.82	6.173	5.663	4.732
Coefficient alpha	0.859	0.888	0.836	0.811	0.766	0.618
Number of attributes	5	4	4	3	3	3

dimensions were, therefore, internally consistent and stable and together formed a reliable scale; they were retained for the next step of construct validation.

3.4. Reliability assessment and construct validation of the measurement scale

A questionnaire was next designed based on the measurement scales derived from the EFA results. The questionnaire was reviewed by a tourism scholar who specialises in Chinese outbound tourism and travel decision-making. The second round of data collection obtained 308 usable responses between September 2015 and October 2016 through the same procedures and criteria employed in the earlier stage of data collection. Wave analysis was conducted again to check for possible temporal difference between the "early" (i.e. those who were surveyed from September 2015 to March 2016, n = 139, 45.1%) and "late" (i.e. those who were surveyed from April to October 2016, n = 169, 54.9%) respondents in their socio-demographic attributes, travel behaviours, and cannabis consumption experience. No significant difference was found in any of the tested variables. A series of chi-square tests was performed to compare the distributions of the socio-demographic variables between the two rounds of survey samples. No statistically significant difference was found between the two samples except for age and income (See Table 3). The sample for the 2nd round survey had relatively more young (18-25 years old) respondents with lower incomes (¥100,000 or under) than the sample of the 1st round survey.

Confirmatory factor analysis (CFA) using the maximum likelihood method was conducted in IBM SPSS AMOS 21.0 to purify the measurements by assessing the factor structures and the construct

validity and reliability of each factor (Anderson & Gerbing, 1988). The overall fit of the motivation model to the data was first tested. The goodness-of-fit indices ($\chi 2(df) = 374.835(194)$, $\chi 2/df = 1.932$, p-value = 0.00, CFI = 0.955, GFI = 0.898, AGFI = 0.867, NFI = 0.911, TLI = 0.946, RMSEA = 0.055, RMR = 0.147) indicated that the proposed measurement model had acceptable fit. The CFA outputs of the current study indicated that most factor loadings were greater than 0.50. and all factor loadings were statistically significant (p < 0.001). One item ("To have a look at real cannabis") was deleted from the measurement scale due to its lower than 0.50 (0.322) factor loadings. As a result, these model respecification procedures resulted in better model fit $(\chi 2(df) = 274.842(174), \chi 2/df = 1.580, p-value = 0.00, CFI = 0.974,$ GFI = 0.920, AGFI = 0.894, NFI = 0.933, TLI = 0.969, RMSEA = 0.043, RMR = 0.087).

Table 4 presents the final constructs of the measurement scale. After removing the item "To have a look at real cannabis" from the final motivation measurement scale, the "cannabis experimentation" dimension consisted of only two items; they were still, however, deemed as one meaningful and acceptable dimension for three reasons. First, the "cannabis experimentation" dimension can be interpreted as meaning that experimenting with a new lifestyle is an important motivation for Chinese tourists who get involved in drug tourism in a meaningful way (Worthington & Whittaker, 2006). Second, in fact, recent evidence suggests that for some constructs that are very narrowly defined, even a single-item measure may suffice (Bergkvist & Rossiter, 2007; Lloyd, Yip, & Luk, 2011). Thirdly, the dimension has acceptable AVE (0.759) and composite reliability (0.863) indicating its validity. Therefore, it was valid to retain the two-item dimension — cannabis experimentation – in the study's final motivation measurement scale. Table 4

Table 3Respondent Profiles of the two samples.

Demographic characteristics	Sample 1 for EFA $(n = 346)$		Sample 2 for CFA $(n = 308)$	
	Frequency	Percentage (%)	Frequency	Percentage (%
Age ($\chi^2 = 11.425$, $df = 2$, $p = 0.003$)				
18–25	114	32.9	141	45.8
26-35	207	59.8	151	49.0
36 and above	25	7.3	16	5.2
Gender ($\chi^2 = 0.839$, $df = 1$, $p = 0.360$)				
Male	191	55.2	159	51.6
Female	155	44.8	149	48.4
Educational level ($\chi^2 = 5.054$, df = 3, $p = 0.168$)				
Secondary	13	3.8	8	2.6
High school/vocational school	48	13.9	50	16.2
College/university	262	75.7	217	70.5
Postgraduate	23	6.6	33	10.7
Annual income ($\chi^2 = 10.043$, $df = 3$, $p = 0.018$)				
¥100,000 or under (US\$ 15,300 or under)	130	37.6	148	48.1
¥100,001-200,000(US\$ 15,300-30,600)	156	45.1	125	40.6
¥200,001-300,000(US\$ 30,600-45,900)	50	14.5	26	8.4
¥300,001-500,000(US\$ 45,900-76,500)	10	2.9	9	2.9
Marital status (<i>Chi-square</i> = 5.105 , $df = 3$, $p = 0.17$	1)			
Married	146	42.2	105	34.0
Single	200	57.8	203	66.0
Travel types ^a ($\chi^2 = 4.945$, $df = 4$, $p = 0.293$)				
Alone	62	17.9	55	17.9
Small group with friends	184	53.2	154	50.0
Small group with strangers	28	8.1	16	5.2
Big group with friends	54	15.6	62	20.1
Big group with strangers	18	5.2	21	6.8
Information Sources ($\chi^2 = 3.206$, $df = 4$, $p=.524$)				
Internet search	110	31.8	93	30.2
Relevant Internet forum	132	38.2	128	41.6
Friends' word of mouth	68	19.7	48	15.6
Advertisement	20	5.7	19	6.2
Others	16	4.6	20	6.4
Previous cannabis experience ($\chi^2 = 0.007$, $df = 1$,	p = 0.935)			
Yes	71	20.5	62	20.1
No	275	79.5	246	79.9

^a Small group: <10 tourists in one group, Big group: \ge 10 tourists in one group.

Table 4 Performance of final measurement scale from CFA.

	CR	AVE	Factor Loading	S.E.	C.R.	SD
Spiritual/emotional healing	0.898	0.641				
To find something greater than myself			0.757	_	_	1.198
To have more imagination			0.781	0.081	14.206	1.334
To obtain the power to see inside myself			0.761	0.080	13.783	1.311
To get a wider philosophical and spiritual understanding			0.939	0.082	17.208	1.370
To have a different mindset			0.748	0.087	13.527	1.427
Social prestige	0.902	0.699				
To show my socioeconomic status			0.777	_	_	1.600
To show my experience to others			0.913	0.069	17.481	1.641
To experience what others did not visit			0.890	0.068	17.064	1.611
I think smoking cannabis is a fashion.			0.752	0.067	13.925	1.547
Relaxation and escape	0.888	0.668				
Smoking cannabis makes me feel high			0.739	_	_	1.413
To relieve daily boredom and busyness			0.867	0.077	15.413	1.431
To get away from a stressful social environment			0.938	0.079	16.328	1.432
To temporarily escape from family			0.703	0.077	12.301	1.414
Cannabis authenticity	0.869	0.741				
To learn about the local cannabis culture			0.871	0.067	16.906	1.465
To learn about the local cannabis industry			0.914	0.066	17.418	1.415
To learn about the local cannabis users			0.794			1.424
Commercial cannabis availability	0.837	0.634				
Commercially available cannabis itself makes me feel safe to use cannabis.			0.730	0.057	12.299	1.122
Commercially available cannabis itself makes me unworried about legal risk.			0.898	0.082	13.425	1.434
Commercially available cannabis itself makes me unworried about social risk.			0.750	_	_	1.554
Cannabis experimentation	0.863	0.759				
To fulfil the need for an inversion of ordinary life			0.844	_	_	1.392
To temporarily experience a crazy lifestyle			0.898	0.118	9.192	1.422

Note: CR = composite reliability; AVE = average variance extracted; C.R. = critical ratio; SD = standard deviation; all items = p < 0.001.

presents the final measurement scale for drug tourism motivation. Each of these six motivation factor dimensions was then assessed for their validity and reliability respectively.

Composite reliability refers to the internal consistency of indicators measuring the same underlying factor (Fornell & Larcker, 1981). As recommended by Bagozzi and Kimmel (1995), the composite reliability value needs to be greater than 0.60 for a scale to be deemed reliable. The composite reliability of all the motivation dimensions in this study exceeded this criterion (see Table 4). Convergent validity refers to the degree of interrelatedness among the measures measuring the same construct (Clark-Carter, 1997). Both the average variance extracted (AVE) value and the magnitude of standardised factor loadings on the latent construct were assessed to establish the convergent validity of the measurement scale in this study. The CFA output suggested that the AVE value of all the motivation constructs ranged from 0.634 to 0.759 (see Table 4), exceeding the recommended cut-off value of 0.5 (Fornell & Larcker, 1981). In addition, all factor loadings in the model were statistically significant (p < 0.0001) and greater than the recommended value of 0.7 (Fornell & Larcker, 1981). Therefore, the convergent validity of this motivation scale was deemed to be established.

Discriminant validity concerns the extent to which the intended measure is dissimilar to the measures of different constructs (Hair et al., 2009). As shown in Table 5, none of the correlations between constructs in this study was greater than 0.85; a critical value above 0.85 indicates problems in discriminant validity (Kline, 2005). The discriminant validity of the motivation scale was further confirmed as the square root of the average variance extracted for each of the factors is greater than the correlations among the constructs (Fornell & Larcker, 1981). Thus, the measurement scale in this study met all these requirements for discriminant validity.

Nomological validity is the degree to which a construct acts as expected (Bagozzi, 1980). In assessing the nomological validity of the drug tourism motivation scale, this study investigated the relationship between the six dimensions of drug tourism motivation (spiritual/emotional healing, social prestige, relaxation/escape, cannabis authenticity, commercial cannabis availability, and cannabis experimentation) and their association with tourist behavioural intentions (future visit intention). The behavioural intentions measures included four items: "I plan to travel again to experience overseas drug tourism in the next 12 months;"; "I would travel again to experience overseas drug tourism in the next 12 months;" "I am eager to travel again to experience overseas drug tourism in the next 12 months;" and, "I will recommend my friends to experience overseas drug tourism in the next 12 months" adapted from Zeithaml, Berry, and Parasuraman (1996). These four items demonstrated strong unidimensionality in principle component analysis with factor loadings ranging from 0.853 to 0.913, and the Cronbach's α was 0.914. The mean factor score for 'future visit intention' was generated by averaging these three individual item scores. This study used IBM SPSS AMOS 21.0 to investigate nomological validity in a multivariate sense. The results

of the structural model indicated an acceptable explanatory power. The R^2 values of the 'future behavioural intention' factor were 0.829. As shown in Fig. 1, all the tested relationships are statistically significant, which supports the nomological validity of the motivation measurement scale.

4. Discussion and conclusions

The present study examined the factors that motivate Chinese outbound tourists to engage in cannabis-taking during their visit in Amsterdam. Of note is that this study is probably the first to investigate drug tourists' motivation utilising quantitative surveys. Following a rigid and accepted scale development procedure recommended by Churchill (1979) and DeVellis (2003), this study incorporated both qualitative and quantitative methods to develop a measurement scale for examining drug tourists' motivations for overseas drug tourism.

The result of in-depth interviews laid a solid foundation for both understanding drug tourism motivation from Chinese perspectives and further collecting quantitative data via survey questionnaires from Chinese drug tourists. In the data collection process, we took note of Yang, Ryan, and Zhang's (2012) observation on the importance of forming positive relationships when questionnaire surveying Chinese respondents. Consequently, the motivation measurement scale of drug tourism derived from the 10 in-depth interviews and past literature was pretested with 346 Chinese drug tourists and further examined with a sample of 308 Chinese drug tourists in Amsterdam. Three motivation dimensions - spiritual/emotional healing, commercial cannabis availability, and cannabis experimentation - were identified from interviews and another three motivation dimensions (social prestige, relaxation/ escape, and cannabis authenticity) derived from the literature were retained in the final measurement scale. A series of procedures was undertaken to refine the instrument and prove its reliability and validity.

The final measurement scale consisted of six motivation dimensions: spiritual and emotional healing, social prestige, relaxation and escape, cannabis authenticity, commercial cannabis availability, and cannabis experimentation. The positive relationship between motivation and future drug tourism visit intention further consolidated the important role of motivation in understanding tourists' overseas drug tourism experiences and revealed specific underlying reasons why tourists engage in the commercial drug-taking when travelling. The final measurement scale was deemed to have satisfactory reliability and validity. Given the increasing popularity of drug tourism and the scarcity of research into tourists' drug-taking motivations and behaviours, the establishment of a motivation measurement scale in the drug tourism context is believed to be a timely contribution to the literature and will hopefully become a stepping stone to further exploration in this field.

The results of this study were consistent overall with previous research suggesting that tourists' pursuit of an overseas

Table 5Correlations of final measurement scale from CFA.

	1	2	3	4	5	AVE
1. Spiritual/emotional healing	1					0.641
2. Social prestige	0.120	1				0.699
3. Relaxation/escape	0.344	0.119	1			0.668
4. Cannabis authenticity	0.281	0.197	0.228	1		0.741
5. Commercial cannabis availability	0.208	0.258	0.305	0.273	1	0.634
6. Cannabis experimentation	0.239	0.132	0.356	0.126	0.220	0.759
7. Future revisit intention	0.549	0.494	0.558	0.709	0.434	0.737

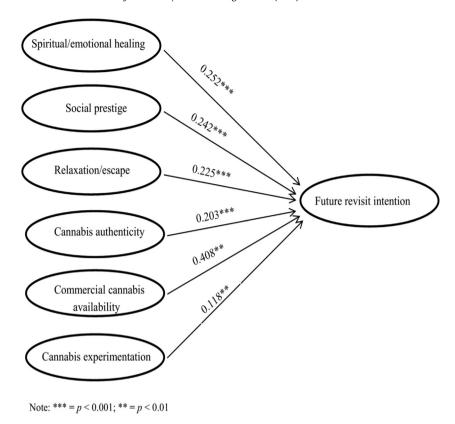


Fig. 1. Nomological validity test results.

commercially available cannabis experience were not motivated by one single factor, but rather were driven by a combination of different factors operating at different levels. While this study identified a number of different motivations for overseas drug tourism, the dimension - commercial cannabis availabilityreceived the highest factor loading (0.408) toward future drug tourism visit intention (Fig. 1) in the measurement scale. That is, most tourists were mainly motivated by both the accessibility and tolerance of commercial cannabis consumption in overseas destinations. Thus, this study complements the work of researchers such as Belhassen et al. (2007). This motivation item shed some light on why so many tourists consume cannabis during travel. As the Chinese government takes a very strict attitude to the taking and selling of drugs, including soft drugs, few people have the opportunity and also dare to smoke cannabis in China. The legality of consuming cannabis, as well as the loosened social control of it in the Netherlands, made it possible for the tourists to consume cannabis freely without being worried about breaking the law or damaging their personal reputation.

This study identified that spiritual and emotional healing is an important motivation for drug tourists. This finding supports the results of Winkelman's (2005) work. The motivational patterns clearly attested to the respondents' belief in the benefits of the activity of smoking cannabis during travel on their spritial and emotional healing experiences. These were characterised as increased self-awareness, insights into one's life, and access to deeper levels of the self, which implied a sense of personal development and a strengthening of the higher self. Some respondents perceived these aspects of transpersonal development as a general enlightenment into the human condition, and the obtaining of personal direction in one's own life (Winkelman, 2005). In past studies, scholars have suggested that drug consumption was often

associated with affective traits, which included both positive traits (e.g., sensation seeking, extraversion) and negative traits (e.g., neuroticism, negative mood) (Cooper, Agocha, & Sheldon, 2000; Kassel, Jackson, & Unrod, 2000; Read, Wood, Kahler, Maddock, & Palfai, 2003). However, these studies were conducted in the context of daily life. It would seem that the emotional item identified in this research typically produced positive traits, and few negative traits. This finding suggests that motivation items can vary acorss different contexts and, hence, that motivational scales may need to be customised. However, it is believed that the motivational scale developed in the current research could act as a reference for future investigations of tourists' drug consumption motivation.

Cannabis authenticity and experimentation were another two motivations for engaging in drug tourism from the perspective of Chinese tourists. Belhassen et al. (2007) suggest that the motivation - cannabis authenticity - means that "... the tourists are motivated by the quest to see the sources of the cannabis industry" (p. 313). In other words, tourists believe that they have more "real" or "authentic" experience by consuming cannabis in perceived drug tourism destinations. However, the dimension - cannabis authenticity - received the second lowest factor loading (0.203) (Fig. 1) as regards tourist future drug tourism intention, which again revealed the curiosity nature of this motivation among drug tourists. According to Belhassen et al. (2007) cannabis experimentation indicates that "... tourists are mainly motivated by the novelty of cannabis usage and by, as those tourists see it, the opportunity to consume cannabis during their vacation" (2007, p. 309). In this study, the cannabis experimentation dimension consists of two items: "to temporarily experience a crazy lifestyle" and "to fulfil the need for an inversion of ordinary life". As shown in Fig. 1, the dimension received the lowest factor loading (0.118) toward future intention, which indicated that the curiosity and escape were just a short-term behaviour. This finding echoes the arguments of several commentators (e.g., Belhassen et al., 2007; Prayag et al., 2015) about the complexity of cannabis use in tourism and in the routine of everyday life. Hence, a longitudinal investigation into the long-term impacts of cannabis consumption during travel and its influence on the daily lives of those who consume it offers a direction for future research.

It is interesting to note that, at least for some tourists who consumed commercially available cannabis while travelling overseas, fulfilling social needs including dimensions of social prestige and relaxation/escape seem to serve a more important role than simply satisfying direct drug-related desires in terms of their drug tourism decision-making process. This finding coincides with previous findings by Winkelman (2005) who found that seeking spiritual relations and personal spiritual development, emotional healing, and the development of personal self-awareness were the principal motivations for ayahuasca seekers in Amazonia and also with Prayag et al.'s (2015) study in which the tourist experience of ayahuasca was depicted as spiritual. Further investigations are needed to verify this study's finding that Chinese tourists believed that drug tourism could enhance the prestige of the elite and serve as a visible representation of social status. This study fills a gap in the literature on drug tourism by establishing representative motivational constructs for overseas drug tourism in the Chinese context specifically. To the authors' best knowledge, the present study is probably the first empirical and quantitative attempt to explore the motivations of tourists who pursue commercial drugrelated experience during their overseas travel. This study not only suggests key motivations derived from empirical evidence but also sets up an example for further investigations in this area.

Some theoretical implications can be drawn from the current study. Prior research in this area has stemmed mostly from a western perspective and drawn upon interview informants from Europe and the United States (Uriely & Belhassen, 2005; Valdez & Sifaneck, 1997; Winkelman, 2005; Belhassen et al., 2007). Bandyopadhyay (2013) explored a similar phenomenon in the case of sex tourism where he says this phenomenon "... overwhelming [ly] portray[ed] the East as a place where modern sex tourists could look for sexual experiences unobtainable in the West" (p. 2). This study partially echoes Bandyopadhyay's (2013) call for a "paradigm shift" in research of special (or sensitive) form of tourism activities such as sex tourism that highlights the Asian tourists' adventures in the West. In this sense it is a first attempt to answer that call by exploring Chinese outbound drug tourists' motivation and to lay a foundation for further valuable research. This investigation has highlighted the many different motives associated with tourists' drug-taking behaviour. These motives provide many useful insights for drug tourism destinations. Tourism practitioners should design and deliver drug tourism products in such a way that they not only satisfy tourists' expectations but also avoid negative impacts for the local community and tourists themselves. Additionally, the motives identified in this paper provide further insights into China's soaring numbers of outbound tourists as a whole.

Although drug tourism has been a popular topic in academic tourism research for the last few decades, most of the research has been dominated by qualitative investigations where most of the drug tourists' motivations were derived from interviews (e.g., Buckley, 2012; Ryan, 1993; Uriely & Belhassen, 2006). One reason for the prevalence of this approach may lie in the issue's sensitivity, while another is the difficulty of collecting quantitative data. On its own, however, qualitative research is not enough. It would be useful to establish exactly what factors motivate tourists to

consume drugs. Several scholars such as Winkelman (2005) have called for the application of quantitative surveys in the study of special tourism. Responding to that call, this study utilised qualitative in-depth interviews and questionnaires to develop a measurement scale for Chinese outbound tourists' motivation around consuming drugs. It is expected that the study will contribute not only to the drug tourists' motivation literature, but also to the body of knowledge on drug tourism. In summary, this study developed a motivation measurement scale based on the data collected from Chinese drug tourists during travel in Amsterdam, and provided valuable insights on why people engage in overseas drug tourism. Given the dearth of research in this area, it is believed that this study could serve as a stepping stone to further investigations on travel motivations.

It was not the intention of this study to discuss the practical significance and importance of drug tourism to the travel industry in destinations where commercial drugs are made available to tourists. However, the findings of this study might shed some lights on the regulation or control of this tourism market force from the perspective of the drug tourist-generating countries. For the Chinese government, discouraging its citizens' drug-taking behaviours when travelling abroad would be a legitimate appeal in accordance with its strict domestic anti-drug policies. As indicated by the results, Chinese outbound tourists' consumption of drugs is driven by a variety of motivations, rather than the mere fulfilment of direct drug-related desires. Therefore, a comprehensive understanding of this multi-facet nature of why Chinese tourists consume drugs when travelling abroad would lay a foundation for effective public communication and education program design in order persuade at least some Chinese tourists not to do so when overseas, especially those who are mainly motivated by factors indirectly related to drugs, such as spiritual or emotional healing, social prestige, and relaxation/escape.

5. Limitations and future research

The present study has the following limitations. First, this study was exploratory in nature, and worked as an initial attempt to develop a measurement scale of tourists' motivations for engaging in drug tourism. Because the study draws on a sample of Chinese tourists and is framed by China's particularly strict antidrug policies and other China-specific societal and cultural circumstances, the motivation scale items may not fit exactly with other cultures. Future study should examine this scale with other samples, in other geographic locations and/or cultural contexts.

Secondly, the study site of this research was Amsterdam only; no other destinations associated with commercial cannabis consumption were covered. Future researchers are, therefore, encouraged to use this motivation scale to examine other destinations associated with cannabis consumption such as Jamaica (Gamradt, 1995), Florida beaches (Josiam et al., 1998), and Thailand (Westerhausen, 2002).

Additionally, this study focuses on the 'drug-related' motivations included in the measurement scale from the Chinese perspective only. Indeed, as mentioned in the methodology section, strict criteria were employed to capture only Chinese drug tourists that were mainly driven by the opportunity to take drugs on their trip and chose Amsterdam as their destination. Other types of Chinese tourists who failed to meet the criteria, but also consumed and used cannabis during travel, were not included in the sample of this study. As a result, other relatively less drug-related motivations were not explored in this study. Future studies could include those

tourists who regarded drug consumption as a by-product of their travel experience so that more comprehensive information on their motivations could be explored. Lastly, specific market segmentation can be examined in future studies to better understand this particular Chinese drug tourist market.

Appendix A. Supplementary data

Supplementary data related to this article can be found at http://dx.doi.org/10.1016/j.tourman.2017.08.001.

References

- Amsterdam Tourism and Convention Board, Retrieved from: http://www.amsterdam.info/coffeeshops/.
- Anderson, J., & Gerbing, D. (1988). Structural equation modeling in practice: A review and recommended two-step approach. *Psychological Bulletin*, 103(3), 411–423.
- Bachman, J. G., Wadsworth, K. N., O'Malley, P. M., Johnston, L. D., & Schulenberg, J. E. (2013). Smoking, drinking, and drug use in young adulthood: The impacts of new freedoms and new responsibilities. Hove, UK: Psychology Press.
- Bagozzi, R. P. (1980). Causal models in marketing. New York, NY: Wiley.
- Bagozzi, R. P., & Kimmel, S. K. (1995). A comparison of leading theories for the prediction of goal directed behaviours. *British Journal of Social Psychology*, 34, 437–461.
- Baker, T. B., Piper, M. E., McCarthy, D. E., Majeskie, M. R., & Fiore, M. C. (2004). Addiction motivation reformulated: An affective processing model of negative reinforcement. *Psychological Review*, 111(1), 33.
- Bandyopadhyay, R. (2013). A paradigm shift in sex tourism research. *Tourism Management*, 6, 1–2.
- Beard, J. G., & Ragheb, M. G. (1983). Measuring leisure motivation. *Journal of Leisure Research*, 12, 20–33.
- Beck, J., & Rosenbaum, M. (1994). Pursuit of ecstasy: The MDMA experience. Albany, NY: State University of New York Press.
- Behling, O., & Law, K. S. (2000). Translation questionnaires and other research instruments: Problems and solutions. Thousand Oaks, CA: Sage Publications.
- Belhassen, Y., Santos, C. A., & Uriely, N. (2007). Cannabis usage in tourism: A sociological perspective. *Leisure Studies*, 26(3), 303–319.
- Bergkvist, L., & Rossiter, J. R. (2007). The predictive validity of multiple-item versus single-item measures of the same constructs. *Journal of Marketing Research*, 44(2), 175–184.
- Botha, C., Crompton, J. L., & Kim, S. S. (1999). Developing a revised competitive position for Sun/Lost City, South Africa. *Journal of Travel Research*, 37, 341–352.
- Boys, A., Marsden, J., & Strang, J. (2001). Understanding reasons for drug use amongst young people: A functional perspective. *Health Education Research*, 16(4), 457–469.
- Buckley, R. (2012). Rush as a key motivation in skilled adventure tourism: Resolving the risk recreation paradox. *Tourism Management*, 33(4), 961–970.
- Buultjens, J., Neale, K., & Lamont, M. (2013). Hosts, guests and a drug culture in a destination: A case study of nimbin, Australia. *Journal of Destination Marketing & Management*, 2(3), 185–195.
- Churchill, G. A. (1979). A paradigm for developing better measures of marketing constructs. *Journal of Marketing Research*, XVI, 64–73 (February).
- Clark-Carter, D. (1997). Doing quantitative psychological research: From design to report. Hove, UK: Psychology Press.
- Comeau, N., Stewart, S. H., & Loba, P. (2001). The relations of trait anxiety, anxiety sensitivity, and sensation seeking to adolescents' motivations for alcohol, cigarette, and marijuana use. Addictive Behaviors, 26(6), 803–825.
- Coomber, R., & South, N. (2004). Drug use and cultural context 'beyond the west': Tradition, change and post colonialism.: Free Assn Books.
- Cooper, M. L., Agocha, V. B., & Sheldon, M. S. (2000). A motivational perspective on risky behaviors: The role of personality and affect regulatory processes. *Journal* of Personality, 68(6), 1059–1088.
- Crompton, J. L. (1979). Motivation for pleasure vacation. *Annals of Tourism Research*, 6, 408–424.
- Crompton, J. L., & McKay, S. L. (1997). Motives of visitors attending festival events. *Annals of Tourism Research*, 24, 425–439.
- Dakwar, E., Levin, F., Foltin, R. W., Nunes, E. V., & Hart, C. L. (2014). The effects of subanesthetic ketamine infusions on motivation to quit and cue-induced craving in cocaine-dependent research volunteers. *Biological Psychiatry*, 76(1), 40–46.
- Dann, G. M. (1977). Anomie, ego-enhancement, and tourism. *Annals of Tourism Research*, 4, 184–194.
- De Rios, M. D. (1994). Drug tourism in the Amazon: Why westerners are desperate to find the vanishing primitive. *Omni*, 16(4), 6–7.
- DeVellis, R. F. (2003). Scale development: Theory and applications. London, UK: Sage. Fang, Y. X., Wang, Y. B., Shi, J., Liu, Z. M., & Lu, L. (2006). Recent trends in drug abuse in China. Acta Pharmacologica Sinica, 27, 140–144.

- Felix-Ortiz, M., Fernandez, A., & Newcomb, M. D. (1998). The role of intergenerational discrepancy of cultural orientation in drug use among Latina adolescents. Substance Use & Misuse, 33(4), 967–994.
- Field, A. (2005). Discovering statistics using SPSS (2nd ed.). London, UK: Sage Publications.
- Fornell, C., & Larcker, D. F. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research*, 18(1), 39–50.
- Gamradt, J. (1995). Jamaican children's representations of tourism. *Annals of Tourism Research*, 22(4), 735–762.
- Goode, E. (1970). The marijuana smokers. New York, NY: Basic Books.
- Hair, J. F., Black, W. C., Babin, B. J., & Anderson, R. E. (2009). Multivariate data analysis (7th ed.). Upper Saddle River, NJ: Pearson Prentice Hall.
- Hsu, C. H., Cai, L. A., & Wong, K. K. (2007). A model of senior tourism motivations: Anecdotes from Beijing and Shanghai. *Tourism Management*, 28(5), 1262–1273.
- Hung, K., & Petrick, J. (2010). Developing a measurement scale for constraints to cruising. *Annals of Tourism Research*, 37(1), 206–228.
- Iso-Ahola, S. E., & Weissinger, E. (1990). Perceptions of boredom in leisure. *Journal of Leisure Research*, 22, 1–17.
- Josiam, B. M., Hobson, J. P., Dietrich, U. C., & Smeaton, G. (1998). An analysis of the sexual, alcohol and drug related behavioural patterns of students on spring break. *Tourism Management*. 19(6), 501–513.
- Jurich, A. P., & Polson, C. J. (1984). Reasons for drug use: Comparison of drug users and abusers. Psychological Reports, 55, 371–378.
- Kassel, J. D., Jackson, S. I., & Unrod, M. (2000). Generalized expectancies for negative mood regulation and problem drinking among college students. *Journal of Studies on Alcohol*, 61(2), 332–340.
- Kim, Y. G., & Eves, A. (2012). Construction and validation of a scale to measure tourists' motivation to consume local food. *Tourism Management*, 22, 1458–1467.
- Kjellgren, A., Eriksson, A., & Norlander, T. (2009). Experiences of encounters with ayahuasca—"the vine of the soul". *Journal of Psychoactive Drugs*, 41(4), 309–315.
- Kline, R. B. (2005). Principles and practice of structural equation modeling (2nd ed.). New York, NY: The Guilford Press.
- Korf, D. J. (1995). *Dutch treat: Formal control and illicit drug use in The Netherlands.* West Lafayette, IN: Purdue University Press.
- Korf, D. J. (2002). Dutch coffee shops and trends in cannabis use. Addictive Behaviors, 27(6), 851–866.
- Lai, C., Li, X. R., & Harrill, R. (2013). Chinese outbound tourists' perceived constraints to visiting the United States. *Tourism Management*, 37, 136–146.
- Liang, B., & Lu, H. (2013). Discourses of drug problems and drug control in China:
- Reports in the People's Daily, 1946-2009. *China Information, 27*(3), 301–326. Lloyd, A. E., Yip, L.,S.,C., & Luk, S.,T.,K. (2011). An examination of the differences in retail service evaluation between domestic and tourist shoppers in Hong Kong.
- Tourism Management, 32(3), 520–533.

 Lowinger, P. (1977). The solution to narcotic addiction in the People's Republic of China. The American Journal of Drug and Alcohol Abuse, 4(2), 165–178.
- Lu, L., Fang, Y., & Wang, X. (2008). Drug abuse in China: Past, present and future. Cellular and Molecular Neurobiology, 28(4), 479–490.
- Mayo, E., & Jarvis, L. P. (1981). The psychology of leisure travel. Boston, MA: CBI.
- McIntosh, R. W., Goeldner, C. R., & Ritchie, J. R. B. (1995). *Tourism principles, practices, philosophies* (7th ed.). New York, NY: Wiley.
- Morgan, P., Beck, J. E., Joe, D., McDonnell, D., & Gutierrez, R. (1994). *Ice and other methamphetamine use: An exploratory study final report to the National Institute on Drug Abuse.* San Francisco, CA: The Institute for Scientific Analysis.
- Nemoto, T., Aoki, B., Huang, K., Morris, A., Nguyen, H., & Wong, W. (1999). Drug use behaviors among Asian drug users in San Francisco. Addictive Behaviors, 24(6), 823–838
- Netemeyer, R. G., Bearden, W. O., & Sharma, S. (2003). Scaling procedures: Issues and applications. London, UK: Sage.
- Nunnally, J. C. (1994). Psychometric theory (3rd ed.). New York, NY: McGraw-Hill.
- Van Ooyen-Houben, M. M., Bieleman, B., & Korf, D. J. (2016). Tightening the Dutch coffee shop policy: Evaluation of the private club and the residence criterion. *International Journal of Drug Policy*, 31, 113–120.
- Pizam, A., Jeong, G., Reichel, A., Van Boemmel, H., Lusson, J. M., Steynberg, L., et al. (2004). The relationship between risk-taking, sensation-seeking, and the tourist behavior of young adults: Across-cultural study. *Journal of Travel Research*, 42, 251–260.
- Pomazal, R. J., & Brown, J. D. (1977). Understanding drug use motivation: A new look at a current problem. *Journal of Health and Social Behavior*, 212–222.
- Prayag, G., Mura, P., Hall, M., & Fontaine, J. (2015). Drug or spirituality seekers? Consuming ayahuasca. *Annals of Tourism Research*, *52*, 175–177.
- Prayag, G., Mura, P., Hall, M., & Fontaine, J. (2016). Spirituality, drugs, and tourism: Tourists' and shamans' experiences of ayahuasca in Iquitos, Peru. *Tourism Recreation Research*, 41(3), 314–325.
- Read, J. P., Wood, M. D., Kahler, C. W., Maddock, J. E., & Palfai, T. P. (2003). Examining the role of drinking motives in college student alcohol use and problems. *Psychology of Addictive Behaviors*, 17(1), 13.
- Riemer, W. J. (1981). Deviance as fun. Adolescence, 16(61), 39-43.
- Roshanfekr, P., Noori, R., Dejman, M., Geshnigani, Z. F., & Rafiey, H. (2015). Drug use and sex work among at-risk women: A qualitative study of initial factors. *Iranian Journal of Psychiatry and Behavioral Sciences*, 9(2), e953. Available from:

http://ijpsychiatrybs.com/en/articles/953.html.

Ryan, C. (1993). Crime, violence, terrorism and tourism: An accidental or intrinsic relationship? Tourism Management, 14(3), 173-183.

Ryan, C., & Glendon, I. (1998). Application of leisure motivation scale to tourism. Annals of Tourism Research, 25(1), 169-184.

Sellars, A. (1998). The influence of dance music on the UK youth tourism market. Tourism Management, 19(6), 611-615.

Shek, D. T. (2007). Tackling adolescent substance abuse in Hong Kong: Where we

should and should not go. *The Scientific World Journal*, 7, 2021–2030. Simons, J., Correia, C. J., & Carey, K. B. (2000). A comparison of motives for marijuana and alcohol use among experienced users. Addictive Behaviors, 25(1), 153–160.

Simons, J., Correia, C. J., Carey, K. B., & Borsari, B. E. (1998). Validating a five-factor marijuana motives measure: Relations with use, problems, and alcohol motives. Journal of Counseling Psychology, 45(3), 265–273.

Simons, J. S., Gaher, R. M., Correia, C. J., Hansen, C. L., & Christopher, M. S. (2005). An affective-motivational model of marijuana and alcohol problems among college students. Psychology of Addictive Behaviors, 19(3), 326-334.

Sparks, B., & Pan, G. W. (2009). Chinese outbound tourists: Understanding their attitudes, constraints and use of information sources. Tourism Management, 30(4), 483-494.

UNWTO. (2017). Chinese tourists spent 12% more in travelling abroad in 2016. UNWTO Press Release (PR No.: PR 17046, 12 Apr 17), Available from: http://media.unwto. org/press-release/2017-04-12/chinese-tourists-spent-12-more-travellingahrnad-2016

Uriely, N., & Belhassen, Y. (2005). Drugs and tourists' experiences. Journal of Travel Research, 43(3), 238-246.

Uriely, N., & Belhassen, Y. (2006). Drugs and risk-taking in tourism. Annals of Tourism Research, 33(2), 339-359.

Urry, J. (2002). The tourist gaze (2nd ed.). London, UK: Sage.

Valdez, A., & Sifaneck, S. J. (1997). Drug tourists and drug policy on the US-Mexican border: An ethnographic investigation of the acquisition of prescription drugs. Journal of Drug Issues, 27(4), 879–898.

Van den Brink, W. (1996). Heroin in Amsterdam. Jellinek Quarterly, 3(4), 6-7.

Vega, W. A., Aguilar-Gaxiola, S., Andrade, L., Bijl, R., Borges, G., Caraveo-Anduaga, J. J., & Merikangas, K. R. (2002). Prevalence and age of onset for drug use in seven international sites: Results from the international consortium of psychiatric epidemiology. Drug and Alcohol Dependence, 68(3), 285-297.

Warner, L. A., Valdez, A., Vega, W. A., de la Rosa, M., Turner, R. J., & Canino, G. (2006). Hispanic drug abuse in an evolving cultural context: An agenda for research. Drug and Alcohol Dependence, 84, S8-S16.

Westerhausen, K. (2002). Beyond the beach: An ethnography of modern travellers in Asia. Bangkok, Thailand: Lotus Press.

Wiebel, W. (1990). Identifying and gaining access to hidden populations. In E. Lambert (Ed.), The collection and interpretation of data from hidden populations (pp. 4-11). Washington, DC: National Institute on Drug Abuse Research Monograph 98. Department of Health and Human Services Publication No. ADM 90-1678.

Winkelman, M. (2005). Drug tourism or spiritual healing? Ayahuasca seekers in Amazonia. Journal of Psychoactive Drugs, 37(2), 209-218.

Worthington, R. L., & Whittaker, T. A. (2006). Scale development research a content analysis and recommendations for best practices. The Counselling Psychologist, 34(6), 806-838.

Wu, M. Y., & Pearce, P. L. (2014). Chinese recreational vehicle users in Australia: A netnographic study of tourist motivation. Tourism Management, 43, 22-35.

Wu, C. S. T., Wong, H. T., Chou, L. Y., To, B. P. W., Lee, W. L., & Loke, A. Y. (2014). Correlates of protective motivation theory (PMT) to adolescents' drug use intention. International Journal of Environmental Research and Public Health,

Yang, J., Ryan, C., & Zhang, L. (2012). The use of questionnaires in Chinese tourism research. Annals of Tourism Research, 39, 1680-1693.

Yi, Y., & Gong, T. (2013). Customer value co-creation behaviour: Scale development and validation. Journal of Business Research, 66, 1279-1284.

Zeithaml, V. A., Berry, L. L., & Parasuraman, A. (1996). The behavioural consequences of service quality. Journal of Marketing, 60(2), 31-46.



Mr. Jun Wen is currently a PhD candidate in the Department of Marketing (Tourism), the University of Waikato, New Zealand. His research interests lie in outbound tourist behaviour in the context of special interest tourism including cigar tourism, pet tourism, sex tourism, and drug



Dr. Meng is an Associate Professor in the School of Hotel. Restaurant, and Tourism Management, University of South Carolina, United States, Her research mainly focuses on tourism destination marketing and management, tourism economic development, tourist behaviour/experience, and international tourism.



Dr. Tianyu Ying is an Associate Professor in the Department of Tourism and Hotel Management, Zhejiang University. China. His research interests lie in the Chinese outbound tourism market, and the sustainability issues in tourism from a social perspective. He also has a methodological interest in applying social network analysis on various topics related to travel and tourism.



Miss, Hongxia Oi is a PhD candidate at Victoria University of Wellington, New Zealand. Her research focuses on event volunteering and special interest tourism.



Tim Lockver is currently Associate Professor, Department of Marketing, Waikato Management School, University of Waikato. In 2007 he published a research book entitled The International Hotel Industry: Sustainable Management. His main interest is tourism and hospitality management and control.