IMPORTANCE-PERFORMANCE ANALYSIS IN AIRLINES SERVICE QUALITY: A CASE STUDY OF LEGACY AIRLINES IN THAILAND

by

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ABSTRACT

This study applied the Importance-Performance Analysis (IPA) technique to evaluate the service quality of legacy airlines in Thailand, which are Thai Airways International and Bangkok Airways. The assessment defines the passengers' level of importance and level of service satisfaction, as well as influenced factors to respondents on their airline selection. This research administered only Thais who fly domestic flights. The questionnaires were divided into two keys activities; Ground and In-flight Services. The results reveal that overall importance and performance levels are high for both ground and onboard services. The result fell into IPA's grid 'keep up the good work'. And the factors affecting passengers' choice toward airlines are safety, variety of flight schedule, spacious seat, price, ease of reservation, efficiency of baggage handling, courtesy and professionalism of staff.

KEYWORDS
Importance-Performance Analysis, Legacy Airlines, Airlines 'Service Attributes

INTRODUCTION

Aviation plays a significant role in the world today. It supports social and economic development in both emerging and established nations. The strong air travel growth, globalization of economies, air travel deregulation and technology have allowed more connectivity between cities.(Airbus, 2009). Gonenc and Nicoletti (2000) quoted in (Piermartini R., Rousova L. 2008) that international air passenger transport is an important factor in facilitating trade and development of other sectors of an economy. Trace Keith., Frielink Barend., Hew Denis. (2009) also mentioned that improved air connectivity through air transport links is an essential component of economic growth, as it provides personal access to the region for business, social, or recreational purposes, as well as physical access to resources and markets. Improved access allows producers to take advantage of an expansion of trade, economies of scale, and specialization, thus lowering costs and prices and widening production choices. Since the unification of ASEAN countries will be formed in 2015. Two of the major pillars in cooperation among ASEAN countries are the services and tourism. As Forsth P., King J., Rodolfo L. C., and Trace K. (2004) mentioned that open sky is a target which has been set for 2015 in "The Roadmap for the Integration of ASEAN: Competitive Air Services Policy." Open sky will be an important component of the overall economic integration of ASEAN, since it aims to bringing down barriers to trade, thus facilitating change. That's related to Trace Keith., Frielink Barend., Hew Denis. (2009) the ASEAN leaders' summit held in Bali in October 2003 agreed to accelerate trade liberalization in 11 priority sectors, Air Travel was selected as 1 of the 11 priority sectors. Liberalization of aviation markets can create direct and indirect benefits and costs. The direct impact are passengers benefit lower fares and better services, airlines lower costs and access to new markets, tourism sector will gain from stimulus provided by lower airfares and better services. And indirect impacts are on government revenue, foreign exchange effects, employment, and the improvement of business communication. The other impact outcomes according to Tretheway Michael (2009) cited that liberalization created new routes and more competition reduced fares and increased traffic. As from Airbus (2007) study also reveals that the airlines confront with high competition. The legacy airlines are not only competing among them but low cost airlines as well. Hence, the carriers have to adapt and improve their service quality. Consequently, (Alamdari Farida, 1999) refers that because of the relaxation of economic regulation in many aviation markets increase in the level of competition in the air transport. The airlines are continuously seeking ways of differentiating their product from one another.

According to Edvardsson Bo (1992) many executives see quality as a cornerstone or driving force for improving competitiveness, customer satisfaction and profitability. The quality development is not only to reduce costs and increase productivity but also to better satisfy customers, and improve profitability. For the air transport industry Alamdari Fariba (1999) saw that the increasing in level of competition airlines continuously seeking ways of differentiating and

improving their product and services to achieve their objectives. Generally, airlines want to satisfy customers' needs and requirements, to satisfy shareholders by producing profits and to out-perform the rivals through product differentiation.
In conclusion, this study assesses the airline service attributes quality of Thailand's legacy airlines. Applying IPA technique to measure the importance from the passengers' viewpoint and the services satisfaction they perceived from the airlines. The findings from this research can furnish beneficial information for airlines' manager to oversee their weak point and settle appropriate plan for further service improvement.

Importance-Performance Analysis

There are many ways to measure customer preferences, satisfaction and perception by using various types of technique and tools. The studies allow firms to better understand their customers so they can provide the right product and services to provide their target groups. The Importance-Performance Analysis (IPA) is one of popular tools among researchers. IPA was created by Martilla and James (1977), to evaluate the automobile dealer's service. The tool divided into four quadrants: (1) Concentrate Here quadrant indicates that the customers consider service attributes important but not satisfied with the service they perceived; (2) Keep Up with the Good Work quadrant indicates that the customers consider service attributes important and they are happy with the service perceived; (3) Low Priority quadrant indicates that the customers care less about the attributes and they are not satisfied with the service; (4) Possible Overkill quadrant indicates that the customers care less about the attributes but the service provider has good performance.
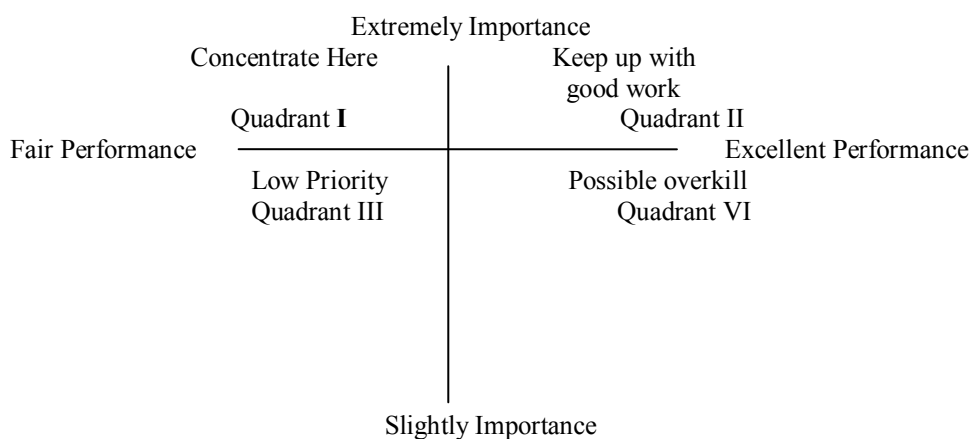
Source: Adapted from Martilla and James (1977): Importance-Performance Analysis. Journal of Marketing

This technique is used to evaluate the gap between importance attributes and how well the company performs. It was used in various fields and service sectors including training (Siniscalchi M. J, Beale K. E, & Fortuna, 2008), hotel (Chu K.S. Raymond & Choi Tat, 2000), tourism and agritourism & farm development (Kinley T, Kim K-Y, Forney J.), (Barbieri Carla., 2010), airport access mode choice (Tam Ling. M., Tam Lam M., & Lam H.K. W., 2005) and economic planning because Importance-Performance Analysis is low cost and easily understood to organize (Tyrrell J.T., Okrant J. M., 2004) etc. In applying IPA to assess the airline service quality Chen Y-F., and Chang H-Y (2005) use IPA to examine airline service quality from a process perspective. Their studies were divided into two stages, those are ground services and in-flight services. Feng Min-Cheng and Jeng Yeun-Kung (2005) applied IPA on analyzing airline service improvement strategy, and Atilgan E., Akinci S., and Aksoy S (2008) measure and mapping customers' expectations and perceptions for airlines.

RESEARCH METHODOLOGY

Four hundred questionnaires were administered to the passengers who travelled domestic with Thai Airways International and Bangkok Airways. The questionnaires were divided into three parts. The first part was to collect sampling demographic data and purpose of journey. The second measured importance-performance of the ground and in-flight services as Chen Y-F., and Chang H-Y (2005) considered the air travel broke into two activities: ground services and in-flight services. Ground services are information gathering, reservations and ticket purchases, airport check-in, and post-flight service. The evaluation of importance and performance ranked 1 to 5 on the Likert Scale with "1 = not importance, 2 = least importance, 3 = importance, 4 = high importance and 5 = very importance". And the third part are the factors affecting passengers' intending to fly respectively. The considered factors to evaluating the influenced

passengers adapted from Zeithaml A. Valarie & Bitner J. Mary (2000) expanded marketing mix for services; product, place, promotion, price, people, physical evidence and process. Jin (1998) quoted in Feng Min-Cheng and Jeng Yeun-Kung (2005) that he found the factors that influenced passengers' choice are airlines'facilities, safety record, ticket price, cabin food/beverage and on time performance. Whereas Zahari M. et al.(2011) studied the in-flight meals satisfaction is a re-flying intention found that the good quality of in-flight meal created a positive word of mouth. Alamdari Farida (1999) found that in-flight entertainment increased passenger loyalty and had a positive impact on airline revenues. She also pointed out that the airlines' product divided into four types, which are core product, expected product, augmented product and potential products. The core products are the fundamental product of airline service Ex. Safety, schedule, reliability. The expected products are, for example, seat comfort, food & drink; augmented products are limousine service and shower facility.

RESULTS

396 copies of the questionnaires were returned, 197 from Bangkok Airways' passengers and 199 from Thai Airways Internationals' passengers.

TABLE 1
THE RESPONDENTS' DATA

| Respondents	Number	Percentage
Male	140	35.35
Female	256	64.65
Total	396	100.00
Age		
21-30	163	41.16
31-40	132	33.33
41-50	64	16.16
Over 50	35	8.84
Others	2	.51
Purpose of travel		
Business	84	21.21
Leisure	104	26.26
VFR	161	40.66
Others	45	11.36

Table 1 illustrates the respondents' data including sex, age, education level and purpose of journey.

TABLE 2
THE OVERVIEW OF ALL RESPONDENTS TOWARDS SAMPLING AIRLINES

| Service Attributes	Means $(\bar{x})$	Standard Deviation of Importance (SD)	Level of Importance	Means $(\bar{x})$	Standard Deviation of Performance (SD)	Level of Satisfaction
Overall Ground Services	4.35	0.55	Very Important	3.96	0.77	High
Overall In-flight Services	4.45	0.55	Very Important	3.99	0.87	High
Overall importance & performance of service attributes	4.40	0.52	Very Important	3.97	0.79	High

Table 2 illustrates the overview of all respondents toward sampling airlines. It consists of the overall result attributes both on ground services, in-flight services and the combination of both activities. The respondents gave overall services very important and the services they perceived from the airlines are high. Consequently when the results were plotted in IPA graph as shown in figure 1, the result fell into quadrant II. That means the respondents expected a high level of airlines' services and the airlines perform a good services.

FIGURE 1
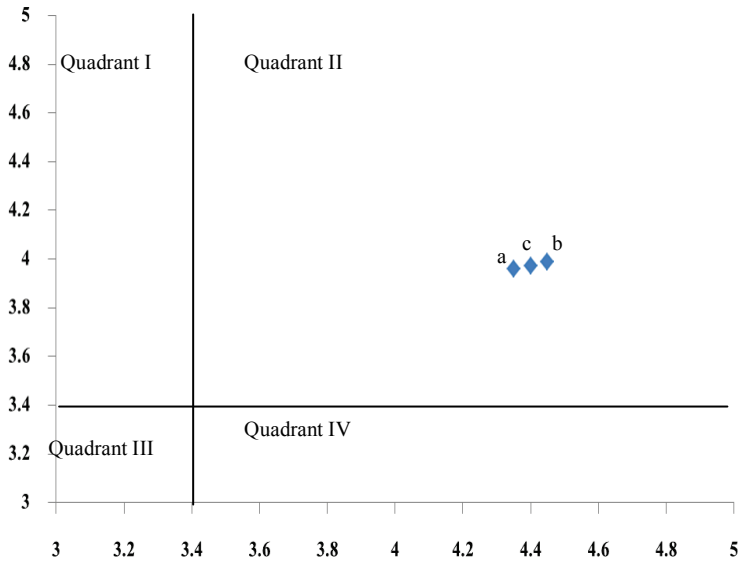
a = Overall Ground Services

b = Overall In-flight Services

c = Overall importance & performance of service attributes

FIGURE 2
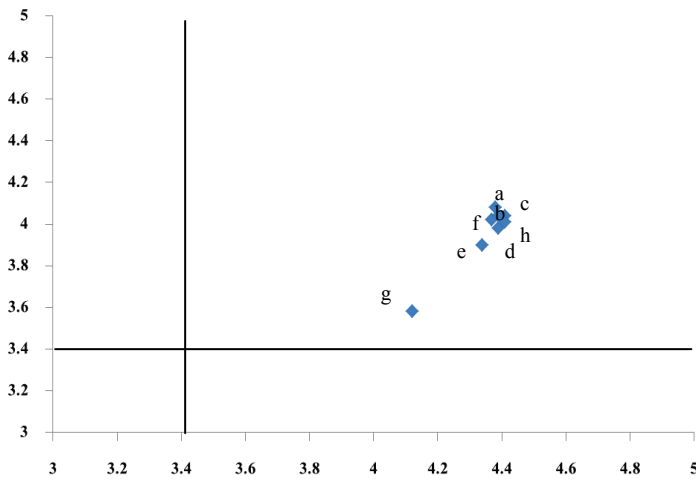
a = ease of reservation

b = courtesy of ground staff

c = fast check-in process

d = punctuality of flight

e = easy to use and find information in airline website

f = efficiency of baggage handling

g = reservation through smart phone

h = efficiency of ground staff in

handling discrepancies

FIGURE 3

a = in-flight facilities

b = courtesy of cabin crew

c = free meal & beverage

d = taste and variety of meals & beverages

e = flight safety

f = spacious seat

g = cleanliness of toilet

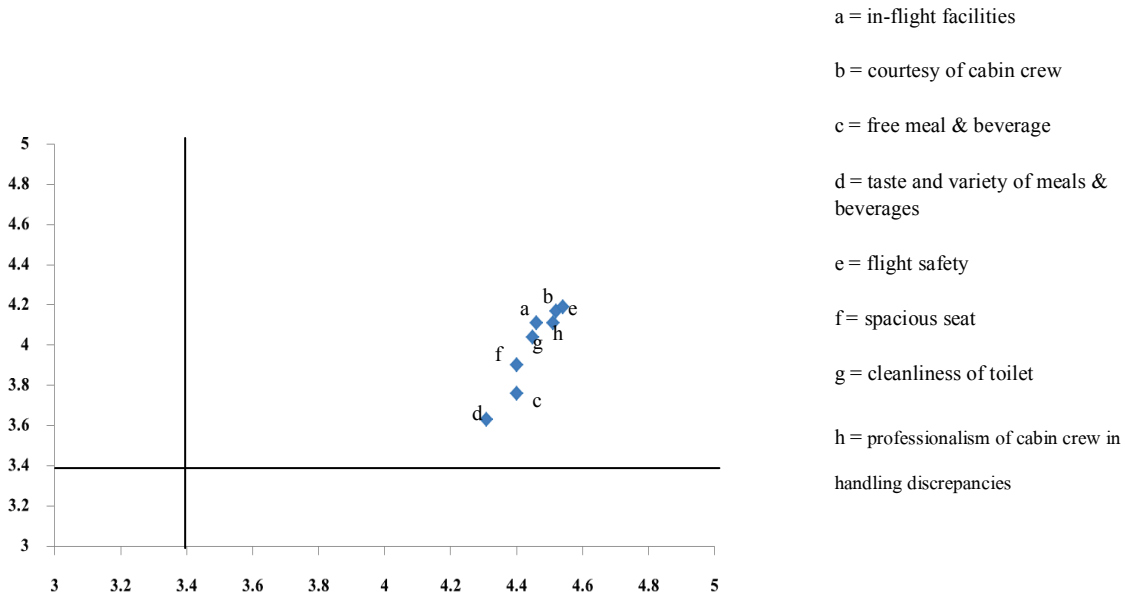h = professionalism of cabin crew in handling discrepancies

Figure 2 illustrates the ground service attributes plotted in IPA, including: ease of reservation, courtesy of ground staff, fast check-in procedure, ease to find information from airlines' website, quick baggage delivery, smart phone application, and professionalism of ground staff in handling discrepancies. Figure 3 illustrates the in-flight service attributes plotted in IPA including; in-flight facilities, courtesy of cabin crew, free meals & beverages, taste and variety of in-flight meals & beverages, in-flight safety procedure, spacious seats, cleanliness of toilet, and professionalism of cabin crew in handling discrepancies. Both figures represent the level of importance and level of satisfaction fell into quadrant II "keep up with good work". The respondents have high level of expectations and in the mean time they were satisfied with the services the airline provided.

For the factors affecting passengers' choice of flying an airline, divided into seven elements according to Zeithaml A. Valarie & Bitner J. Mary (2000) expanded marketing mix for services. The respondents were asked to score on each elements ranking from 1 if they found that element is the most influenced factor on their choice of airline, 2 is important and 3 is less important.

TABLE 3
THE EXPANDED MARKETING MIX IN AIRLINES' SERVICE RANKING

Factors affecting passengers' choice of airline	Elements
Product	1. Safety
	2. Various schedule times
	3. Spacious seat
Price	1. Suitable price
	2. Special package
	3. Value for the money
Place	1. Ease of reservation and payment via internet
	2. Able to check-in from home
	3. Various sale agency to contact
Promotion	1. Receive information via TV & Radio
	2. Receive information by newspaper
	3. Receive information by airlines' website
Process	1. Effective handling of baggage
	2. Fast check-in process
	3. Departure & Arrival flight on time

People	1. Courtesy of airline staff
	2. Professionalism of cabin crew in handling discrepancies
	3. Professionalism of ground personnel in handling discrepancies
Physical Evidence	1. Cleanliness of Cabin
	2. Beautiful of airlines' uniform
	3. Colorful seats

Table 3 shows the expanded marketing mix in airlines' service ranking serially according to respondents felt it influenced on their choice of airline, and separately by each mix elements from product to physical evidence.

CONCLUSION AND RECOMMENDATION

In conclusion, the use of IPA technique to evaluate Thaands' legacy airline service attributes both ground services and in-flight services on domestic flights. The survey result indicates that passengers have high levels of expectation on every services they confronted. And the airlines Thai Airways International and Bangkok Airways performed a good job and should maintain the service quality. As refered to IPA quadrant all performance fell into " keep up the good work". That means the passengers are satisfied with the services they received.

The factors that influenced passengers on their choice of airline are based on expanded marketing mix elements in the service industry. The passengers focus on safety, suitable price, ease of reservation and payment, television & radio advertising, effective of baggage handling, courtesy of airline staff and cleanliness of cabin. However, this study is administered only to Thais those who fly domestic. For further research in this field, researchers should be aware of various types of passengers with differents cultures and routes. According to Sultan F., Simpson C. M. Jr. (2000) studied international service variants: airline passenger expectations and perceptions of service quality between American and European found that the services perception is different by nationality.

The limitation of this study is the cooperation from the passengers. Since this research aims to collect the data from arriving passengers, they may have been worried about their baggage and many refused to fill out the questionaires.

IMPLEMENTATION

The study implies that airlines should continue improve and innovate their product and services according to the marketing mix elements that passengers accounted for influenced factors. As Shaw Stephen (2007) suggested, airlines should establish a rigorous products quality control, and correct the weaknesses as well as continous development by using the product life cycle lesson. Since the advancement of technology, airlines products have dramatically changed, as well as passengers' behavior. Taneja K. Nawal (2011) mentioned that information and technology are changing passenger expectations and behavior. The passengers feel empowered. They have lots of accurate information to compare the prices and services. And according to Hartman Peter,2011 quoted in Taneja K. Nawal (2011) KLM set up "KLM Social Media Hub" to handle requests, complaints, praise and measure for sentiment. Actually, there are many airlines adapt and improve their products continuously. For instance, www.airlinetrends.com published that Air New Zealand offers frequent flyers a space to work in downtown Auckland; Philippine Air lets customers without credits card book and pay at 7-11; Qantas updates Boeing 767 fleet with iPad-friendly seats.

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