UNIVERSITI PUTRA MALAYSIA

THE EXPENDITURE PATTERN ON ECOTOURISM RESOURCES IN TAMAN NEGARA: THE CASE FOR INTERNATIONAL TOURISTS

ADRIANNE CHERYL TAN

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By

ADRIANNE CHERYL TAN

Thesis Submitted to the School of Graduate Studies, Universiti Putra Malaysia,
In Fulfilment of the Requirement for the Degree of Master of Science

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UPM

DEDICATION

Especially dedicated to my beloved,

Mom : Rampiari Praser

In Loving Memory and Soundless Inspiration,

Dad : Ronnie Tan

Also to the Department of Wildlife and National Parks, Kuala Tahan, Pahang Darul Makmur.

Thank you and Lots of love,

CHERYL

Abstract of thesis presented to the Senate of Universiti Putra Malaysia in fulfilment of the requirement for the degree of Master of Science.

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By

ADRIANNE CHERYL TAN

March 2002

Chairman : Associate Professor Dr. Khalid Abdul Rahim

Faculty : Economics and Management

National Parks are under increasing pressure to provide economic justification for their existence, particularly in developing countries where demand for land and natural resources is high. Ecotourism offers a mechanism to generate substantial benefits from protected areas for governments and local communities, as well as the private investors. Also, ecotourism is increasingly promoted as a sustainable use of such protected areas through generation of income and revenue for the nation. This study was aimed at (1) analyzing international tourists' expenditure patterns in Taman Negara using model comparison for individual total expenditure, average group expenditure and individual daily expenditure. (2) examining the consumer preferences and tastes for nature-based outdoor recreation activities (3) find out the international tourists' feedback on the recreational attributes, current status of recreational

facilities and services provided. (4) determining the international tourists' socio-economic characteristics and their distribution. A total of 384 respondents were interviewed using close-ended questionnaires. Collected data were analyzed using descriptive analysis, index analysis, factor analysis, correlation analysis, multiple regression analysis, F statistic test and t-test.

The findings identified Europeans as having the highest percentage of respondents whose age were between 21-30 years old. Most of the respondents were university graduates and earn between USD 1001 to 2000 per month. Male participation is higher when compared to female and most of the respondents led a single life. More than half of the respondents agreed with the recreational attributes in Taman Negara. Meanwhile, more than 60% of the respondents thought that little improvement is needed for all the current services and facilities provided except for road transportation, information and access to recreational facilities such as jungle tracks and canopy walkway within the park which were highly recommended for improvement.

Our result indicated that there were five recreational activities namely canopy walkway, jungle trekking, night walk, wildlife observation and visiting Lata Berkoh that were highly participated, preferred and popular among the international tourists. There were various price levels that the

international tourists spent for the three basic important elements namely: accommodation, food and recreational activity during their stay in the park. The highest price that they paid for accommodation was between RM61 to RM80 per day per person. Respondents also revealed their expenditure for recreational activities participated in the park. Meanwhile, they spent less for food, which was about RM21 to RM40 per day per person.

Eight independent variables were chosen to explain the tourist expenditures. These eight independent variables consisted of income, age, education level, region, satisfaction level for the top five recreation activities, length of stay, marital status and travelling pattern. The dependent variables were individual total expenditure, average group expenditure and individual daily expenditure. Although all independent variables showed different influences in the three different functional forms, some similarities were observed in this study. For example, region, income, satisfaction level for top five recreation activities and travelling pattern were found significant but inelastic. The explanation from the result indicate that although these variables do influenced the dependent variables but the impact is very small in affecting the respondents' decision making for their expenditure pattern in the park. Meanwhile, age, education level, length of stay and marital status were statistically insignificant. Besides that, log-linear form model was

selected as the basis for further evaluation and analysis focusing on the international tourists expenditure pattern in Taman Negara.

Abstrak tesis yang dikemukakan kepada Senat Universiti Putra Malaysia sebagai memenuhi keperluan untuk ijazah Master Sains.

CORAK PERBELANJAAN BAGI SUMBER EKO-PELANCONGAN DI TAMAN NEGARA: KAJIAN TERHADAP PELANCONG ANTARABANGSA

Oleh

ADRIANNE CHERYL TAN

Mac 2002

Pengerusi : **Profesor Madya Dr. Khalid Abdul Rahim**

Fakulti : **Ekonomi dan Pengurusan**

Kini Taman Negara menghadapi rintangan yang besar untuk membuktikan potensi dan sumbangannya terhadap peningkatan ekonomi melalui kewujudannya, terutamanya dalam negara yang sedang membangun dimana permintaan untuk tanah dan sumber asli adalah tinggi. Ekopelancongan menyediakan mekanisme untuk menghasilkan banyak kebaikan daripada kawasan dilindungi untuk kerajaan, komuniti tempatan dan pelabur persendirian. Eko-pelancongan juga semakin diketengahkan sebagai penggunaan mapan bagi kawasan dilindungi dan pada masa yang sama menjanakan pendapatan dan hasil kepada masyarakat dan negara. Kajian ini menumpukan (1) penganalisaan corak pendapatan pelancongan antarabangsa di Taman Negara dengan menggunakan model perbandingan untuk jumlah

perbelanjaan individu, perbelanjaan purata kumpulan and perbelanjaan harian individu (2) memeriksa pilihan utama pengguna untuk aktiviti rekreasi luar berasaskan alam semulajadi (3) mendapatkan maklumbalas pelancong antarabangsa berkenaan sifat rekreasi, status terkini bagi prasarana dan perkhidmatan rekreasi yang disediakan (4) mengenalpasti ciri dan taburan sosio-ekonomi pelancong antarabangsa. Sejumlah 384 responden ditemuramah menggunakan borang soal-selidik tertutup. Data yang diperolehi dianalisa menggunakan analisis diskriptif, analisis indeks, analisis faktor, analisis korelasi, analisis regreasi berbilang, ujian statistik F dan ujian t.

Kajian telah mengenalpasti bahawa responden Eropah mempunyai jumlah peratus tertinggi yang berusia diantara 21-30 tahun. Kebanyakkan responden adalah berpendidikan taraf universiti dan memperolehi pendapatan diantara USD1001-USD 2000 sebulan. Penglibatan responden lelaki adalah lebih banyak berbanding perempuan dan kebanyakkannya berstatus bujang. Lebih daripada separuh responden bersetuju dengan sifat rekreasi yang wujud di Taman Negara. Sementara itu, lebih daripada 60% responden berpendapat bahawa semua prasarana dan perkhidmatan rekreasi terkini perlu diperbaiki sedikit kecuali pengangkutan jalan, informasi dan kemudahan penggunaan prasarana rekreasi seperti rentis dan laluan kanopi dalam Taman memerlukan banyak pembaikpulihan.

Hasil kajian juga menunjukkan terdapat lima aktiviti rekreasi luar iaitu laluan kanopi, menjejak hutan, jalan malam, pemerhatian hidupan liar dan lawatan ke Lata Berkoh yang mempunyai penyertaan dan pilihan tertinggi serta masyhur di kalangan pelancong antarabangsa. Terdapat pelbagai kadar harga yang dibelanjakan untuk tiga elemen asas iaitu penginapan, makanan dan aktiviti rekreasi sepanjang percutian mereka di taman tersebut. Harga tertinggi yang dibelanjakan adalah diantara RM61-RM80 untuk penginapan. Responden juga menunjukkan perbelanjaan bagi penglibatan dalam aktiviti rekreasi adalah sama nilai dengan penginapan. Manakala, bagi makanan perbelanjaan adalah lebih rendah iaitu diantara RM21-RM40 sehari bagi seorang.

Terdapat 8 pembolehubah bebas dalam model yang terdiri daripada pendapatan, umur, tahap pendidikan, wilayah, tahap kepuasan bagi lima aktiviti rekreasi yang utama, jangka masa tinggal, status perkahwinan dan corak pengembaraan yang dikaji kesannya terhadap pembolehubah bersandar. Sementara itu, pembolehubah bersandar terdiri daripada jumlah perbelanjaan individu, perbelanjaan purata kumpulan dan perbelanjaan harian individu. Walaupun semua pembolehubah bebas menunjukkan kesan yang berlainan dalam ketiga-tiga bentuk fungsian, beberapa persamaan dapat diperhatikan dalam kajian ini. Contohnya, wilayah, pendapatan, tahap kepuasan untuk 5 aktiviti rekreasi utama dan corak pengembaraan didapati signifikan

tetapi tidak anjal. Ini menunjukkan walaupun pembolehubah bebas ini adalah signifikan tetapi ia memberi impak yang kecil kepada pembolehubah bersandar dalam membuat keputusan untuk perbelanjaan mereka di Taman Negara. Di samping itu, pembolehubah bebas seperti umur, tahap pendidikan, jangka masa tinggal dan status perkahwinan adalah tidak signifikan secara statistik. Selain itu, model dalam bentuk log-linear dipilih sebagai asas bagi penilaian dan analisis corak perbelanjaan responden di Taman Negara.

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LIST OF ABBREVIATIONS

DV	=	Dependent Variable
ENRAP	=	Environmental and National Resource Accounting Project
IV	=	Independent Variable
IUCN	=	International Union for the Conservation of Nature
NOAA	=	National Oceanic and Atmospheric Administration
PAWB	=	Protected Area and Wildlife Bureau
PERNAS	=	Permodalan National Berhad
PPSO	=	Planning and Policy Studies Office
SPSS	=	Statistical Package for Social Science
TIES	=	The International Eco-tourism Society
TNKTP	=	Taman Negara Kuala Tahan Pahang
TNR	=	Taman Negara Resort
UNESCO	=	United Nation Educational Scientific and Cultural Organization

CHAPTER ONE

INTRODUCTION

In recent years, people are more aware and concerned about issues relating to the conservation of natural resources. The designation of nature parks and other conservation areas are for their roles in protecting natural ecosystems. The pressures by industrial or agricultural developments have change the outlooks of the natural landscape. The establishment of national parks and other protected areas in the developing countries including Malaysia, is due to the belief that protected natural areas would contribute to the quality of life and also to generate income to the country. According to McNeely and Thorsell(1988),

"*effective tourism management can actually enhance the quality of the natural resources that attract tourists in the first place, resulting in a positive feedback loop. In order to protect sensitive ecosystems from any tourist or human overuse, one of the approaches suggested was the establishment of eco-pressures funded in part by fees from eco-tourism.*"

Hence, tourism activities, especially eco-tourism, offers outdoor recreation experience, recreational facilities, services and other nature-based experiences in the protected areas in order to enhance a country economic growth, development and social welfare.

National parks could benefit the country and society in many ways. Besides providing their ecological functions, national parks also

offer recreational benefits to park's visitors and help the government to increase revenue through foreign exchange from international travelers. However, in many circumstances, the revenues generated for national parks obtained from charged fees on tourists was not adequate to cover all the expenses for maintenance, management, development and conservation of the parks. Nonetheless, development of activities such as ecotourism in national parks or natural environment could yield many benefits in relation to nature and wildlife protection, conservation and rehabilitation of natural resources.

Eco-tourism activities that take place in a natural environment can be an instrument for conservation purposes. Some of the ways are by creating and stimulating the awareness of the values of nature, creating political pressures to conserve the natural resources and by providing socio-economic incentives to maintain wildlife population and habitat. According to Fillion *et al* (1992),

> "*the socio-economic benefits can be obtained via job creation, increases in foreign exchange earnings and capital investment in the industry*".

In addition, a good ecotourism development in Malaysia could elevate or raise the nature conservation image and popularity of the country throughout the world.

Eco-tourism development benefits local people, especially residents in rural areas, as they will have the opportunity to gain employment benefits that will improve their standard of living. Healy (1988) carried out a study on nature tourism and economic multipliers to determine the benefits to local economy in 1988. He found that generally smaller and less developed areas showed greater economic leakage, as many goods and services had to be brought from outside. Hence, through ecotourism, local residents could earn more income, develop more working skills in that sector, improve their standard of living which would bring harmony and development in their area.

In terms of individual benefits, it is generally accepted that participation in some form of recreational activities, the ecotourism destination, is a psychological necessity for most people. The most important psychological benefit obtained from recreation is relaxation. It also provides a respite from one's worries and pressures, relieves feelings of tension and fatigue and restores mental efficiency. Besides that, recreational activities also provide valuable opportunities for self-realization. In the present, society with higher population growth and improved standard of living, recreation offers temporary relief from unpleasant realities in personal lives that are difficult or impossible to bear. By partaking in the recreation activities in the natural environment, it helps people to escape boredom, emotional problems and health problems in the healthy way.