

Spring 2015

What Chinese cruisers want: An analysis of product preferences

Yaming Yang
Purdue University

Follow this and additional works at: https://docs.lib.purdue.edu/open_access_theses

 Part of the [Management Sciences and Quantitative Methods Commons](#), [Marketing Commons](#), and the [Recreation Business Commons](#)

Recommended Citation

Yang, Yaming, "What Chinese cruisers want: An analysis of product preferences" (2015). *Open Access Theses*. 632.
https://docs.lib.purdue.edu/open_access_theses/632

This document has been made available through Purdue e-Pubs, a service of the Purdue University Libraries. Please contact epubs@purdue.edu for additional information.

**PURDUE UNIVERSITY
GRADUATE SCHOOL
Thesis/Dissertation Acceptance**

This is to certify that the thesis/dissertation prepared

By Yaming Yang

Entitled

WHAT CHINESE CRUISERS WANT: AN ANALYSIS OF PRODUCT PREFERENCES

For the degree of Master of Science

Is approved by the final examining committee:

Howard Adler	_____	_____
Co-chair	_____	_____
Xinran Y. Lehto	_____	_____
Co-chair	_____	_____
Jonathan G. Day	_____	_____
	_____	_____

To the best of my knowledge and as understood by the student in the Thesis/Dissertation Agreement, Publication Delay, and Certification Disclaimer (Graduate School Form 32), this thesis/dissertation adheres to the provisions of Purdue University's "Policy of Integrity in Research" and the use of copyright material.

Approved by Major Professor(s): Howard Adler and Xinran Y. Lehto

Approved by: Barbara Almanza 14/04/2015
Head of the Departmental Graduate Program Date

WHAT CHINESE CRUISERS WANT:
AN ANALYSIS OF PRODUCT PREFERENCES

A Thesis
Submitted to the Faculty
of
Purdue University
by
Yaming Yang

In Partial Fulfillment of the
Requirements for the Degree
of
Master of Science

May 2015
Purdue University
West Lafayette, Indiana

ACKNOWLEDGMENTS

The author would like to express her deep appreciation and sincere gratitude to her committee members, particularly Dr. Howard Adler and Dr. Xinran Lehto for their consistent mentoring, patience, and understanding throughout this research. Appreciation also goes to Dr. Day for his kind help and support in the completion of this thesis. It has been an honor and a pleasure to work with all of my committee members.

I would also like to thank all those kind friends who had helped me during the writing of this thesis. I wish to express my gratitude for my statistical consultant Mr. Hao Zhang for providing knowledge and information for my research.

Finally, a special thanks goes to my family. They have supported me through all the best and worst moments in my life.

TABLE OF CONTENTS

	Page
LIST OF TABLES	v
LIST OF FIGURES	vi
ABSTRACT.....	vii
CHAPTER 1. INTRODUCTION	1
1.1 Background	1
1.2 Research Objectives	4
CHAPTER 2. LITERATURE REVIEW	6
2.1 The Cruise Industry	6
2.2 Cruising in Asia	8
2.3 Cruise Product Offerings	10
2.4 The Chinese Travel Industry	14
2.5 Cruising in China.....	16
2.6 Chinese Consumer Behavior and Leisure Patterns	18
2.7 Cruising Product Preferences	19
2.8 Cruise Motivations	21
2.9 Demographic Profile of Cruise Travelers.....	22
CHAPTER 3. METHODOLOGY	24
3.1 Participants	24
3.2 The Survey Instrument	24
3.3 Statistical Analysis	26
CHAPTER 4. RESULTS AND DISCUSSION	27
4.1 General Preferences for Cruise Products.....	27
4.1.1 Demographic Description of the Sample	27
4.1.2 General Product Preferences	30
4.2 Relationship between Product Preferences and Demographic Variables	36
4.2.1 Product Preferences and Gender	36
4.2.2 Product Preferences and Age	39

	Page
4.2.3 Product Preferences and Marital Status	43
4.2.4 Product Preferences and Educational Level	44
4.2.5 Product Preferences and Income	47
4.3 Relationship between Product Preferences and Motivational Factors	52
4.3.1 Factor Structure of Cruise Motivation Typology	52
4.3.2 Motivational Factors in Product Category Preference Model	55
4.4 Relationship between Motivational Factors and Demographic Variables.....	58
4.5 Relationship among Different Product Items under Each Category	59
CHAPTER 5. CONCLUSIONS AND IMPLICATIONS	61
CHAPTER 6. LIMITATIONS AND FUTURE RESEARCH	70
LIST OF REFERENCES	71
APPENDIX: 2014 CHINESE CRUISERS SURVEY	77

LIST OF TABLES

Table	Page
Table 2.1 Product Offerings of Three Major Cruise Lines Operating in Asia	11
Table 2.2 Cruise Motivation Measurement Scale	21
Table 4.1 Demographic Description of Sample	28
Table 4.2 Importance of General Cruise Product Domains	31
Table 4.3 Likelihood of Taking a Cruise in the Next Two Years	31
Table 4.4 General Product Item Preferences.....	34
Table 4.5 One-way ANOVA: Gender and Product Category Preferences	37
Table 4.6 One-way ANOVA: Product Item Preferences of Gender Group in Sports/Fitness Program and Onboard Shopping	39
Table 4.7 One-way ANOVA: Age and Product Category Preferences	40
Table 4.8 One-way ANOVA: Product Item Preferences of Age Group in Spa/Wellness Program	42
Table 4.9 One-way ANOVA: Marital Status and Product Category Preferences	43
Table 4.10 One-way ANOVA: Educational Level and Product Category Preferences.....	44
Table 4.11 One-way ANOVA: Product Item Preferences of Education Group in Onboard Shopping and Onboard Entertainment	46
Table 4.12 One-way ANOVA: Monthly Income and Product Category Preferences	47
Table 4.13 One-way ANOVA: Experience and Product Category Preferences.....	49
Table 4.14 One-way ANOVA: Product Item Preference of Experienced Group in Onboard Shopping and Onboard Entertainment	51
Table 4.15 Exploratory Factor Analysis for Cruise Motivations	52
Table 4.16 Regression Models for Each Product Category	55
Table 4.17 Motivational Factors in Product Category Preference Model	56
Table 4.18 One-way ANOVA: Gender and Motivational Factors	58

LIST OF FIGURES

Figure	Page
Figure 1. Multiple-Dimension Scaling Model of Different Product Items under Each Category	60

ABSTRACT

Yaming, Yang. M.S., Purdue University, May 2015. What Chinese Cruisers Want: An Analysis of Product Preferences. Major Professors: Howard Adler and Xinran Lehto.

Cruise travel has become increasingly popular, and the number of cruisers is growing rapidly. China plays a dominant role in worldwide tourism owing to its large population and fast economic development. It is a potential major market for the cruise industry. The number of inbound and outbound Chinese travelers continues to increase, generating growing interest in cruise travel. Investigating what Chinese cruisers want from cruise travel has great significance; however, little research has been conducted concerning Chinese travelers' preferences in the cruise product domain. The purpose of the present study is to address this gap by investigating Chinese travelers' cruise product preferences. This study also features an exploratory analysis on motivational factors in a Chinese context. Theoretical and practical implications are discussed.

CHAPTER 1. INTRODUCTION

1.1 Background

The worldwide cruise industry has been experiencing steady and dramatic growth during recent years. The cruise population of approximately 500,000 passengers in 1970 grew to 12 million by 2006. In addition, the industry has recorded an annual compound growth of 8.1% between 1980 and 2007 (Cruise Line International Association, 2008). It has enjoyed a steady growth rate since then. According to the Cruise Line International Association (CLIA) (2014), the number of passengers in 2013 is estimated to have been 21.3 million, and the organization forecasts a continuing growth in the number of passengers at a rate of 400,000 per year. Development of the cruise industry has created 100 billion dollars in global economic impact, 33 billion dollars in global wages, and 775,000 jobs around the world. Americans and Europeans comprise the largest group of passengers. The Caribbean area is still the center of the global cruise industry with a 34.4% market share in 2013, while Asia occupied 3.4%. Although Asia now represents a barely significant market share, the cruise industry has the potential for continued expansion, both in its traditional markets and in the emerging markets, particularly in Asia (Dowling, 2006).

As a booming tourism sector, the global scope of the cruise industry continues to grow. A number of new markets and destinations are rapidly emerging in the cruise industry. One such market is China (Dowling, 2006). International cruise operators are paying increasing attention to the large potential of the Chinese market, attempting to tap into this cruise segment. China has four main potential reasons to become a new market for the cruise industry: 1) China is a huge market for international tourism, including cruising, with a population of 1.34 billion (Mondou & Taunay, 2012); 2) China has a long coast, including many famous ports such as Shanghai, Dalian, and Hong Kong; 3) the Chinese government encourages development of cruise tourism while maintaining strong regulations (Nyiri, 2008); and 4) cruise lines are looking for new destinations and source markets (Mondou & Taunay, 2012).

With the soaring Chinese economy and upwardly mobile society, China's middle- and upper-income classes continue to grow (Tunney, 2011). These middle- and upper-class Chinese consumers have become increasingly interested in cruise travel during recent years. Cruises are now becoming one of the fastest growing sectors of Chinese domestic tourism, with the number of Chinese passengers rising from 10,000 in 2005 to 790,000 in 2010. Chinese people are also eager to travel overseas. In 2012, the number of outbound tourists was 83,182,700, an 18.4% increase in the number during the previous year. In addition, China has increased the number of allowable overseas destinations for its citizens to 114 countries and regions (Travel China Guide, 2013). The

statistics of the China Cruise & Yacht Industry Association show that 170 overseas cruises departed from China's mainland in 2012, a six-fold increase in the 2006 numbers (Want China Times, 2013). Harbor infrastructure has improved greatly, with 16 of China's 23 main ports supporting cruise terminals. The well-developed flights and high-speed train network also make traveling in China faster and more comfortable than ever.

Given the Chinese market size and potential growth of that market, cruise operators are presented with not only an abundance of opportunities, but also challenges. The lack of understanding of culturally driven behavioral characteristics and preferences of the Chinese cruisers is one of the major factors constraining market expansion. Various studies have outlined Chinese tourists' travel and leisure patterns (Guo, Kim, & Timothy, 2007; Run, Li, & Zhang, 2008; Yun & Joppe, 2011). According to Hofstede's theory of cultural dimensions (Hofstede, 1980), China is a collective society, and mainland Chinese are especially group-oriented. In Hofstede's study, Chinese scored very high in "power distance," low in "individualism," and high in "long-term orientation" (Agrusa, Kim, & Wang, 2011). Mehta, Lalwani, and Ping (2001) found Asian consumers are less individualistic than others, adhering more than most groups to social norms. However, in terms of specific uniqueness and leisure preferences of the Chinese market, there remains a large gap between Western cruise operators and Chinese tourists.

1.2 Research Objectives

The major product offerings by cruise lines usually include transportation, accommodations, dining, onboard entertainment, recreational activities, ports of call, and shore excursions. The abundant choices provided and the manner of service delivered both contribute to customers' satisfaction with their cruise experience. However, there has been limited information about Chinese cruise travelers' preferences, despite the Chinese market potential. Many baseline objectives such as 1) examining the type of food that Chinese cruisers prefer, Western or traditional Eastern food; 2) investigating what kind of onboard activities appeal to Chinese cruisers; and 3) exploring the current route configurations and activity offerings, which are geared more towards Western cruise consumers and are in need of modifications when it comes to satisfying Chinese consumers.

Therefore, the purpose of the present study is to measure the product preferences of Chinese cruisers. This study will enable cruise operators to better understand the needs of Chinese cruisers and the differences between them and traditional Western cruisers. With this information, cruise operators can provide better service by customizing product offerings and providing more suitable matches between customer profiles and appropriate cruise experiences. Specific goals for this research include the following:

1. Explore the general preferences of Chinese travelers for cruise products;

2. Examine the relationship between product preferences and demographic variables;
3. Identify the relationship between product preferences and motivational factors;
4. Investigate the relationship between motivational factors and demographic variables; and
5. Assess the relationships among different product items under each category.

CHAPTER 2. LITERATURE REVIEW

2.1 The Cruise Industry

To cruise is “to make a trip by sea in a liner for pleasure, usually calling at a number of ports” (Collins English Dictionary, 2010). Today ships are not only viewed as a means of transport but also as floating hotels. Increasingly they are being viewed as floating resorts. These floating resorts operate as their land-based counterparts do, offering restaurants, bars, sports facilities, shopping centers, entertainment venues, and communication centers (Dowling, 2006). Today’s cruise industry is very different from its predecessor (Veronneau & Roy, 2009). According to Page (1987), the former passenger liner industry transformed from a pure transport function to an almost pure tourism function that is apparent in today’s global cruise line industry . Now cruising is one of the fastest growing sectors of tourism. It used to be seen as the preserve of the elderly or the rich and famous, but today the cruise industry has introduced products aimed at a wide range of customers including families, young people, and groups. At the same time, prices for many cruise products are decreasing with the increase of competition among major cruise line operators.

The potential for new markets for the cruise industry has been promising (Dowling, 2006). The international cruise industry has experienced solid and steady

growth despite its short history (Papathanassis, 2009). Various sources contend that the cruise population of approximately 500,000 passengers in 1970 grew to 12 million by 2006. In addition, the industry has recorded an annual compound growth of 8% between 1980 and 2007 (Cruise Line International Association, 2008). According to the First International Cruise Conference Report (Gibson & Papathanassis, 2008), the cruise industry has been experiencing steady growth over the last decade. In terms of passenger numbers, annual growth is estimated to be 7%. In its “2nd International Cruise Conference Report” (Gibson & Papathanassis, 2010), the cruise industry is characterized by relentless growth, even during the financial downturn of recent years. The Cruise Line International Association (2013) has since stated that the cruise industry has enjoyed industry-wide growth, which would continue through 2013 and beyond. CLIA member lines have experienced an average annual growth rate of 7% since 1980, with average yearly occupancies above 100%. A global fleet of 410 cruise ships had been built by 2014 with a capacity of 467,629 beds. Passenger numbers have been estimated to be 21,300,000 in 2013 (CLIA, 2014). In terms of brand diversification of all operations, Carnival Corporation and Royal Caribbean Cruise, Ltd. are the two dominant cruise line companies owing to their large market shares (Cruise Market Watch, 2013).

The rapid development of the cruise industry has had a significant impact upon societies, cultures, economies, and environments (Dowling, 2006). According to the CLIA (2013), 167 new ships will have been built since 2000, representing some of the

most dynamic and innovative design concepts of the industry. A wide range of new destinations has emerged during the extraordinary expansion of the cruise market (Baum, 1993; Orban, 1993; Bull, 1996). There are certain geographical areas of focus as the ships travel throughout the seas, heeding market adjustments and seasonal demands. The current center of the worldwide cruise line industry is the Caribbean, but there are emerging markets such as the Mediterranean, Scandinavia, Asia, Alaska, Africa, Eastern Europe, Northeastern America, Canada, and the American West Coast (*Cruise Industry News* Annual Report, 2007). New ships, global destinations, popular itineraries, and innovative shipboard facilities and activities have driven growth in the number of cruise passengers (CLIA, 2013). However, it also brings challenges of global operation and cultural adaptation to worldwide cruise line operators. Issues brought by such worldwide operation range from time zone differences and language barriers to laws and travel restrictions that vary by country (Veronneau & Roy, 2009).

2.2 Cruising in Asia

The global scope of the cruise industry continues to broaden. The cruise industry sees the potential for continued expansion, both in its traditional markets and in the emerging markets—particularly in Asia (Dowling, 2006). Growth of the Asian market has caused the cruise industry to pay attention to the needs of potential cruisers in Asia

(Hur & Adler, 2013). Currently, there are around 1.2 million Asian cruise passengers (CLIA, 2012). Expectations that the size of the Asian cruise market will expand to 3.7 million by 2017 appear to be within reach (Pholsena, 2013). In Asia, cruise market penetration is a mere .01%, but a market penetration rate in Asia of only one percent represents about 40 million potential passengers—four times as large as the American market, which currently offers about 3% market penetration, or about 10 million passengers (CLIA, 2012).

The global cruise industry is now looking toward Asia as a major growth engine. Emerging markets are crucial to the future of the cruise industry, and new markets are developing quickly in Asia (Christoff, 2013). To tap the fast growing cruise market in Asia, large cruise corporations are planning to expand there. Costa Cruises tapped the Asian market by recently offering two cruise lines including Costa Victoria and Costa Atlantica (Cruise Radio, 2013). Star Cruises has commissioned the construction of a brand new mega-vessel to meet the growing demands of the Asian market, which will be the largest ship permanently home-ported in Asia (Travel Weekly, 2013). In 2015, 52 cruise ships will operate around Asia, with 1,065 scheduled sailings including one of the most talked-about luxury liners, the Quantum of the Seas (Yahoo News, 2015).

2.3 Cruise Product Offerings

The major components of a cruise product are transportation, accommodations, dining, onboard entertainment, recreational activities, ports of call, and shore excursions. Critical to each of these domains is the quality of service delivery, which entails several sets of interactions between individuals or groups of passengers, the various categories of ship service personnel, and the physical aspects of the ship. From this perspective, the cruise line industry is similar to some other tourism sectors such as resorts and theme parks. The quality of each of the product domains and the manner in which they are delivered contribute to guests' perception, enjoyment, and satisfaction with the overall cruising experience (Teye & Leclerc, 1998).

In terms of each product domain, different features and amenities enable each cruise line operator to have unique selling points. The dining domain usually consists of open seating dining, formal nights dining, traditional assigned seating dining, specialty dining, coffee house, and 24-hour food service. TV/radio, direct-dial telephone, mini-bar/refrigerator, and hair dryer are the products usually provided in the accommodations domain. Choices of stateroom type range from interior and ocean view rooms to balcony rooms or suites. Meeting and conference service usually provides customers with a meeting coordinator, meeting space, conference dining, private parties/events, business center services, audio-visual equipment, computer equipment, and email access. Products especially for children and families usually include family

staterooms, reduced cruise rates, babysitting service, cribs, and cartoon movies (CLIA, 2014). There are ample choices of on-board entertainment and activities such as comedy shows, gambling, bars and clubs, and spas and fitness centers (Carnival Cruise Lines, 2014). The spa and wellness product includes aromatherapy, body wraps, mud therapy, massage, and other services. Various services and products are included in sports and fitness, such as cardio equipment, weights, personal trainers, total fitness programs, group fitness classes, yoga/Pilates, jogging track, and basketball and volleyball courts (CLIA, 2014). Products included in shore excursions may include adventure tours, wildlife tours, beach or water-related activities, flightseeing, golf, and snorkeling (Royal Caribbean International, 2014). Table I shows the product offerings of three major CLIA member cruise lines active in Asia.

Table 2.1 Product Offerings of Three Major Cruise Lines Active in Asia

Product Domain	Offering Options	Costa Cruises	Princess Cruises	Royal Caribbean International
Stateroom Amenities	TV/Radio	All	All	All
	CD Player	None	None	All
	In-Stateroom Movies	All	All	All
	iPod Docks/Stereos	None	None	Some
	In-Stateroom Internet Access	All	All	Some
	Private Safe	All	All	All
	Direct Dial Telephone	All	All	All
	Mini-bar/Fridge	All	All	Some
	Hair Dryer	All	All	All
Children and Families	Family Staterooms	All	Some	All
	Reduced Cruise Rates	All	All	All

Product Domain	Offering Options	Costa Cruises	Princess Cruises	Royal Caribbean International
	Babysitting Available	All	All	All
	Cribs Available	All	Some	All
	Organized Age-Specific Programs	All	Some	All
	Games/Contests	All	Some	All
	Organized Parties and Events	All	Some	All
	Organized Sporting Activities	All	Some	All
	Cartoons	All	Some	All
	Movies	All	Some	All
	Educational Programs	Some	Some	All
	Environmental Awareness Programs	Some	Some	Some
	Children-Only Pool	Some	Some	Some
	Children's Playroom	All	Some	All
	Teen Counselors	All	Some	All
	Youth Counselors	All	Some	All
	Teen Center or Disco	All	Some	All
Sports and Fitness	Cardio Equipment	All	All	All
	Weights	All	All	All
	Personal Trainer	All	All	All
	Total Fitness Program	All	All	All
	Group Fitness Classes	All	All	All
	Yoga/Pilates	All	All	All
	Jogging Track	Some	Some	All
	Basketball	Some	Some	Some
	Volleyball	Some	Some	Some
	Multi-use Sports Court	Some	Some	Some
	Rock Climbing Wall	None	None	All
	Paddle Tennis/Ping Pong	All	Some	All
	Bowling Alley	None	None	None
	Miniature Golf	Some	Some	Some
	Water Activities Platform	None	None	None
Discover SCUBA/Resort Course	None	None	All	
SCUBA Certification	None	None	Some	
Clinics/Lessons	Some	Some	Some	

Product Domain	Offering Options	Costa Cruises	Princess Cruises	Royal Caribbean International
	Onboard Pro	Some	None	None
	Snorkeling Lessons	None	Some	All
	Golf Programs	Some	Some	Some
Dining	Traditional Assigned Seating	All	All	All
	Open Seating	None	Some	All
	Formal Nights	All	All	All
	24-Hour Food Service	All	All	All
	Specialty/a la Carte Venues	All	All	All
	Coffeehouse/Patisserie	All	All	All
Meetings and Conferences	Meeting Coordinator	All	All	All
	Meeting Space	All	All	All
	Conference Dining	All	All	All
	Private Party/Events	All	All	All
	Business Center Services	All	Some	All
	Computer Equipment	All	All	All
	Email Access	All	All	All
	Audio Visual Equipment	All	All	All
Special Programs/ Services	Wedding/Honeymoon Packages	All	All	All
	Guest Lectures/Educational Programs	Some	All	Some
	Cell Phone Services	All	All	All
	iPod and/or iPhone Rental	None	None	None
	Special Dietary Needs	All	All	All
	Wheelchair Accessibility	All	All	All
Spa/Wellness	Aromatherapy	All	All	All
	Body Wraps	All	All	All
	Mud Therapy	Some	All	All
	Ionithermie Treatments	All	All	All
	Reflexology	Some	All	All
	Thalassotherapy	Some	Some	Some
	Teeth Whitening	Some	All	All
	Nutritionist	Some	All	All
	Facials	All	All	All
	Massage	All	All	All
	Manicure/Pedicure	All	All	All

Product Domain	Offering Options	Costa Cruises	Princess Cruises	Royal Caribbean International
	Fitness Evaluations	All	All	All
	Steam Room/Sauna	Some	All	Some
	Full Service Beauty Salon	All	All	All
	Jacuzzi/Whirlpool	Some	All	All

Source: *Cruise Lines & Ships*, by Cruise Lines International Association, 2014.

<http://www.cruising.org/vacation/cruise-lines-ships>

Future trends of cruise product offerings include: 1) improved technology to lower costs of onboard communications; 2) more luxury cruise ships and onboard upgrades; 3) growth of multigenerational and celebration travel, as well as social groups; 4) more all-inclusive options and packaging in accommodations, services, and amenities; 5) active vacations with extreme excursions, longer stays in ports for sightseeing and high-energy onboard facilities; 6) exotic locations driving new itinerary competition and cruise ship deployment; and 7) hot destinations of Trans-Pacific, World Cruises, U.S. Rivers, South America, Antarctic, Middle East, Canada/New England, Africa and Exotic Rivers (CLIA, 2014).

2.4 The Chinese Travel Industry

The introduction of the open-door policy in 1978 marks the beginning of modern tourism in China. China now has become a major global market for travel and tourism. Its accession to the World Trade Organization played a critical role in the development of

China's travel industry and contributed to its increasingly important position in global tourism (Wang & Qu, 2002). The Beijing Olympic Games in 2008, the Shanghai Expo in 2010, and other international events further promoted the popularity of China (Travel China Guide, 2013). In its "10th Five-Year Master Plan" (Su, 2001), the China National Tourism Administration (CNTA) announced its determination to make China a "great country of tourism." According to China's recently drafted "12th Five-Year Master Plan" (2011): "It will comprehensively develop domestic tourism, actively develop inbound tourism, and encourage the orderly development of outbound tourism. Equal emphasis is placed on both protection and development of tourism resources. It will strengthen the tourism infrastructure and promote major tourism sites and construction of tourism routes." In recent years, the Chinese government has paid special attention to the tourism industry due to its low resource consumption, abundant job opportunities, and promotion of the development of other industries. The tourism environment of China has improved significantly from 2012. Convenient flights and the high-speed train network make traveling in China faster and more efficient than ever. Also service quality has improved with the growth of tourist volume.

The domestic and outbound tourism continued to grow quickly, while inbound tourism was roughly at the same level as the previous year. However, inbound tourists still reached 132.4 million, bringing revenue of 50 billion dollars. With the rise of personal incomes and living standards, the number of outbound tourists continues to

surge. Chinese people are eager to go sightseeing at overseas destinations including the United States, Russia, France, Australia, Japan, South Korea, Malaysia, Singapore, Thailand, and Maldives. In 2012, the number of outbound tourists was over 83 million, up over 18% from 2011. At present, China has increased the number of permitted overseas destinations for its citizens to 114 countries and regions. Further and sustained growth of outbound tourism is expected. Additionally, with a population of over 1.3 billion, China has an incomparably large domestic tourism market. In the recent decade, domestic tourism has enjoyed a steady increase of approximately 10% each year, contributing more than 4% to the growth of China's GDP, and has had a significant impact upon employment, consumption, and economic development of China (Travel China Guide, 2013).

2.5 Cruising in China

Although China now occupies a barely significant market share, it is expected to be an extremely promising market for cruising in the future (Mondou & Taunay, 2012). China's cruise tourism business is booming with an increasing number of tourists and highly improved harbor infrastructure. In addition to the government's considerable support, increasing market potential and improved infrastructure have all contributed to China's cruise industry development (Want China Times, 2013). Although the industry

began to grow in the 1970s, it only began to gain momentum in 2005, when Chinese nationals were first permitted to board cruises stopping in other countries. Cruises are now becoming one of the fastest growing sectors of domestic tourism. From 2006 to 2012, the number of overseas cruises departing from the Chinese mainland increased from 24 to 170. More than 660,000 cruise tourists took cruises both at home and abroad in 2012, an increase of 500,000 over the 2006 count (CCYIA, 2013). An impressive 79% per year growth rate was achieved with respect to the number of Chinese cruise passengers between 2012 and 2014 (Yahoo News, 2015). According to the latest report from CLIA, 697,000 passengers from mainland China took a cruise in 2014 (CLIA, 2015).

Sixteen of China's 23 main ports have cruise terminals, and international cruise operators are increasingly seeing the potential in the Chinese market. Companies active in China include Royal Caribbean International, Star Cruises, and Costa Cruises. Royal Caribbean formed a strategic partnership with Chinese port operator Shanghai International Port (Group) in 2009 (CNTA, 2010). The Chinese cruise market is expected to become the second largest in the world, ranking only below the United States, by 2017 (Johanson, 2013).

There are four main reasons for China's being a potential new market for the cruise industry: 1) China is a vast market for international tourism, including cruising, with a very large population of 1.3 billion (Mondou & Taunay, 2012); 2) China has a long

coast, including famous ports such as Shanghai, Dalian, and Hong Kong; 3) the Chinese government encourages the development of cruise tourism while maintaining strong regulations (Nyiri, 2008); and 4) cruise lines are looking for new destinations and source markets (Mondou & Taunay, 2012).

The demand for travel among China's ascendant middle and upper classes continues to surge. An anticipated surge in the number of Chinese citizens eager to travel abroad and new high-speed rail links make accessing cruise departure points easier for Chinese customers. Also China's middle- and upper-income classes continue to grow along with the country's general population (Tunney, 2011).

2.6 Chinese Consumer Behavior and Leisure Patterns

Trying to break into the Chinese market represents risks and challenges (Kindergan, 2013). According to the theory of Hofstede's cultural dimensions (Hofstede, 1980), China is a collective society and mainland Chinese are group-oriented. In a study by Mehta, Lalwani, and Ping (2001), Asian consumers are found to be less individualistic and more adherent to social norms than people of other cultures. Thus, Chinese consumers tend to rely more strongly on their social reference group than do Westerners.

Chinese travel activities traditionally have concentrated on historical and cultural attractions. Vacationers are seeking more novelty than they are enhancement of health or

participation in activities (Run et al., 2008). A typical travel pattern of a Chinese middle-class family is to travel with both young and old; they hope to enjoy a quality family time before the older generation gets too old and the younger generation gets too busy with school (Waldmeir, 2013). Chinese people enjoy 104 weekend days and 11 days of vacation. Also, employees have five to fifteen days of paid leave annually (Chen, Lehto, & Cai, 2013). Additionally, Chinese tourists like to purchase electronics and famous-brand-name items available on cruises, for their extended network of friends, family, and acquaintances (Guo, Kim, & Timothy, 2007).

2.7 Cruising Product Preferences

A cruise is a vacation experience that is directly linked to clients' likes and dislikes, but it is not a one-size-fits-all product (Covey, 2002). According to Yi, Day and Cai (2011), Asian cruise travelers are concerned about cruise facilities and have high expectations. Facilities directly affect Asian cruise travelers' satisfaction level and behavioral intention. Taiwanese cruisers prefer large cabin size (Josiam, Huang, Spears, Kennon, & Bahulkar, 2009), good entertainment facilities, and high quality Japanese and Chinese food. Hong Kong cruisers have preferences for attractive entertainment programs as well as sport/fitness, shopping, and childcare facilities (Qu & Ping, 1999).

The determining variables for Hong Kong cruisers are accommodations, entertainment, and food and beverage service.

Costa's President Gianni Onorato notes that there are cultural differences between Chinese and Western guests—onboard entertainment and cuisine choices, for example (Tunney, 2011). Chinese customers are often used to paying little for onboard services such as massages and spa treatments, which are critical factors in the profitability of traditional Western cruise operations. The trade journal *Finance Times* refers to the atmosphere of a Chinese luxury cruise liner as *renao*. This Chinese word means “loud and chaotic,” but it is the essence of having fun to Chinese people—bustling, exciting, and noisy.

For Westerners, drinking is one of the primary reasons for cruising, but Chinese people do not have a “bar culture.” Westerners, however, tend not to shop as much as the Chinese, nor do they spend as much time and money in casinos. Chinese people take delight in shopping and gambling. Zheng, of the Cruise Operators' Association, contends that Chinese cruisers prefer to play mahjong indoors rather than sunbathing on the deck. There are never enough deck chairs on a Western cruise, but Chinese people in general, especially women, do not like to bask (Waldmeir, 2013).

2.8 Cruise Motivations

Based on an exploratory study, Hung and Petrick (2011) developed a cruise motivation scale and examined the role of cruise motivation on travelers' intention to cruise. The motivation scale contains 13 items categorized into four factors: 1) self-esteem & social recognition; 2) escape/relaxation; 3) learning/discovery & thrill; and 4) bonding. Detail measurement items and their relationship with factor categories are presented in Table II. The strongest motivation for cruising was found to be "escape/relaxation." Other motivations were also identified in the Hung & Petrick research. Cruisers also desire "learning/discovery & thrill," "self-esteem/social recognition," and "bonding" when they are onboard.

Table 2.2 Cruise Motivation Measurement Scale

Factors	Items
Self-esteem & social recognition	To do something that impress others
	To help me feel like a better person
	To increase my feelings of self-worth
	To derive a feeling of accomplishment
	To photograph an exotic place to show friends
Escape/relaxation	So that I can be free to do whatever I want
	To escape
	To give my mind a rest
Learning/discovery & thrill	To gain knowledge
	To enjoy activities that provides a thrill
	To experience other cultures

Factors	Items
Bonding	Because my friends/family want to cruise
	To interact with friends/family

Source: Hung, K. & Petrick, J. F. (2011). Why do you cruise? Exploring the motivations for taking cruise holidays and the construction of a cruising motivation scale. *Tourism Management* 32, 386-393.

In a previous study concerning Hong Kong cruise travelers' motivations, major cruising factors were identified as "escape from normal life," "social gathering," and "beautiful environment and scenery" (Qu & Ping, 1999). For Taiwanese cruisers, the core motivating factors are "discovery," "enjoyment," "social/esteem need," "escape," and "family time" (Josiam et al., 2009).

2.9 Demographic Profile of Cruise Travelers

The 2011 cruise market profile study by CLIA found cruisers to include a high proportion of college graduates (76%) and median household incomes around 97,000 dollars. They tend to be middle aged, many are retired, there is an even split by gender, and most are married (CLIA, 2012).

In an ethnic Chinese context, it was found in a study of Hong Kong cruisers that cruise travelers are mainly white-collar workers. Travelers' ages range from 18 to 45 with an annual income from 15,000 dollars to 62,000 dollars (Qu & Ping, 1999). A study to understand Taiwanese cruisers concluded that people who are over the age of 60 and

retired comprise an important segment of the cruise market (Josiam & Huang, 2009). People with these characteristics very often have financial means and time to enjoy a cruise.

CHAPTER 3. METHODOLOGY

3.1. Participants

According to the literature on demographic profiles of cruise travelers, a survey was conducted among potential cruisers with characteristics described by the literature on demographic profiling of cruise travelers. The participants were ethnic Chinese at least 18 years old with a minimum monthly household income of RMB 1,500. A travel agency in Nanjing distributed the on-site questionnaire for the researchers. Nanjing is a major city in east China, where the economic development level is relatively higher than in other areas. The agency is an international travel company with more than 10 years of experience in the field. The travel company sent the on-site survey link through their mailing list from May 1 to May 20 of 2014. Individuals on the mailing list were clients of theirs with travel experience. The survey was sent to a total of 1200 individuals, of whom 277 participated in the study.

3.2. The Survey Instrument

To fully explore Chinese cruisers' preferences for cruise products, the researchers conducted a pilot study to polish the survey design. In the pilot study, a focus group of 10

Chinese students was interviewed to gain their opinions in order to fine-tune the survey design. The students were a convenient sample from Purdue University in West Lafayette, Indiana, in the United States. The interviews were conducted in Chinese.

The questionnaire utilized a professional survey tool, Qualtrics. It was originally designed in English and then translated into Chinese before distribution. No identifying information was put on the survey, in order to protect the privacy of participants. Before distribution of the questionnaires, permission to conduct the survey was obtained from the Institutional Review Board at the researchers' home institution.

The survey instrument consisted of three main sections. Section 1 concerned Chinese travelers' basic experience in cruise ship travel—the number of cruises they had taken. Section 2 consisted of detail questions concerning Chinese travelers' preferences for cruise products, including their general attitude on each components' importance. The product components and items were based on the list of current product offerings by the major cruise lines. All questions consisted of multiple choice or scale rankings. Respondents were provided with a scale of 1 to 5 on questions concerning their product preferences. There is a particular question in Section 2 addressing the motivation of Chinese cruisers. The present study utilized the measurement scale of cruising motivations developed by Hung and Petrick (2011), based on an extensive review of existing literature. The measurement scale was developed by following the procedures recommended by Churchill (1979), deemed to be both valid and reliable (Hung & Petrick,

2011). However, the researchers further developed the scale into a statement of travelers' motivation to take a cruise. In Section 3, social demographic information of respondents was collected, including gender, age, marital status, educational level, and monthly income.

3.3 Statistical Analysis

Data was collected and analyzed using the professional statistics tool Statistical Analysis System, Version 9.3. Several statistical methods were applied for the data analysis. First, descriptive statistics were calculated, including frequencies, means, and standard deviations. Then, one-way ANOVA was performed to examine the relationship between demographic variables and product preferences. Post hoc tests were employed in order to systematically identify group differences. In addition, factor analysis was conducted to identify motivational constructs and thereby better understand travelers' motivations. Regression analysis was applied to explore the relationship between preferences for each product category with the constructed motivational factors. Later, a multiple-dimension scaling model was generated to further explore the relationship among different product items under each product category.

CHAPTER 4. RESULTS AND DISCUSSION

4.1. General Preferences for Cruise Products

4.1.1 Demographic Description of the Sample

The final sample included 232 usable surveys, for a response rate of 19.3%. Table 4.1 provides the demographic profile of the respondents. The study consisted of 43% male and 54% female respondents (unanswered=3%). According to the Tabulation on 2010 Population Census of China, the Chinese population consisted of 51% males and 49% females (National Bureau of Statistics of the People's Republic of China, 2010). Compared to the general Chinese population, the percentage of female respondents is relatively higher than the percentage of male respondents. The majority of the respondents (n=91, 39%) were in the group aged 35-49, followed by the group aged 25-34 (38%), and the group aged 50-64 (16%). Respondents of age group 18-24 were only 5%, and respondents aged over 65 occupied only 1% of total respondents. Statistics from the National Bureau of Statistics (NBS) of China show that 13% of the total population are aged 18-24, 15% are aged 25-34, 26% are in the age group of 35-49, and 16% are aged 50-64 (NBSPRC, 2011).

Regarding marital status, the majority of respondents (N=141, 61%) were married with children. A total of 24% were single and 12% of them were married without children.

Approximately 94% of the respondents had at least some college education, most of whom (N=117, 51%) had earned a bachelor's degree. Only one respondent had an education level lower than high school. Regarding income level, about 37% of the respondents reported a monthly income above RMB 10,000, which equals around USD 1,613. Approximately 36% of the respondents had a monthly income between RMB 5,000 to RMB 10,000, followed by 25% who earned less than RMB 5,000 monthly. Only 14% of respondents had a monthly income higher than RMB 20,000, and 10% of them earn between RMB 15,000 to RMB 20,000. The respondents' income level is relatively low for potential Chinese cruise travelers. Concerning former cruise experiences, 39% indicated that they had previously taken a cruise. Among those who had taken a cruise, 22% of the total respondents had taken only one, 8% had taken two, and 9% had taken more than two cruises. However, the majority (60%) of respondents had never been on a cruise.

The demographic characteristics generally match the demographic profile of the general Chinese population. Respondents essentially represented the potential travelers who may take cruises.

Table 4.1 Demographic Description of Sample (N=232)

Characteristics	Descriptions	N	Statistics (%)
Gender	Male	99	43
	Female	126	54

Characteristics	Descriptions	N	Statistics (%)
	*Unanswered	7	3
Age	18-24	12	5
	25-34	88	38
	35-49	91	39
	50-64	37	16
	65 and above	2	1
	*Unanswered	2	1
Marital Status	Single	55	24
	Married without children	27	12
	Married with children	141	61
	Separate/Divorced	5	2
	Widowed	1	0
	*Unanswered	3	1
Education Level	Lower than High School	1	0
	High School	11	5
	Associate Degree	41	18
	Bachelor's Degree	117	51
	Master's Degree	52	22
	Doctorate Degree	7	3
	*Unanswered	3	1
Monthly Income	Under RMB5000	59	26
	RMB5000-10000	84	36
	RMB10000-15000	31	13
	RMB15000-20000	23	10
	Over RMB20000	32	14
	*Unanswered	3	1
Former Experiences	None	140	60
	Only Once	52	22
	Twice	18	8
	More than Twice	20	9
	*Unanswered	2	1

**Unanswered: This category indicates that this question was not answered by those respondents.*

4.1.2 General Product Preferences

Respondents were asked about the importance of eight general cruise product components. Table 4.2 shows the means and standard deviation of the responses concerning each component. It indicates that respondents regard almost all of the major cruise components as very important except social interaction. Social interaction had an obvious lower mean of 3.86 compared to the other components. Service quality was scored the highest (mean=4.57), followed by accommodations (mean=4.37) and dining (mean=4.36). Results indicate that service quality, accommodations, and dining are the three most important cruise product components. The emphasis of service quality corresponds with traditional Western cruisers (Teye & Leclerc, 1998). Accommodations and food were also found to be two major concerns of Chinese outbound tourists in a previous study (Li, Lai, Harrill, Kline, and Wang, 2011). The quality of accommodation and dining domains, as well as the manner in which services are delivered together contribute to the guests' satisfaction with the cruising experience. Social interaction is the least important as viewed by most travelers. This is consistent with former study that "build networks and participate in social activities" was not an expectation of Chinese cruisers. However, cruises do provide a good networking platform in mature markets (Fan & Hsu, 2014).

Table 4.2 Importance of General Cruise Product Domains

Product Components	Means	Standard Deviation
Accommodations	4.37	0.86
Dining	4.36	0.88
Onboard Entertainment	4.01	0.99
Recreational Activities	4.12	0.88
Ports of Call	4.12	0.94
Shore Excursions	4.11	0.89
Service Quality	4.57	0.84
Social Interaction	3.86	0.94

Concerning their likelihood of taking a cruise in the next two years, Table 4.3 shows that 38% of respondents indicated they will probably take a cruise in the upcoming two years; and 21% indicated a very high likelihood. Only 4% expressed that they are very unlikely to take a cruise in the upcoming two years, indicating the huge potential of the cruise market in China. Results show that most people are likely or very likely to take a cruise during the two-year timeframe. Only a minority of travelers is very unlikely to take a cruise in the coming two years. Results further confirmed the significant potential of the Chinese cruise market (Dowling, 2006; Mondou & Taunay, 2012).

Table 4.3 Likelihood of Taking a Cruise in the Next Two Years (N=232)

Likelihood	N	Statistics (%)
Very Unlikely	9	4
Unlikely	32	14
Neutral	52	22
Likely	87	38

Likelihood	N	Statistics (%)
Very Likely	49	21
*Unanswered	3	1

**Unanswered: This category indicates that this question was not answered by those respondents.*

The present study investigated detailed cruise product preferences that were developed from the current product offerings of major CLIA member cruise lines active in Asia. Table 4.4 lists the investigated product items and respondents' preferences for them.

Concerning Chinese travelers' interests in dining, traditional Chinese food (mean=3.95) and other Asian food (mean=3.93) types are preferred, whereas international foods (mean=3.81) are less popular. Chinese travelers prefer buffet (mean=4.03) compared to formal dining (mean=3.93) or 24-hour room service (mean=3.70).

In the spa or wellness category, thalassotherapy (mean=3.78) and ionithermie treatments (mean=3.74) were scored relatively high. However, massage (mean=3.22) and manicure/pedicure (mean=3.21) are least welcomed by Chinese travelers. In the sports or fitness category, clinics (mean=4.07) are very much of interested to travelers, followed by snorkeling lessons (mean=3.89) and water activities platform (mean=3.82). This corresponds with previous study that Chinese tourists are likely to expect and welcome water-related activities as part of the cruise experience (Fu, Huang, & Cai, 2012).

Regarding the onboard shopping product preference, travelers are most interested in souvenirs (mean=3.55), followed by photos (mean=3.48) and clothes/shoes (mean=3.34). Live music (mean=4.04), stage shows (mean=4.01) and comedy shows (mean=3.98) are the three most interesting onboard entertainment activities for Chinese travelers. Casino (mean=3.11) scored as the lowest among all entertainment activities. A previous study suggests that the low rating of casino may be explained by the fact that gambling in public is strictly prohibited by law in mainland China, and it is also perceived as a negative activity in Chinese society (Fan & Hsu, 2014).

Concerning travel companion preferences, a spouse is the first choice of Chinese travelers with a mean of 3.65. Friends (mean=3.30) and children (mean=3.30) are also preferred choice of the travelers, while a business client (mean=2.06) does not seem to be an ideal companion with whom to take a cruise.. Corresponding to the frequency and percentage statistics, most travelers are interested in taking a cruise in the next two years with a mean of 3.59.

Ports with access to nature (mean=4.62) are very attractive to Chinese travelers. Ports with historical sites and cultural attractions (mean=4.31 and 4.24, respectively) score high, as well. Consistent with a previous study, visiting historical and cultural attractions are traditional and popular Chinese travel activities (Run et al., 2008). Western Europe (mean=4.10) is a dominantly popular destination of travelers, while the Mediterranean (mean=3.91) and Caribbean (mean=3.77) are also popular among Chinese

travelers. Southeast Asia (mean=3.46) is the least preferred choice, which indicates the novelty-seeking needs of Chinese travelers (Run et al., 2008). Chinese cruisers prefer destinations in Western Europe, Mediterranean, and Caribbean area, which are a considerable distance from home.

Table 4.4 General Product Item Preferences

Product Components	Product Items	Means	Standard Deviation
Food Types	Traditional Chinese Food	3.95	0.93
	Other Asian Food	3.93	0.91
	International Food	3.81	0.97
Dining Service	Buffet	4.03	0.88
	Formal Dinner	3.93	0.90
	24-Hour Room Service	3.70	0.99
Spa/Wellness Programs	Aromatherapy	3.62	0.98
	Ionithermie Treatments	3.74	0.92
	Body Wraps	3.71	0.94
	Mud Therapy	3.51	0.96
	Reflexology	3.63	0.95
	Thalassotherapy	3.78	0.96
	Jacuzzi or Whirlpool	3.65	0.99
	Nutritionist	3.45	0.96
	Facials	3.47	2.18
	Manicure/Pedicure	3.21	1.00
	Massage	3.22	1.02
	Fitness Evaluations	3.58	1.00
	Full Service Beauty Salon	3.37	1.00
	Teeth Whitening	3.30	0.99
	Steam Room or Sauna	3.54	1.02
Sports/Fitness Programs	Cardio Equipment	3.75	0.88
	Weights	3.32	0.95
	Personal Trainer	3.48	1.00
	Yoga/Pilates	3.79	0.90

Product Components	Product Items	Means	Standard Deviation
	Jogging Track	3.68	0.93
	Basketball	3.22	1.05
	Volleyball	3.14	1.04
	Paddle Tennis/Ping Pong	3.33	1.00
	Water Activities Platform	3.82	0.97
	Multi-use Sports Court	3.38	0.97
	Rock Climbing Wall	3.47	0.98
	Bowling Alley	3.57	0.94
	Snorkeling Lessons	3.89	1.00
	Golf Programs	3.44	0.97
	Clinics	4.07	0.83
Ports of Call	Historical	4.31	0.81
	Cultural	4.24	0.80
	Natural	4.62	0.65
Onboard Shopping Products	Photos	3.48	1.05
	Souvenirs	3.55	0.95
	Clothes/Shoes	3.34	0.98
	Jewelry/Accessories	3.05	1.02
	Beauty & Fragrance	3.23	1.02
	Electronics	3.20	1.01
	Liquor/Cigarettes	3.02	1.10
Onboard Entertainment Activities	Stage Show	4.01	0.83
	Comedy Show	3.98	0.81
	Games	3.90	0.83
	Movie Theater	3.91	0.85
	Karaoke	3.64	0.97
	Live Music	4.04	0.82
	Art Gallery	3.85	0.83
	Library	3.82	0.86
	Sports Bar	3.55	0.95
	Night Club	3.31	1.07
	Casino	3.11	1.18
Video Games	3.19	1.15	
Travel Companion	Friends	3.30	1.06
	Parents	3.03	1.06
	Children	3.30	1.25
	Spouse	3.65	1.10

Product Components	Product Items	Means	Standard Deviation
	Business Clients	2.06	1.07
Likelihood in Two Years	Travel	3.59	1.09
Next Destination	Southeast Asia	3.46	1.04
	Pacific	3.65	0.97
	Mediterranean	3.91	1.00
	Caribbean	3.77	1.13
	Western Europe	4.10	0.90

4.2 Relationship between Product Preferences and Demographic Variables

4.2.1 Product Preferences and Gender

Table 4.5 describes One-way ANOVA results between gender and product category preferences. Males were significantly higher statistically than females in preference for sports or fitness programs (mean=3.72, F value=11.20***) and onboard shopping (mean=3.42, F value=7.15**).

Results indicate that male travelers were generally more interested in sports and fitness programs and tended to be more aware of keeping fit while onboard, compared to female travelers. In addition, men were shown to prefer a convenient onboard shopping experience more than women did. This corresponds with previous studies concerning gender difference in tourist shopping behavior (Litterell, Anderson, & Brown, 1993; Lehto, Cai, O'Leary, & Huan, 2004), which have suggested that women hold opposite values pertaining to shopping compared to men. Women enjoy the shopping process of

researching and browsing choices more than men do (Li, Wen, & Leung, 2011). Women's low rating of onboard shopping may be explained by the limited onboard choices compared to shops at cruise destinations, while male travelers prefer the convenience of onboard shopping.

Table 4.5 One-way ANOVA: Gender and Product Category Preferences

		C1: Food Type			C2: Dining Service		
	No.	Mean	Std	F value	Mean	Std	F value
Male	99	3.82	0.70	2.36	3.92	0.66	0.61
Female	126	3.95	0.59		3.86	0.62	
		C3: Spa/Wellness Program			C4: Sports/Fitness Program		
	No.	Mean	Std	F value	Mean	Std	F value
Male	99	3.45	0.68	1.68	3.72	0.61	11.20***
Female	126	3.57	0.69		3.44	0.67	
		C5: Ports of Call			C6: Onboard Shopping		
	No.	Mean	Std	F value	Mean	Std	F value
Male	99	4.44	0.67	1.19	3.42	0.67	7.15**
Female	126	4.35	0.57		3.15	0.82	
		C7: Onboard Entertainment			C8: Travel Companionship		
		Mean	Std	F value	Mean	Std	F value
Male	99	3.76	0.59	2.03	3.08	0.81	0.03
Female	126	3.65	0.56		3.06	0.66	
		C9: Likelihood in Two Years			C10: Next Destination		
	No.	Mean	Std	F value	Mean	Std	F value
Male	99	3.64	1.07	0.32	3.85	0.64	1.65
Female	126	3.56	1.10		3.73	0.74	

Note: *** $p < 0.001$, ** $p < 0.01$, * $p < 0.05$

a, b: Means with different letters are significantly different at 0.05 level.

Regarding sports/fitness programs and onboard shopping, the detail differences in preferences between male and female travelers are revealed by One-way ANOVA results (See Table 4.6). Male travelers prefer the following sports/fitness programs more than females do: weights (F value=26.86***), personal trainer (F value=3.93*), basketball (F value=30.69***), volleyball (F value=16.23***), paddle tennis/ping pong (F value=12.78***), multi-use sports court (F value=9.20**), and bowling alley (F value=4.96*). While female travelers were significantly higher than males in their preference for yoga or Pilates (F value=10.77**), male travelers were shown to be far more interested in sports/fitness programs than females.

Concerning male travelers' onboard shopping preferences, men were significantly higher than women in electronics (F value=21.78***) and liquor/cigarettes (F value=21.93***). This explains male travelers' preference in onboard shopping above. Onboard shops provide males an easy and direct way to purchase electronics, liquor, or cigarettes. This also corresponds to previous literature suggesting that Chinese tourists prefer purchasing electronics and famous brand-name items. These items were usually gifts for an extended network of friends, family, and acquaintances (Guo, Kim, & Timothy, 2007).

Table 4.6 One-way ANOVA: Product Item Preferences of Gender Group in Sports/Fitness Program and Onboard Shopping

Product Category	Product Item	Male Mean	Female Mean	F value
C4: Sports/Fitness Program	Cardio Equipment	3.88	3.67	3.42
	Weights	3.69	3.08	26.86***
	Personal Trainer	3.65	3.38	3.93*
	Yoga/Pilates	3.56	3.95	10.77**
	Jogging Track	3.78	3.60	2.05
	Basketball	3.65	2.93	30.69***
	Volleyball	3.48	2.94	16.23***
	Paddle Tennis/Ping Pong	3.62	3.16	12.78***
	Water Activities Platform	3.93	3.76	1.67
	Multi-use Sports Court	3.62	3.25	9.20**
	Rock Climbing Wall	3.61	3.40	2.43
	Bowling Alley	3.74	3.46	4.96*
	Snorkeling Lessons	3.95	3.87	0.32
	Golf Programs	3.57	3.39	2.02
Clinics	4.13	4.02	0.94	
C6: Onboard Shopping	Photos	3.54	3.38	1.31
	Souvenirs	3.67	3.43	3.44
	Clothes/Shoes	3.43	3.28	1.41
	Jewelry/Accessories	3.10	3.02	0.41
	Beauty & Fragrance	3.21	3.25	0.06
	Electronics	3.56	2.96	21.78***
	Liquor/Cigarettes	3.42	2.77	21.93***

Note: ***p<0.001, **p<0.01, *p<0.05

4.2.2 Product Preferences and Age

Only two respondents were older than 65, so these two respondents' surveys were combined with the group in the ages of 50-64. As shown in Table 4.7, travelers from

25-34 years of age were significantly higher statistically than travelers aged 50 and above in preference for spa/wellness programs (mean=3.69, F value=7.03***). In addition, travelers in the group aged 18-24 were significantly higher than group 50 and above in the likelihood of cruising sometime during the next two years (mean=3.83, F value=2.73*). Results indicate that young and middle-aged Chinese travelers were more interested in the spa/wellness program than older passengers. This could be because of their high pressure, so they desire a relaxation experience from the cruise. Also, young travelers were shown to have a high likelihood of taking a cruise in the following two years. People in that age range are generally more energetic, curious, and novelty-seeking than older travelers. Unlike Taiwanese cruisers, who are usually over the age of 60 and retired (Josiam & Huang, 2009), there is a cruise trend toward young travelers in mainland China. Travelers aged 50 and above show a very low likelihood to cruise in the next two years.

Table 4.7 One-way ANOVA: Age and Product Category Preferences

	No.	C1: Food Type			C2: Dining Service		
		Mean	Std	F value	Mean	Std	F value
18-24	12	3.83	0.76	1.69	4.05	0.53	1.02
25-34	88	3.90	0.64				
35-49	91	3.98	0.58				
50 and above	39	3.71	0.74				

	C3: Spa/Wellness Program				C4: Sports/Fitness Program		
	No.	Mean	Std	F value	Mean	Std	F value
18-24	12	3.45	0.89	7.03***	3.57	0.66	1.88
25-34	88	3.69 ^a	0.66		3.62 ^a	0.63	
35-49	91	3.54	0.64		3.60	0.68	
50 and above	39	3.11 ^b	0.64		3.33	0.66	
	C5: Ports of Call				C6: Onboard Shopping		
	No.	Mean	Std	F value	Mean	Std	F value
18-24	12	4.28	0.94	0.75	3.38	1.07	0.23
25-34	88	4.37	0.56		3.28	0.72	
35-49	91	4.46	0.59		3.27	0.81	
50 and above	39	4.32	0.67		3.18	0.71	
	C7: Onboard Entertainment				C8: Travel Companionship		
	No.	Mean	Std	F value	Mean	Std	F value
18-24	12	3.81	0.75	0.61	2.64	0.75	1.49
25-34	88	3.71	0.54		3.08	0.77	
35-49	91	3.70	0.59		3.11	0.71	
50 and above	39	3.59	0.58		3.08	0.66	
	C9: Likelihood in Two Years				C10: Next Destination		
	No.	Mean	Std	F value	Mean	Std	F value
18-24	12	3.83 ^a	1.34	2.73*	4.03	0.70	0.77
25-34	88	3.52	0.99		3.77	0.73	
35-49	91	3.78	1.02		3.79	0.73	
50 and above	39	3.23 ^b	1.27		3.69	0.54	

Note: ***p<0.001, **p<0.01, *p<0.05

a, b: Means with different letters are significantly different at 0.05 level.

One-way ANOVA results below show that there were significant differences between those aged 50 and older, and those aged 25-34, in product item preferences within the spa/wellness program category. Age group 25-34 were significantly higher than those aged 50 and older in aromatherapy (F value=3.48*), ionithermie treatments (F value=3.26*), reflexology (F value=5.87***), thalassotherapy (F value=5.85***),

Jacuzzi or whirlpool (F value=3.80*), manicure/pedicure (F value=6.61***), massage (F value=2.89*), fitness evaluations (F value=3.76*), full service beauty salon (F value=7.21***), and teeth whitening (F value=5.89***). Young travelers were thus shown to be as interested in the various wellness product choices as were older cruisers, especially in relaxation and beauty programs.

Table 4.8 One-way ANOVA: Product Item Preferences of Age Group in Spa/Wellness Program

Product Category	Product Item	25-34 Mean	50 and above Mean	F value
C3: Spa/Wellness Program	Aromatherapy	3.73	3.21	3.48*
	Ionithermie Treatments	3.90	3.38	3.26*
	Body Wraps	3.82	3.46	1.72
	Mud Therapy	3.64	3.26	1.37
	Reflexology	3.82	3.10	5.87***
	Thalassotherapy	3.95	3.23	5.85***
	Jacuzzi or Whirlpool	3.86	3.26	3.80*
	Nutritionist	3.59	3.21	1.57
	Facials	3.48	2.92	1.37
	Manicure/Pedicure	3.44	2.64	6.61***
	Massage	3.45	2.95	2.89*
	Fitness Evaluations	3.78	3.18	3.76*
	Full Service Beauty Salon	3.67	2.82	7.21***
	Teeth Whitening	3.56	2.79	5.89***
Steam Room or Sauna	3.70	3.18	2.42	

Note: ***p<0.001, **p<0.01, *p<0.05

4.2.3 Product Preferences and Marital Status

Only one respondent was widowed, so this respondent's survey was combined with the divorced group. The One-way ANOVA test for marital status and product category preferences are shown in Table 4.9. No significant variation was shown on the ANOVA test corresponding to marital status and product category preferences.

Table 4.9 One-way ANOVA: Marital Status and Product Category Preferences

		C1: Food Type			C2: Dining Service		
	No.	Mean	Std	F value	Mean	Std	F value
Single	55	3.96	0.62	0.36	3.99	0.69	1.84
Married without children	27	3.90	0.51		3.79	0.57	
Married with children	141	3.86	0.67		3.85	0.63	
Divorced/Widowed	6	4.00	0.76		4.33	0.52	
		C3: Spa/Wellness Program			C4: Sports/Fitness Program		
	No.	Mean	Std	F value	Mean	Std	F value
Single	55	3.71	0.73	2.46	3.68	0.56	1.04
Married without children	27	3.60	0.64		3.47	0.67	
Married with children	141	3.43	0.65		3.52	0.68	
Divorced/Widowed	6	3.63	1.10		3.73	0.91	
		C5: Ports of Call			C6: Onboard Shopping		
	No.	Mean	Std	F value	Mean	Std	F value
Single	55	4.49	0.52	1.48	3.31	0.80	0.14
Married without children	27	4.26	0.65		3.23	0.53	
Married with children	141	4.39	0.61		3.25	0.78	
Divorced/Widowed	6	4.06	1.24		3.36	1.21	
		C7: Onboard Entertainment			C8: Travel Companionship		
	No.	Mean	Std	F value	Mean	Std	F value
Single	55	3.80	0.53	1.17	2.91	0.85	1.57
Married without children	27	3.58	0.62		3.02	0.70	
Married with children	141	3.67	0.56		3.13	0.67	
Divorced/Widowed	6	3.85	1.07		3.37	0.90	

	No.	C9: Likelihood in Two Years			C10: Next Destination		
		Mean	Std	F value	Mean	Std	F value
Single	55	3.60	1.05	0.06	3.90	0.62	1.41
Married without children	27	3.56	1.16		3.90	0.61	
Married with children	141	3.60	1.07		3.71	0.74	
Divorced/Widowed	6	3.43	1.63		3.90	0.70	

Note: *** $p < 0.001$, ** $p < 0.01$, * $p < 0.05$

a, b: Means with different letters are significantly different at 0.05 level.

4.2.4 Product Preferences and Educational Level

Respondents' education levels of high school and lower were combined due to a limited sample size, as were respondents with master's or doctoral degrees. As shown in Table 4.10, travelers with the highest education level scored significantly higher than the lowest group both in ports of call (F value=4.15**) and in onboard entertainment (F value=3.45*). Results indicate a difference in choosing port types and entertainment activities among people with different educational levels.

Table 4.10 One-way ANOVA: Educational Level and Product Category Preferences

	No.	C1: Food Type			C2: Dining Service		
		Mean	Std	F value	Mean	Std	F value
High School and Lower	12	3.83	0.92	0.40	3.58	0.83	3.17
Associate Degree	41	3.81	0.57		3.68	0.59	
Bachelor's Degree	117	3.90	0.66		3.96	0.66	
Master's or Doctorate	59	3.95	0.61		3.95	0.55	

		C3: Spa/Wellness Program			C4: Sports/Fitness Program		
	No.	Mean	Std	F value	Mean	Std	F value
High School and Lower	12	3.36	0.68	1.22	3.44	0.59	1.31
Associate Degree	41	3.41	0.62				
Bachelor's Degree	117	3.60	0.74				
Master's or Doctorate	59	3.46	0.63				
		C5: Ports of Call			C6: Onboard Shopping		
	No.	Mean	Std	F value	Mean	Std	F value
High School and Lower	12	3.92 ^b	1.06	4.15**	3.23	0.36	0.96
Associate Degree	41	4.27	0.51				
Bachelor's Degree	117	4.46	0.56				
Master's or Doctorate	59	4.49 ^a	0.64				
		C7: Onboard Entertainment			C8: Travel Companionship		
	No.	Mean	Std	F value	Mean	Std	F value
High School and Lower	12	3.31 ^b	0.35	3.45*	3.01	0.83	1.98
Associate Degree	41	3.59	0.52				
Bachelor's Degree	117	3.70	0.57				
Master's or Doctorate	59	3.83 ^a	0.63				
		C9: Likelihood in Two Years			C10: Next Destination		
	No.	Mean	Std	F value	Mean	Std	F value
High School and Lower	12	3.33	0.89	2.57	3.64	0.61	1.66
Associate Degree	41	3.31	1.12				
Bachelor's Degree	117	3.57	1.07				
Master's or Doctorate	59	3.87	1.07				

Note: ***p<0.001, **p<0.01, *p<0.05

a, b: Means with different letters are significantly different at 0.05 level.

Table 4.11 describes the results of the One-way ANOVA test for each type of port and each entertainment activity. In port types, travelers with master's or doctoral degrees were significantly higher than those respondents with high school or lower in preference for ports with historical (F value=2.83*) and cultural attractions (F value=2.67*). This

indicates that travelers with certain education levels prefer culture- or history-related sites. It also corresponds with literature suggesting that visiting historical and cultural attractions are traditional Chinese travel activities. (Run et al., 2008). In onboard entertainment, tourists of the highest educational level scored significantly higher than tourists with the lowest levels of education, in enjoying stage shows (F value=2.82*), games (F value=4.96*), live music (F value=8.36**), casino (F value=3.12*), and video games (F value=7.05**).

Table 4.11 One-way ANOVA: Product Item Preferences of Education Group in Ports of Call and Onboard Entertainment

Product Category	Product Item	Master's or Doctorate Mean	High School and Lower Mean	F value
C5: Ports of Call	Historical	4.19	3.75	2.83*
	Cultural	4.07	3.83	2.67*
	Natural	4.55	4.17	0.27
C7: Onboard Entertainment	Stage Show	4.12	3.36	2.82*
	Comedy Show	3.95	3.67	0.71
	Games	4.07	3.50	4.96*
	Movie Theater	4.00	3.50	1.27
	Karaoke	3.64	3.42	0.45
	Live Music	4.24	3.50	8.36**
	Art Gallery	4.00	3.33	2.21
	Library	3.83	3.33	1.90
	Sports Bar	3.53	3.36	0.90
	Night Club	3.58	3.00	1.70
	Casino	3.51	2.83	3.12*
	Video Games	3.52	2.83	7.05**

4.2.5 Product Preferences and Income

Only one cruise domain was shown to be as statistically significant as income (See Table 4.12). Travelers who had a monthly income from RMB 15,000-20,000 (mean=4.22, F value=6.53***) were more likely to take a cruise in the next two years than those whose income level was under RMB 5,000 or RMB 5,000-10,000.

Results correspond to a previous study in that income is an effective predictor of travel spending (Lehto et al., 2004). In the present study, a relationship was shown between income levels and cruise likelihood. The lowest monthly income group has a lower likelihood of taking a cruise in the upcoming two years than more affluent travelers. Travelers with a monthly income of RMB 5,000-10,000 are less likely to cruise in the next two years than those with an income level of RMB 15,000-20,000. High-income level travelers tend to cruise more often and have more interests in cruising in the near future.

Table 4.12 One-way ANOVA: Monthly Income and Product Category Preferences

Monthly Income	No.	C1: Food Type			C2: Dining Service		
		Mean	Std	F value	Mean	Std	F value
Under RMB 5,000	59	3.81	0.58	0.44	3.88	0.58	0.94
RMB 5,000-10,000	84	3.92	0.61		3.85	0.61	
RMB 10,000-15,000	31	3.90	0.69		3.81	0.59	
RMB 15,000-20,000	23	3.98	0.77		4.11	0.85	
Over RMB 20,000	32	3.93	0.71		3.92	0.68	

		C3: Spa/Wellness Program			C4: Sports/Fitness Program		
	No.	Mean	Std	F value	Mean	Std	F value
Under RMB 5,000	59	3.63	0.70	1.50	3.60	0.60	1.06
RMB 5,000-10,000	84	3.44	0.63				
RMB 10,000-15,000	31	3.39	0.62				
RMB 15,000-20,000	23	3.72	0.92				
Over RMB 20,000	32	3.52	0.68				
		C5: Ports of Call			C6: Onboard Shopping		
	No.	Mean	Std	F value	Mean	Std	F value
Under RMB 5,000	59	4.32	0.67	1.75	3.25	0.82	0.17
RMB 5,000-10,000	84	4.47	0.49				
RMB 10,000-15,000	31	4.22	0.80				
RMB 15,000-20,000	23	4.57	0.43				
Over RMB 20,000	32	4.33	0.69				
		C7: Onboard Entertainment			C8: Travel Companionship		
	No.	Mean	Std	F value	Mean	Std	F value
Under RMB 5,000	59	3.61	0.56	2.15	2.91	0.80	1.32
RMB 5,000-10,000	84	3.63	0.50				
RMB 10,000-15,000	31	3.69	0.58				
RMB 15,000-20,000	23	3.93	0.54				
Over RMB 20,000	32	3.84	0.76				
		C9: Likelihood in Two Years			C10: Next Destination		
	No.	Mean	Std	F value	Mean	Std	F value
Under RMB 5,000	59	3.19 ^b	1.06	6.53***	3.73	0.74	2.10
RMB 5,000-10,000	84	3.47 ^b	1.08				
RMB 10,000-15,000	31	3.71	1.10				
RMB 15,000-20,000	23	4.22 ^a	0.80				
Over RMB 20,000	32	4.08	0.93				

Note: ***p<0.001, **p<0.01, *p<0.05

a, b: Means with different letters are significantly different at 0.05 level.

4.2.6 Product Preferences and Experience

Since only 18 travelers had cruised twice and only 20 had cruised more than twice, these two groups were combined. One-way ANOVA was conducted to identify the

statistical differences in product category preferences in relation to former cruise experience. As shown in Table 4.13, people who had taken more than one cruise scored significantly higher in onboard shopping than those who had taken only one cruise (mean=3.45, F value=3.68*), and higher than novice cruisers in onboard entertainment (mean=3.88, F value=3.63*). Additionally, experienced cruisers who had taken more than one cruise (mean=4.20) scored higher than novice cruisers (mean=3.37) in the likelihood of cruising in the next two years (F value=10.19***). Travelers who had taken more than one cruise were more interested in onboard shopping experiences and entertainment activities than were those who had taken only one cruise or none. Experienced cruisers showed a high tendency of repeat travel within a two-year timeframe.

Table 4.13 One-way ANOVA: Experience and Product Category Preferences

		C1: Food Type			C2: Dining Service		
	No.	Mean	Std	F value	Mean	Std	F value
None	140	3.91	0.56	0.34	3.90	0.58	0.12
Once	52	3.91	0.79		3.86	0.77	
More than Once	38	3.82	0.73		3.86	0.65	
		C3: Spa/Wellness Program			C4: Sports/Fitness Program		
	No.	Mean	Std	F value	Mean	Std	F value
None	140	3.53	0.69	0.73	3.54	0.59	0.18
Once	52	3.43	0.74		3.58	0.76	
More than Once	38	3.59	0.63		3.60	0.76	
		C5: Ports of Call			C6: Onboard Shopping		
	No.	Mean	Std	F value	Mean	Std	F value
None	140	4.45	0.53	2.82	3.28	0.68	3.68*
Once	52	4.36	0.61		3.09 ^b	0.90	
More than Once	38	4.19	0.87		3.45 ^a	0.87	

		C7: Onboard Entertainment			C8: Travel Companionship		
		Mean	Std	F value	Mean	Std	F value
None	140	3.62 ^b	0.53	3.63*	3.01	0.72	1.09
Once	52	3.76	0.60		3.18	0.66	
More than Once	38	3.88 ^a	0.68		3.11	0.83	
	No.	C9: Likelihood in Two Years			C10: Next Destination		
		Mean	Std	F value	Mean	Std	F value
None	140	3.37 ^b	1.04	10.19***	3.75	0.71	1.44
Once	52	3.74	1.12		3.72	0.76	
More than Once	38	4.20 ^a	0.94		3.95	0.60	

Note: *** $p < 0.001$, ** $p < 0.01$, * $p < 0.05$

a, b: Means with different letters are significantly different at 0.05 level.

Table 4.14 describes the One-way ANOVA results of the product item preferences in onboard shopping and onboard entertainment. Concerning onboard shopping, travelers who had cruised more than once scored significantly higher in jewelry/accessories purchasing than those who had cruised only once (F value=4.92**). This corresponds with a previous study that Chinese tourists generally desire luxury shopping experiences (Guo, Kim, & Timothy, 2007). In the onboard entertainment domain, cruisers who had cruised more than once were more interested than novice cruisers in comedy shows (F value=3.18*), movie theater (F value=3.24*), and casino (F value=4.25*). This could be because experienced cruisers have become familiar with onboard services and activities and may consequently spend more time in the casino, as well as watching comedies and movies.

Table 4.14 One-way ANOVA: Product Item Preferences of Experience Group in Onboard Shopping and Onboard Entertainment

Product Category	Product Item	Once Mean	More than once Mean	F value
C6: Onboard Shopping	Photos	3.29	3.66	1.30
	Souvenirs	3.49	3.71	0.68
	Clothes/Shoes	3.22	3.37	0.53
	Jewelry/Accessories	2.75	3.42	4.92**
	Beauty & Fragrance	3.04	3.53	2.49
	Electronics	2.92	3.29	2.63
	Liquor/Cigarettes	2.86	3.18	0.95
C7: Onboard Entertainment	Stage Show	3.93	4.21	2.29
	Comedy Show	3.88	4.19	3.18*
	Games	3.81	4.03	2.20
	Movie Theater	3.82	4.21	3.24*
	Karaoke	3.65	3.74	0.20
	Live Music	3.95	4.24	2.49
	Art Gallery	3.77	4.13	2.85
	Library	3.77	3.97	0.84
	Sports Bar	3.53	3.55	0.01
	Night Club	3.25	3.50	0.84
	Casino	2.92	3.45	4.25*
	Video Games	3.08	3.38	1.68

Note: *** $p < 0.001$, ** $p < 0.01$, * $p < 0.05$

In summary, Research Question 2 was answered: There is a relationship between product preferences and demographic variables. The five significantly related demographic variables are: gender, age, educational level, income, and previous cruising experience.

4.3 Relationship between Product Preferences and Motivational Factors

4.3.1 Factor Structure of Cruise Motivation Typology

An exploratory factor analysis with a varimax rotation was performed and three motivational factors were identified: 1) self-esteem & social recognition; 2) escape/relaxation & learning/discovery; and 3) bonding (See Table 4.12). As reported in Table 4.15, individual items from three separate factors had Eigen values greater than 1, which explained 94% of the variance. After factor analysis, a reliability test was conducted to find satisfactory reliabilities for each motivational factor in which Cronbach's alpha was used. The alpha coefficients for each factor in the present study are presented in Table 4.12. The Cronbach's alpha coefficients for Factor 1, Factor 2, and Factor 3 were between 0.81 to 0.87, indicating satisfactory levels of reliability.

Results of factor analysis showed that the items originally from categories "escape & relaxation" and "learning/discovery & thrill" were grouped together as one factor. However, the item "Taking a cruise allows me to escape" showed a relatively low loading value compared with other items. The researcher decided that the item could be grouped into Factor 1 because it had marginal loading and it strongly corresponded with the escape motivation. Therefore, Factor 1 was named the "escape/relaxation & discovery" motivation.

Factor 2 contained five original items, consistent with the scale previously

developed by Hung and Petrick (2011). Therefore, Factor 2 remained the "self-esteem & social recognition" motivation.

Factor 3 contained the two items that represent travelers' motivation for interacting with family or friends on a cruise ship (Hung & Petrick, 2011). Therefore, Factor 3 was named the "bonding" motivation.

Table 4.15 Exploratory Factor Analysis for Cruise Motivations

	Loadings	Reliability
<i>Factor 1: Escape/ relaxation & discovery</i> (Variance=4.788)		0.85
Taking a cruise allows me to give my mind a rest.	0.81	
Taking a cruise allows me to be free to do whatever I want.	0.75	
Taking a cruise allows me to experience other cultures.	0.71	
Taking a cruise allows me to gain knowledge.	0.64	
Taking a cruise allows me to enjoy activities that provides a thrill.	0.61	
Taking a cruise allows me to escape.	0.49	
<i>Factor 2: Self-esteem & social recognition</i> (Variance=1.828)		0.87
Taking a cruise allows me to increase my feelings of self-worth.	0.79	
Taking a cruise allows me to derive a feeling of accomplishment.	0.77	
Taking a cruise allows me to help me feel like a better person.	0.75	
Taking a cruise allows me to photograph an exotic place to show friends.	0.70	
Taking a cruise allows me to do something that impresses others.	0.66	
<i>Factor 3: Bonding</i> (Variance=0.796)		0.81

	Loadings	Reliability
Taking a cruise allows me to interact with friends/family.	0.72	
My friends/family want to cruise.	0.71	

Results of exploratory factor analysis indicated that the motivations of Chinese cruisers could be grouped into fewer groups than cruise travelers generally. The developed cruise motivation typology had one less group compared to the original scale; "escape & relaxation" and "learning/discovery & thrill" were grouped together as one motivation factor. Based on the study of Hung and Petrick (2011), the present study identified three cruise motivations:

1. Escape/relaxation & discovery motivation: Cruisers with this motivation desire to escape from work or mundane environments and seek change or new experiences (Hung & Petrick, 2011).
2. Self-esteem & social recognition motivation: These cruisers seek self-enhancement and social approval (Hung & Petrick, 2011).
3. Bonding motivation: Cruisers scoring high for bonding motivation emphasize interaction with family or friends on a cruise ship (Hung & Petrick, 2011).

Compared to the original motivation measurement scale developed by Hung and Petrick (2011), Chinese cruise travelers' motivations are more focused. Escape/relaxation and learning/discovery are grouped into one factor category in the new scale. Results

confirm previous research in that Chinese travelers have various motivations for taking a cruise (Qu & Ping, 1999; Josiam & Hung, 2009).

4.3.2 Motivational Factors in Product Category Preference Model

Regression models were applied in analyzing the relationship between motivational factors and each category preference. Each product category was set as the Y variable, with the three motivational factors as X variables. For example, food type= $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$, etc. Below is the list of regression models run for each product category (See Table 4. 16).

Table 4.16 Regression Models for Each Product Category

Y Variable	Regression Model
Food Type	Food type= $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$
Dining Service	Dining Service = $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$
Spa/Wellness Program	Spa/Wellness Program = $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$
Sports/Fitness Program	Sports/Fitness Program = $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$
Ports of Call	Ports of Call = $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$
Onboard Shopping	Onboard Shopping = $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$
Onboard Entertainment	Onboard Entertainment = $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$
Travel Companionship	Travel Companionship = $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$
Next Destination	Next Destination = $F1(\text{relaxation}) + F2(\text{esteem}) + F3(\text{bonding})$

Table 4.17 displays the regression analysis results of three motivational factors in product category preference model. All product categories are shown to be significant motivational factors in the product category preference model.

Table 4.17 Motivational Factors in Product Category Preference Model

Product Category	Model F value	Parameter Estimate F1	Parameter Estimate F2	Parameter Estimate F3
Food Type	3.98**	0.17*	0.01	0.06
Dining Service	5.33**	0.24**	-0.03	0.04
Spa/Wellness Program	11.78***	0.09	0.23***	0.09
Sports/Fitness Program	19.32***	0.12	0.33***	-0.05
Ports of Call	8.34***	0.19**	0.09	0.06
Onboard Shopping	12.57***	0.04	0.34***	0.01
Onboard Entertainment	17.95***	0.18**	0.18***	0.07
Travel Companionship	6.54***	0.01	0.14*	0.19**
Next Destination	8.55***	0.00	0.15*	0.21**

Note: *** $p < 0.001$, ** $p < 0.01$, * $p < 0.05$

The escape/relaxation & discovery factor was significant in product categories of food type (Parameter Estimate=0.17*), dining service (Parameter Estimate=0.24**), ports of call (Parameter Estimate=0.19**) and onboard entertainment (Parameter Estimate=0.18**). In other words, for the relaxation and discovery seeker, food type, dining service, ports and onboard entertainment can be very important. Travelers seek from these cruise product components a feeling of escape or relaxation, such as dining service and entertainment activities. They may also try to learn and discover new things

from these onboard experiences; for example, they may desire novelty and discovery from different port choices.

Self-esteem & social recognition works as a significant factor in the following categories: spa/wellness programs (Parameter Estimate=0.23***), sports/fitness programs (Parameter Estimate=0.33***), onboard shopping (Parameter Estimate=0.34***), onboard entertainment (Parameter Estimate=0.18***), travel companionship (Parameter Estimate=0.14*), and next destination (Parameter Estimate=0.15*). In other words, these product domains are significantly important to a self-esteem or social recognition seeker. Self-esteem and social recognition are critical parts in Chinese people's values, as is seeking recognition within their social class.

The bonding factor was significant in travel companionship (Parameter Estimate=0.19**) and next destination (Parameter Estimate=0.21**). Bonding is a major motivational factor when Chinese travelers consider to take a cruise, including companion choice and destination choice. This corresponds with previous study that China is a collective society and mainland Chinese are group-oriented (Hofstede, 1980).

Research Question 3 was therefore answered: There is a significant relationship between product preferences and motivational factors. All the product categories were shown to be significantly related to motivational factors.

4.4. Relationship between Motivational Factors and Demographic Variables

Table 4.18 presents the results of One-way ANOVA test for three motivational factors and all demographic variables. Male travelers (mean=3.59) were significantly higher statistically than females (mean=3.36) in escape/relaxation & discovery (F value=4.33*). For the bonding motivation (F value=4.42*), females (mean=3.98) were shown to be significantly higher than males (mean=3.76). Male travelers tend to seek a feeling of escape and relaxation from a cruise. They are more interested than women are in gaining new knowledge and novel experiences from cruising. Female travelers value bonding as the most motivational factor for cruising. They view cruising as a significant opportunity for interacting with their family members or enhancing friendships. In addition, the highest educational level tourists (mean=4.12) scored significantly higher than those with an associate degree (mean=3.68) in the bonding motivation (F value=2.82*).

Table 4.18 One-way ANOVA: Gender and Motivational Factors

Demographic Variable	No.	F1: Escape/relaxation & discovery			F2: Self-esteem & social recognition			F3: Bonding		
		Mean	Std	F-value	Mean	Std	F value	Mean	Std	F value
Male	99	3.59	0.70	4.33*	3.95	0.66	2.41	3.76	0.68	4.42*
Female	126	3.36	0.59		4.08	0.62		3.98	0.69	
18-24	12	3.27	0.74	2.08	3.81	1.16	1.76	3.75	1.14	1.74
25-34	88	3.45	0.84		4.14	0.59		3.78	0.83	
35-49	91	3.58	0.85		3.98	0.67		4.03	0.73	

Demographic Variable		F1: Escape/ relaxation & discovery			F2: Self-esteem & social recognition			F3: Bonding		
50 and older	39	3.20	0.76		3.94	0.57		3.81	0.77	
Single	55	3.42	0.73		4.15	0.61		3.88	0.73	
Married without children	27	3.23	1.01	1.12	4.00	0.75	0.90	4.06	0.63	0.50
Married with children	141	3.52	0.79		3.99	0.62		3.86	0.83	
Divorced/Widowed	6	3.23	1.60		3.92	1.46		3.75	1.41	
High School and Lower Associate Degree	12	3.55	0.48		3.97	0.74		3.71	0.86	
Associate Degree	41	3.53	0.86		4.06	0.55		3.68 ^b	0.73	
Bachelor's Degree	117	3.45	0.82	0.32	3.98	0.69	0.52	3.86	0.81	2.82*
Master's or Doctorate	59	3.38	0.91		4.10	0.68		4.12 ^a	0.78	
Under RMB 5,000	59	3.44	0.58		3.85	0.58		3.69	0.70	
RMB 5,000-10,000	84	3.47	0.61		4.10	0.61		3.90	0.63	
RMB 10,000-15,000	31	3.37	0.69	1.16	3.98	0.59	1.61	3.82	0.62	2.24
RMB 15,000-20,000	23	3.77	0.77		4.14	0.85		4.00	0.92	
Over RMB 20,000	32	3.30	0.71		4.10	0.68		4.19	0.68	
None	140	3.41	0.79		4.02	0.66		3.83	0.73	
Once	52	3.48	0.93	0.79	4.03	0.60	0.02	3.91	0.91	1.35
More than Once	38	3.59	0.85		4.04	0.76		4.07	0.89	

Note: ***p<0.001, **p<0.01, *p<0.05

Research Question 4 was answered: There is a relationship between motivational factors and demographic variables. Gender and educational level are two demographic variables that significantly related to motivational factors.

4.5 Relationship among Different Product Items under Each Category

Multiple-dimension scaling model was applied in exploring the relationship among different product items under each category. Figure 1 illustrates the information among all the preferences for detail product items.

As indicated in Figure 1, almost all the product items were grouped together; no clustering effects were shown. This may be because of the slight difference of each product scaling scored by respondents. Research Question 5 was answered: There is no significant relationship among different product items under each category.

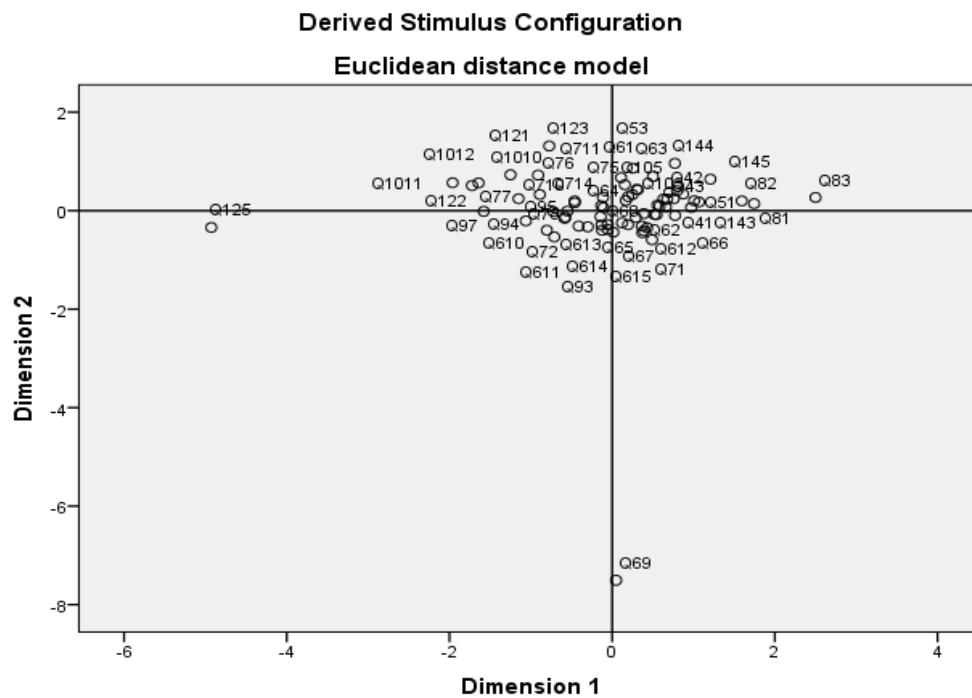


Figure 1 Multiple-dimension Scaling Model of Different Product Items under Each Category

CHAPTER 5. CONCLUSIONS AND IMPLICATIONS

This study has explored Chinese cruisers' product preferences and their relationship to demographic variables and motivational factors. Findings demonstrate that there is significant potential for the cruise ship market in China, offering cruise operators a general description of Chinese travelers' product preferences. The cruise product development process is a customer-driven process, and the potential for innovation is high (Vogel, Papathanassis, & Wolber, 2012). Cruise line operators can take advantage of the results of this study to better understand Chinese cruisers and offer products that cater to their needs.

The top three preferred cruise components were service quality, accommodations, and dining. The emphasis on service quality is consistent with traditional Western cruisers. Social interaction was found to be the least important component to Chinese cruisers, which differentiates them from Western customers. Thus, cruise operators should emphasize improving service quality to attract novice cruisers and retain repeat cruisers. For example, marketers can take advantage of cruisers' feedback questionnaires or other performance evaluation system to improve their service quality. In addition, Chinese cruisers pay close attention to accommodations and dining service, corresponding with their tradition. Marketing planners can introduce an accommodation

or dining upgrade as a sales promotion to attract more customers. Social interaction was shown to be the least important component in terms of the Chinese cruise market. Although Chinese people lack social interests while onboard, cruise operators can lead travelers to engage in interactive activities and provide proper networking platforms. Onboard games, theme parties, and sports activities all provide great opportunities for cruisers to make social connections. Once the market becomes more mature, a cruise can also serve as a business platform for Chinese people.

A high percentage of Chinese travelers reported their likelihood of taking a cruise in the next two years, indicating a large Chinese cruise market. Based on its large population, China is thus a surging, potentially dominant market for the cruise industry. Cruise operators should promote the concept of a cruise vacation and guide the development of Chinese cruise demand and consumption patterns. Currently, Chinese travelers still lack cruise experience or knowledge of cruise products. Since choosing a cruise requires high involvement in the decision-making process, managers may cooperate with local travel agencies at the beginning stage of market promotion, providing customers with face-to-face consulting services. Technology and popular social media such as Wechat and Weibo should be fully utilized when introducing cruise products in China.

The present study contributes to cruise product preference literature by drawing attention to the emerging Chinese market. Compared to previous cruise product studies,

which have focused extensively on general perceptions, the present study provides a detailed perspective of each product segment. Product adjustments should be made according to Chinese cruisers' particular cultural preferences; for example, buffets with ample Chinese food choices should be provided in the Chinese cruise market because Chinese people prefer to maintain their dining traditions onboard. Also, Chinese travelers tend to be willing to spend money on souvenirs and photos. Marketing planners can make specific pricing strategies based on this shopping trend. Onboard entertainment activities such as live music, stage shows, and comedy shows should cater to Chinese people's preference for *renao* atmosphere. Additionally, mahjong could be added as a special gambling activity for Chinese cruisers. Ports with access to nature were most attractive to Chinese travelers. Operators should meet travelers' needs for ports with natural beauty when designing cruise routes.

The relationship between product preference and demographic variables was found in the present study. The variables that significantly corresponded to product category preference were gender, age, income, educational level and cruise experience. Marital status is the only exception among all the demographic variables.

Male travelers were more interested than women in onboard shopping, particularly in purchasing electronics and liquor/cigarettes. Marketers can promote men's stores, providing convenient and abundant shopping choices for male cruisers. Electronic products are very expensive in mainland China, and cruise operators could offer onboard

bargains. Cigarettes and liquor are an important part of Chinese business culture because drinking and smoking are key social skills for Chinese males. Consequently, duty-free electronics, liquor, and cigarettes are all preferred shopping items to male Chinese cruisers. Cruise operators should have more of these shopping items targeting male Chinese shoppers. In addition, more men than women preferred various kinds of sports and fitness programs such as weights, personal trainers, basketball, volleyball, paddle tennis/ping-pong, multi-use sports courts, and bowling alleys. Female travelers preferred only yoga/Pilates more than males did. Accordingly, cruise market planners may improve the cardio equipment in their onboard gyms and promote more innovative sporting activities such as snorkeling lessons. Marketers may also open yoga or Pilates lessons for young women, providing a more professional training service and a more comfortable environment. Clinics are especially important to Chinese cruisers who have high safety awareness. Operators should have well-trained and experienced staff to better handle safety issues onboard.

Compared to aged travelers, young travelers are more likely to take a cruise in two years. Also, they prefer various kinds of onboard spa/wellness programs. Currently, young travelers in China usually hold a more open view of consumption than aged people and tend to experience high pressure from their daily work. Marketers may advertise key promotions on spa/wellness services to young cruisers so that they can more fully relax while onboard. This may also contribute to the profitability of onboard services since

Chinese cruisers usually are willing to pay less for onboard services than traditional Western cruisers. Specifically, relaxation and beauty programs such as reflexology, manicure/pedicure, massage, full service beauty salon, and teeth whitening should be elaborately developed to meet young cruisers' demands.

People with high education levels preferred ports with historical and cultural attractions. Consistently, Chinese travel activities traditionally have concentrated on historical and cultural attractions. Marketers may design particular culturally-specific routes or routes with a historical theme for this segment of demand. For example, adults can enjoy cultural experiences and history discovery in ports featuring Buddhist culture. In addition, local guidance services can be important to travelers with historical and cultural interests. Tour guides should have thorough knowledge of local history and culture. Travelers with the highest education level also preferred entertainment activities such as stage shows, games, live music, casinos, and video games. These onboard activities are important in appealing to cruisers with high levels of education, who tend to have interests in a variety of onboard activities. Marketers should provide them with abundant and interesting onboard entertainment choices.

Travelers with a monthly income from RMB 15,000-20,000 were more likely to take a cruise than those with income level under RMB 10,000. The highest income group is unlikely to take a cruise in the next two years. Thus it is travelers with the second highest income level who were most likely to take a cruise in next two years. Cruise

companies and travel agencies should pay special attention to this segment of cruisers. They have both time and money to take cruises; they are the target market. Travelers with low income levels may be young people. They could constitute a future target market though they currently suffer from limited budgets. Therefore, to explore additional business opportunities, marketers may offer student discounts to college students or coupons during slack season. It can not only promote the cruise concept among future customers, but also encourage their initial participation.

Repeat cruisers have a higher likelihood of cruising within the next two years than do novice cruisers. Accordingly, marketers should create special strategies that target repeat cruisers. For example, cruise lines can keep their customers loyal through email promotions and loyalty programs. In addition, there should be more advertisements aimed at attracting novice cruisers. Marketers should take full advantage of popular social media to promote the cruise concept to novice cruisers. Traditional travel agencies can also distribute brochures or fliers, or even hold cruise lectures. Repeat cruisers are also more interested in jewelry/accessory purchases, comedy shows, movie theaters, and casino. Cruise operators should continue to develop new cruise lines, onboard shopping choices, and entertainment activities to appeal to experienced customers. Specifically, onboard comedies and movies should be updated frequently. Moreover, marketers can provide more detailed information concerning introduction of services or products to novice cruisers, who are usually more confused or curious than experienced cruisers. For

example, operators may prepare more detailed instructions and service guides for first-time cruisers to familiarize them with shopping choices and entertainment activities right away.

Examining travelers by their demographic information can provide more meaningful ways to identify and understand their product preferences. By doing so, marketers can better segment their customers and target each segment with more focused marketing strategies.

One of the important theoretical contributions of the present study lies in its development of the factor structure of the cruising motivation scale for the Chinese cruise market. Although previous research confirmed the composition of the cruise motivation factor scale, no study has assessed the scale in Chinese context until now. In the present study, the traditional four-factor structure has been integrated into a three-factor one. The factors of “escape/relaxation” and “learning/discovery & thrill” were combined to better reflect Chinese cruisers’ motivations. Results of exploratory factor analysis indicate that Chinese cruisers’ motivation factors are more focused than cruisers from the worldwide market. A three-factor structure was more appropriate to explain Chinese cruisers’ motivation factors. Three motivational factors were identified in Chinese cruisers’ context, including escape/relaxation & discovery, self-esteem & social recognition, and bonding. All product categories were shown to be significant with regard to motivational factors in the product category preference model.

The escape/relaxation & discovery motivation factor contributes much toward food type, dining service, port, and onboard entertainment preferences. Operators should improve service delivery performance in these components and provide customers a full range of relaxation and discovery choices. For example, customers' relaxation needs might be fulfilled through a comfortable dining environment and delicious food. Cruisers can also gain relaxation experience from interesting entertainment activities. Marketers may focus on designing various kinds of interactive games. Customers' discovery needs could be met by exotic sightseeing or new routes. Marketers can take advantage of interest in new places perhaps including undeveloped islands, and display the exotic cultural atmosphere. Consistent with China's group-oriented customs, bonding was identified as an important factor in choosing travel companionship and destination. Marketers may promote special cruise lines aimed at various customers' bonding needs. For example, they may emphasize family image in their advertisements for particular cruise lines for family gatherings. Other images may include honeymoon travel for new wedding couples, relaxation travel for retirees, and graduation travel for students. Marketing planners may also promote different styles of destinations targeting different market segments. For example, Western Europe may be a good choice for honeymoon travel due to its romantic atmosphere; Southeast Asia could attract students since it is inexpensive to travel there. It is also recommended that cruise operators introduce family/group packages to meet people's needs for bonding.

The present study has found the relationships between the three motivational factors and six demographic characteristics. The most influential motivation factor for Chinese male travelers as identified by the study was escape/relaxation & discovery. Cruise operators should understand Chinese male travelers' major cruising motivation and promote more products to emphasize a sense of relaxation and novelty. For example, special sport activities such as rock climbing can be introduced for male cruisers to increase a sense of adventure. Chinese men may also feel relaxed in particular entertainment activities such as video games, gambling, or karaoke. Females were significantly higher than males in the bonding motivation. In addition, bonding correlated with educational level. Since female cruisers and highly educated travelers care more than others about bonding with family or friends, operators may provide them special services such as a childcare center, and feature rooms with a crib for women with children onboard. A light music bar could also be welcomed by providing people an easy place for gathering and chatting.

CHAPTER 6. LIMITATIONS AND FUTURE RESEARCH

No study can be free from research limitations. The present study only collected data from one city of east China, but the broad territory of China may reflect differences in consumer behaviors of different regions. Also the 20-day distribution period was rather short, and the study benefitted from the help of only one travel agent. The percentage of female respondents in the study sample was relatively higher than its percentage in the general Chinese population. In addition, the income level of a majority of the respondents was probably not high enough for them to be able to afford upscale cruise lines. Therefore, limited conclusions can be drawn from the data collected for the study.

Future research should expand the sample to include more cities and more qualitative information from a higher-income group of travelers. Also, future studies should explore the satisfaction factors of Chinese cruisers.

LIST OF REFERENCES

LIST OF REFERENCES

- Agrusa, J., Kim, S. S., Wang, K. (2011). Mainland Chinese tourists to Hawaii: Their characteristics and preferences. *Journal of Travel & Tourism Marketing*, 28(3), 261-278.
- Baum, C. (1993). Cruise industry sails toward larger market share. *Hotels*, 27(3), 54–56.
- Bull, A. (1996). The economics of cruising: An application to the short ocean cruise market. *Journal of Tourism Studies*, 7(2), 28–35.
- Carnival Cruise Lines (2014). Retrieved from <http://www.carnival.com/explore-carnival-cruises>
- Chen, Y., Lehto, Y. X., Cai, L. (2013). Vacation and Well-Being: A study of Chinese Tourists. *Annals of Tourism Research*, 42, 284–310.
- Covey, C. (2002). Cruise vacations: Selling a customized travel experience. *Travel Weekly*. 61.42 (Oct. 21, 2002): pS93
- China Cruise & Yacht Industry Association (2013). 2012-2013 China Yacht Industry Report (Chinese version).
- China National Tourism Administration (2010). *China Tourism Report*, (3), 1-67.
- China's 12th Five-Year Master Plan (2011). Retrieved from <http://www.cbichina.org.cn/cbichina/upload/fckeditor/Full%20Translation%20of%20the%2012th%20Five-Year%20Plan.pdf>
- Churchill, G. A. (1979). A paradigm for developing better measures of marketing constructs. *Journal of Marketing Research*, XVI (February), 64-73.
- Christoff, J. (2013). Targeting the Asia cruise market. *Travel Age West*. Retrieved from <http://www.travelagewest.com/Travel/Asia/Info/Targeting-the-Asia-Cruise-Market/#.UucRbmSDH3A>

- Collins UK (ed.) 2010. Collins English Dictionary. Bishop Briggs, Glasgow: HarperCollins.
- Cruise Industry News Annual Report (2007). Cruise industry news annual report 2007. Cruise Industry News: New York, NY.
- Cruise Lines International Association (2008). 2008 CLIA cruise market overview. Retrieved from <http://www.cruising.org/press/overview2008/>
- Cruise Lines International Association (2012). 2012 CLIA cruise market overview. Retrieved from <http://www.cruising.org/press/overview2012/>
- Cruise Lines International Association (2012). Opportunity and growth in the Asian-Pacific market. Retrieved from <http://ceoblog.cruising.org/content/opportunity-and-growth-asian-pacific-market>
- Cruise Lines International Association (2013). North America cruise industry update. Retrieved from <http://www.cruising.org/sites/default/files/pressroom/CruiseIndustryUpdate2013FINAL.pdf>
- Cruise Lines International Association (2014). 2014 CLIA Annual State of the Industry Press Conference & Media Marketplace. Retrieved from <http://www.cruising.org/sites/default/files/pressroom/PressConferencePresentation.pdf>
- Cruise Lines International Association,(2015). State of the Asia cruise industry: More cruise ships, passengers and ports than ever before. Retrieved from http://www.cruising.org/news/press_releases/2015/03/state-asia-cruise-industry-more-cruise-ships-passengers-and-ports-ever
- Cruise Market Watch (2013). 2013 Worldwide market share. Retrieved from <http://www.cruisemarketwatch.com/market-share/>
- Cruise Radio (2013). Costa next cruise line to fully tap Asian market. Retrieved from <http://cruiseradio.net/costa-next-cruise-line-to-fully-tap-asian-market/>
- Dowling, R. K. (2006). Cruise ship tourism. CABI: Cambridge, MA.
- Fan, X. F., Hsu, H. C. (2014). Potential mainland Chinese cruise travelers' expectations, motivations, and intentions. *Journal of Travel and Tourism Marketing*, 31:4, 522-535.

- Gibson, P., Papathanassis, A. (2009). Cruise sector futures: Exploring growth- related opportunities and challenges, 1st International Cruise Conference, 26–27 September 2008, Bremerhaven. *International Journal of Tourism Research*, 11(1), 105-106.
- Gibson, P., Papathanassis, A. (2010). The cruise industry—emerging issues, problems and solutions: Review of the 2nd international cruise conference, Plymouth, UK, 18–20 February 2010. *International Journal of Tourism Research*, 12(4), 405-407.
- Guo, Y., Kim, S. S., Timothy, D. J. (2007). Development characteristics and implications of mainland Chinese outbound tourism. *Asia Pacific Journal of Tourism Research*, 12(4), 313-332.
- Hofstede, G. (1980). *Culture's consequences: International differences in work-related values*. Newbury Park, CA: Sage.
- Hung, K., Petrick, J. F. (2011). Why do you cruise? Exploring the motivations for taking cruise holidays and the construction of a cruising motivation scale. *Tourism Management*, 32, 386-393.
- Hur, Y., Adler, H. (2013). An exploratory study of the propensity for South Koreans to take cruises: Investigating Koreans' perceptions of cruise ship travel. *International Journal of Tourism Research*, 15(2), 171-183.
- Johanson, M. (2013). Travel trends for 2014: PANKs, microstays and Asian cruising. Retrieved from <http://www.ibtimes.com/travel-trends-2014-panks-microstays-asian-cruising-1455114>
- Josiam, B. M., Huang, T., Spears, D. L., Kennon, L., & Bahulkar, G. A. (2009). Understanding ethnic Chinese travelers on North American cruise tours: motivation, perceptions, and satisfaction of cruisers. *Journal of China Tourism Research*, 5:77-101.
- Kindergan, A. (2013). Setting Sail in Asia. The Financialist. Retrieved from <http://www.thefinancialist.com/setting-sail-in-asia/>
- Lehto, X. Y., Cai, L., O'Leary, J. T., & Huan, T. C. (2004). Tourist shopping preferences and expenditure behaviors: The case of the Taiwanese outbound market. *Journal of Travel Vacation*, 10(4), 320-332.

- Li, X., Lai, C., Harrill, R., Kline, S., & Wang, L. (2011). When East meets West: An exploratory study on Chinese outbound tourists travel expectations. *Tourism Management*, 32(4), 741-749.
- Littrell, M. A., Anderson, L. F., & Brown, P. J. (1993). What makes a craft souvenir authentic. *Annals of Tourism Research*, 20(1), 197-215.
- Mehta, S. C., Lalwani, A. K., Ping, L. (2001). Reference group influence and perceived risk in services among working women in Singapore: A replication and Extension. *Journal of International Consumer Marketing*, 14(1), 43-65.
- Mondou, V., Taunay, B. (2012). The adaptation strategies of the cruise lines to the Chinese tourists. *Tourism*, 60(1), 43-54.
- National Bureau of Statistics of the People's Republic of China (2010). Retrieved from <http://www.stats.gov.cn/tjsj/>
- Nyiri, P. (2008). Between encouragement and control: Tourism, modernity and discipline in China. In T. Winter, T.C.
- Orban, D. M. (1993). New Destinations and innovative itineraries led the way for cruise industry in 1992. *World Travel and Tourism Review*, 3, 193-194.
- Page, K. (1987). The future of cruise shipping. *Tourism Management*, 8(2), 166-168.
- Papathanassis, A., Gibson, P. (2009). Cruise sector futures: Exploring growth-related opportunities and challenges, 1st International Cruise Conference, 26-27 September 2008, Bremerhaven. *International Journal of Tourism Research*, 11(1), 105-106.
- Pholsena, X. L. (2013). Asian cruise market predicted to expand to 3.7m by 2017. *Singapore Business Review*. Retrieved from <http://sbr.com.sg/source/ttg-asia/asian-cruise-market-predicted-expand-37m-2017>
- Qu, H., Ping, E. W. Y. (1999). A service performance model of Hong Kong cruise travelers' motivation factors and satisfaction. *Tourism Management*, 20, 237-244.
- Royal Caribbean International (2014). Retrieved from http://www.royalcaribbean.com/contentWithGallery.do?pagename=shore_excursions_main

- Run, J., Li, J., Zhang, G. (2008). Tourism motivation and behavior of Chinese people. *Social Sciences Review*, 23(6), 31–32.
- Su, L. (2001). China issues its tenth 5-year tourism development plan. *East China Tourism Daily* (in Chinese), 1.
- Teye, V.B., Leclerc, D. (1998). Product and service delivery satisfaction among North American cruise passengers. *Tourism Management*, 19(2), 153-160.
- Travel China Guide (2013). 2012 China tourism facts & figures. Retrieved from <http://www.travelchinaguide.com/tourism/2012statistics/>
- Travel Weekly (2013). Star cruises to build a new ship specially for Asia. Retrieved from <http://www.travelweeklyweb.com/star-cruises-to-build-a-new-ship-specially-for-asia/45505>
- Tunney, D. (2011, October). In China's middle class, cruise lines see a profitable new source market. *Travel Weekly*. Retrieved from <http://www.travelweekly.com/cruise-travel/in-china-s-middle-class,-cruise-lines-see-profitable-market/>
- Veronneau, S., Roy, J. (2009). Global service supply chains: An empirical study of current practices and challenges of a cruise line corporation. *Tourism Management*, 30(1), 128–139.
- Waldmeir, P. (2013). On board China's first luxury cruise liner. *Financial Times*. Retrieved from <http://www.ft.com/cms/s/2/9a491018-e9c1-11e2-bf03-00144feabdc0.html#axzz2sHxCXXSn>
- Wang, S., Qu, H. (2002). Impacts of accession to WTO on China's travel industry. *Journal of Travel & Tourism Marketing*, 12(1), 63-80.
- Want China Times (2013). Leisure cruise industry in China goes full steam ahead. Retrieved from <http://www.wantchinatimes.com/news-subclass-cnt.aspx?id=20130913000011&cid=1202>
- Yahoo News (2015, March). Asian cruise industry moving full steam ahead with explosive growth: report. Retrieved from http://news.yahoo.com/asian-cruise-industry-moving-full-steam-ahead-explosive-192523158.html?soc_src=mediacontentstory&soc_trk=ma

- Yi, S., Day, J., & Cai, L. A. (2011). Exploring Asian Cruise Travelers' Travel Experience and Perception. *Tourism Management*, 30, 128-139.
- Yun, D., Joppe, M. (2011). Chinese Perceptions of Seven Long-Haul Holiday Destinations: Focusing on Activities, Knowledge, and Interest. *Journal of China Tourism Research*, 7, 459–489.

APPENDIX

6. On a scale of 1 to 5, how interested are you in the following spa or wellness programs?

	1 ←-----→5				
	Very Uninterested			Very Interested	
Aromatherapy	1	2	3	4	5
Ionithermie Treatments	1	2	3	4	5
Body Wraps	1	2	3	4	5
Mud Therapy	1	2	3	4	5
Reflexology	1	2	3	4	5
Thalassotherapy	1	2	3	4	5
Jacuzzi or Whirlpool	1	2	3	4	5
Nutritionist	1	2	3	4	5
Facials	1	2	3	4	5
Manicure/Pedicure	1	2	3	4	5
Massage	1	2	3	4	5
Fitness Evaluations	1	2	3	4	5
Full Service Beauty Salon	1	2	3	4	5
Teeth Whitening	1	2	3	4	5
Steam Room or Sauna	1	2	3	4	5

7. On a scale of 1 to 5, how interested are you in the following sports or fitness programs?

	1 ←-----→5				
	Very Uninterested			Very Interested	
Cardio Equipment	1	2	3	4	5
Weights	1	2	3	4	5
Personal Trainer	1	2	3	4	5
Yoga/Pilates	1	2	3	4	5
Jogging Track	1	2	3	4	5
Basketball	1	2	3	4	5
Volleyball	1	2	3	4	5
Paddle Tennis/Ping Pang	1	2	3	4	5
Water Activities Platform	1	2	3	4	5
Multi-use Sports Court	1	2	3	4	5
Rock Climbing Wall	1	2	3	4	5
Bowling Alley	1	2	3	4	5
Snorkeling Lessons	1	2	3	4	5
Golf Programs	1	2	3	4	5
Clinics/Lessons	1	2	3	4	5

8. On a scale of 1 to 5, how interested are you in the kinds of ports of call during a cruise ship trip?

	1 ←-----→5				
	Very Uninterested			Very Interested	
Historical	1	2	3	4	5
Cultural	1	2	3	4	5
Natural	1	2	3	4	5

9. On a scale of 1 to 5, how interested are you in the onboard shopping experience of following products during a cruise trip?

	1 ←-----→5				
	Very Uninterested			Very Interested	
Photos	1	2	3	4	5
Souvenirs	1	2	3	4	5
Clothes/Shoes	1	2	3	4	5
Jewelry/Accessories	1	2	3	4	5
Beauty & Fragrance	1	2	3	4	5
Electronics	1	2	3	4	5
Liquor/Cigarettes	1	2	3	4	5

10. On a scale of 1 to 5, how interested are you in the following entertainment activities on a cruise?

	1 ←-----→5				
	Very Uninterested			Very Interested	
Stage Show	1	2	3	4	5
Comedy Show	1	2	3	4	5
Games	1	2	3	4	5
Movie Theater	1	2	3	4	5
Karaoke	1	2	3	4	5
Live Music	1	2	3	4	5
Art Gallery	1	2	3	4	5
Library	1	2	3	4	5
Sports Bar	1	2	3	4	5
Night Club	1	2	3	4	5
Casino	1	2	3	4	5
Video games	1	2	3	4	5

11. Please state your level of agreement with the following questions.

	1 ←-----→ 5				
	Completely Disagree		Completely Agree		
Taking a cruise allows me to do something that impress others	1	2	3	4	5
Taking a cruise allows me to help me feel like a better person	1	2	3	4	5
Taking a cruise allows me to increase my feelings of self-worth	1	2	3	4	5
Taking a cruise allows me to derive a feeling of accomplishment	1	2	3	4	5
Taking a cruise allows me to photograph an exotic place to show friends	1	2	3	4	5
Taking a cruise allows me to be free to do whatever I want	1	2	3	4	5
Taking a cruise allows me to escape	1	2	3	4	5
Taking a cruise allows me to give my mind a rest	1	2	3	4	5
Taking a cruise allows me to gain knowledge	1	2	3	4	5
Taking a cruise allows me to enjoy activities that provide a thrill	1	2	3	4	5
Taking a cruise allows me to experience other cultures	1	2	3	4	5

	1 ←-----→ 5				
	Completely Disagree		Completely Agree		
Because my friends/ family want to cruise	1	2	3	4	5
Taking a cruise allows me to interact with friends/ family	1	2	3	4	5

12. Whom would you like to travel with during a cruise vacation?

	1 ←-----→ 5				
	Never		Always		
Friends	1	2	3	4	5
Parents	1	2	3	4	5
Children	1	2	3	4	5

	1 ←-----→ 5				
	Never		Always		
Spouse	1	2	3	4	5
Business Clients	1	2	3	4	5

13. On a scale of 1 to 5, how likely you are going to take a cruise trip in the coming two years?

Very Unlikely	←-----	Neutral	-----→	Very Likely
1	2	3	4	5

14. Where would be your next destination if you were going to take a cruise trip?

	1←-----→5				
	Very Uninterested		Very Interested		
Southeast Asia	1	2	3	4	5
Pacific	1	2	3	4	5
Mediterranean	1	2	3	4	5
Caribbean	1	2	3	4	5
Western Europe	1	2	3	4	5

15. What is your gender?

Male

Female

16. What is your age group?

- 18—24 25—34 35—49
 50—64 65 and over

17. What's your marital status?

- Single Separate/Divorced Widowed
 Married with children Married without children

18. What is your highest education level?

- Lower than High School High School Associate Degree
 Bachelor's Degree Master's Degree Doctorate Degree

19. What's your monthly household income?

- Under RMB 5,000 RMB 5,000-10,000 RMB 10,000-15,000
 RMB 15,000-20,000 Over RMB 20,000

Thanks for your response. We truly appreciate your help!