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Full Length Research Paper

An integrated approach of Kano's model and Importance-Performance Analysis in identifying key success factors

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This study proposes perceived 'Importance-Performance Analysis' by simultaneously integrating 'importance-performance analysis' and Kano's model in identifying key success factors. Kano's model, which provides a two-dimensional view of quality, is a very useful tool to identify which customer requirements of a particular product or service might be more than the proportional satisfaction to customers. Importance-Performance Analysis can be applied to identify the strengths and weaknesses quality attributes from customers' viewpoints by simultaneously evaluating importance and performance. The proposed perceived Importance-Performance Analysis provides much more useful information that allows the decision maker to classify the quality attributes into different categories and prioritize the importance of these quality attributes for improvement. A case study of a 3C retailer is provided by applying the proposed perceived Importance-Performance Analysis, and as such, the findings based on this proposed method are discussed.

Key words: Kano's model, Kano's questionnaire, Importance-Performance Analysis, perceived importance, performance.

INTRODUCTION

E-Life Mall Corporation is one of the leading and largest 3C (computer, communication and consumer electronics) retailers with more than 290 stores in Taiwan market. In addition to E-Life Mall Corporation, Tsann Kuen Enterprise Company Limited is the largest retailer in terms of sales with more than 260 stores Island-wide. Tatung Company has about 270 stores, while Sunfar Computer Company Limited has about 70 stores. The retailing market in Taiwan is very competitive because each company has been aggressively conducting promotional campaigns to stimulate domestic demand.

The promotional campaigns include a wide variety of payment plans, discounts, home delivery services and other bargains to attract more customers, such as zero-interest loan service and installment payment project, lowest prices on particular home appliances and so on. Due to the fact that the Taiwan's market in 3C products has reached saturation, one company's gain would result in others' losses. Besides, the external environment has changed such as the changes of consumption patterns, shorter product life cycle and the popularization of marketing channels. Moreover, the limitations of internal conditions of firms such as limited resources, lack of sufficient market information and the limitation of technologies upgrade might force firms to identify critical success factors by deploying internal business resources and integrating technologies both effectively and efficiently to create corporate profits and sustainable development. Under such circumstances, it would be of interest to identify the key success factors (KSFs) of E-Life Mall Corporation with the most chain stores in Taiwan, because these key success factors might enable the management to develop and execute policies effectively and efficiently (de Waal and Gerritsen-Medema,

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2006).

This study proposes an integrated approach of Importance-Performance Analysis (IPA) and Kano's model to evaluate, identify and then classify the major strengths and weaknesses of the key success factors of E-Life Mall Corporation. By incorporating Kano's model, the identified major strengths and weaknesses can be further classified into different types of categories. In doing so, the management is able to prioritize the major strengths psychologically as well as determine the improvement on importance of major weaknesses. This paper is organized as follows: It summarizes key success factors and reviews the Importance-Performance Analysis briefly. Also, Kano's model is discussed in this paper. An integrated approach of IPA and Kano's model is proposed and summarized as a case study of applying this proposed model in evaluating the key success factors of E-Life Mall Corporation. Finally, discussions and conclusions were summarized at end of the paper.

KEY SUCCESS FACTORS

According to Leidecker and Bruno (1987), key success factors are "those characteristics, conditions or variables that, when properly sustained, maintained or managed, can have a significant impact on the success of a firm competing in a particular industry." Grunert and Ellegaard (1993) argued that the key success factors are "the few key areas where things must go right for the business to flourish and for the managers' goals to be attained." Rockart (1979) developed the key success factors concept as a way of identifying the general managers' information needs, and he defined KSFs as "those few critical areas where things must go right for the business to flourish." In addition, Grunert and Ellegaard (1993) also believed that the concept of KSFs is the core of business strategy. Aaker (2001) pointed out that KSFs are a competitive skill or asset that is needed to compete successfully. Moreover, strategy development needs to be based on difficult judgments about what the KSFs will be in the future (Aaker, 2001). Key success factors therefore have an important role in disciplining the competitive analysis process, for the direct attention to high leverage competences (Day and Wensley, 1988).

IMPORTANCE-PERFORMANCE ANALYSIS REVIEW

Importance-performance analysis, originally proposed by Martilla and James (1977), was to provide insights to management in order to identify the strengths and weaknesses of a company. Importance-Performance Analysis is typically viewed as a part of marketing research techniques that involve the analyses of customer attitudes toward salient product or service attributes and helps practitioners prioritize the improvement opportunities for product or service attributes and direct quality-based marketing strategies (Joppe et al., 2001; Eskildsen and Kristensen, 2006; Shieh and Wu, 2009). More importantly, IPA is able to identify the most important attributes to the customer with the highest impact on customer satisfaction and, simultaneously, the low performance attributes required to be improved immediately (Matzler et al., 2003; Deng et al., 2008). Importance-performance analysis, constructed by a two-dimensional matrix, uses importance as an x-axis and performance as a y-axis to form four quadrants as shown in Figure 1.

These four quadrants consist of "keep up the good work" (Quadrant I), "possible overkill" (Quadrant II), "low priority" (Quadrant III) and "concentrate here" (Quadrant IV) (Daniels and Marion, 2006; Deng et al., 2008; Wu and Shieh, 2009). Specifically, attributes located in Quadrant I have both high performance and high importance and are viewed as the opportunities to achieve or maintain competitiveness for organizations. Quadrant II has high performance but low importance, which indicates that the resources committed to these attributes are excessive and should be deployed elsewhere. Quadrant III has the characteristics of both low performance and low importance, and these attributes do not require additional efforts. Finally, attributes in Quadrant IV with low performance but high importance are considered as major weaknesses for an organization. As a consequence, immediate attention for improvement is required. The focal point is that the inability to identify the attributes in Quadrant IV might result in low customer satisfaction. In fact, immediate improvement efforts should be placed in the highest priority when major weaknesses are identified, while attributes in Quadrant I regarded as major strengths should be maintained, leveraged and heavily promoted (Daniels and Marion, 2006; Deng et al., 2008; Wu et al., 2008).

KANO'S MODEL

Kano's model based on the two-factor theory of job satisfaction by Herzberg is a very useful diagram to identify which customer requirements of a particular product or service might bring more proportional satisfaction to customers (Tan and Shen, 2000; Kuo, 2004; Tontini, 2007). That is, the one-dimensional (linear) view of quality for a particular product or service cannot be always explained (Wang and Wu, 2009). In fact, a product or service might induce a variety of distinct types of satisfaction or dissatisfaction depending upon whether customer needs are fulfilled completely, met partially, or unserved (Martensen and Gronholdt, 2001). Based on Kano's model, customer requirements can be classified into five categories (Figure 2) (Gitlow, 1998; Kuo, 2004; Busacca and Padula, 2005):

(i) Must-be quality element: The must-be requirements fulfill the basic functions of a product. Customers consider these requirements as prerequisites if present.

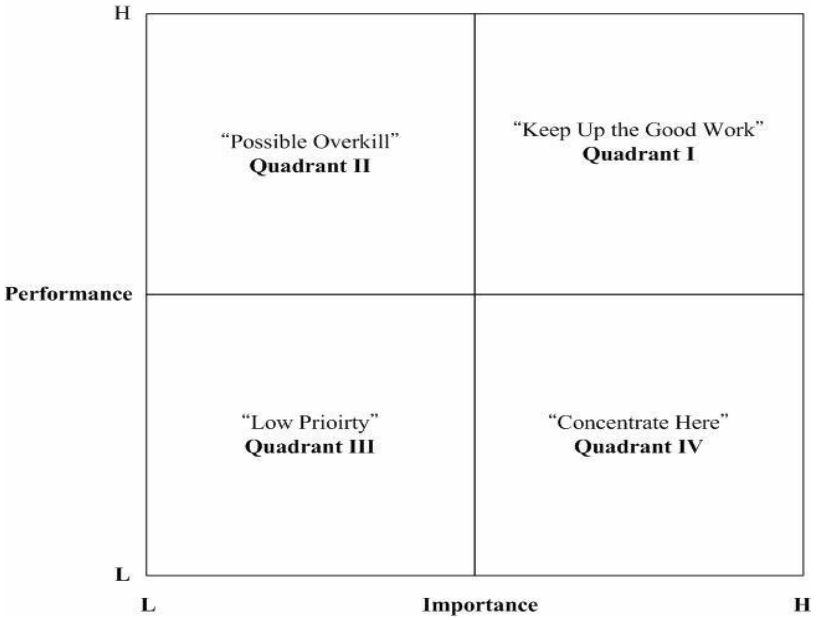

Figure 1. Importance-Performance Analysis.

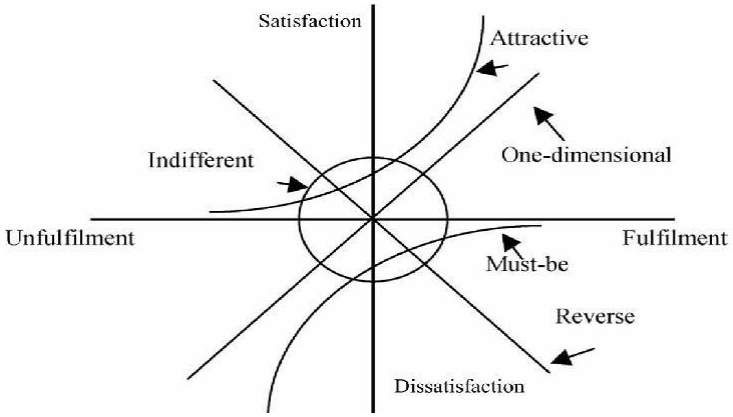

Figure 2. Five major categories of customer requirements in Kano's model.

However, if these requirements are not present, customers will be extremely dissatisfied.

(ii) One-dimensional quality element: Customer satisfaction is proportional to one-dimensional quality element. The higher the one-dimensional quality element, the higher the customer's satisfaction will be and vice versa. As such, customers typically and explicitly demand the one-dimensional requirements.

(iii) Attractive quality element: High level of attractive quality performance creates feelings of delight for a customer. On the contrary, low level of performance creates feelings of indifference to the requirement. These requirements are not demanded nor expected by customers.

(iv) Indifferent quality: Customers will be indifferent whether or not the quality element is present.

(v) Reverse quality: Customers will be dissatisfied when the quality element is present and vice versa.

Unlike typical questionnaires, Kano's model uses a pair of questions by asking the respondents to evaluate which customer requirements do not bring satisfaction when present as well as bring dissatisfaction when these requirements are not met (Matzler et al., 1996; Matzler and Hinterhuber, 1998; Tan and Shen, 2000; Wang and Wu, 2009). A pair of the Kano's model question is as follows:

How would you feel if this product or service feature were present?

Table 1. Kano's interpretation table.

		Absent question response				
		Delighted	Expect it and like it	No feeling	Live with it	Do not like it
	Delighted	Questionable	Attractive	Attractive	Attractive	One-dimensional
Present question response	Expect it and like it	Reverse	Indifference	Indifference	Indifference	Must-be
	No feeling	Reverse	Indifference	Indifference	Indifference	Must-be
	Live with it	Reverse	Indifference	Indifference	Indifference	Must-be
	Do not like it	Reverse	Reverse	Reverse	Reverse	Questionable

Table 2. A hybrid Kano-questionnaire.

	Select only one option in each row	**Do not like it**	**Live with it**	**No feeling**	**Expect it and like it**	**Delight**
Product	With it	1	2	3	4	5
feature	Without it	1	2	3	4	5

How would you feel if this product or service feature were not present?

For each question, there are five answers to choose from, namely: (1) delight, (2) expect it and like it, (3) no feeling, (4) live with it and (5) do not like it (Gitlow, 1998; Wang and Wu, 2009). When the data have been collected, Table 1 is used to classify the present/not present data from each respondent into a Kano's category. To determine a product or service feature in an appropriate Kano's category from a group of respondents, a formula is depicted as follows (Gitlow, 1998):

Kano's category = maximum (A, O, M) if A + O + M > I + Q + R

or

= maximum (I, Q, R) if A + O + M ≤ I + Q + R

Where, A, O, M, I, Q and R represent attractive, one-dimensional, must-be, indifferent, questionable and reverse quality elements, respectively. Chen and Su (2006) have proposed a Kano-CKM model to discover the customer knowledge by developing a hybrid Kano-questionnaire which integrates a five-level Likert scale and Kano's classification questionnaire as shown in Table 2. For instance, "delight" corresponds to "extremely important" with the weight of five, while "do not like it" corresponds to "unimportant" with the weight of one. This hybrid Kano-questionnaire enables the management to concurrently collect both the numerical data with five levels and classification information on the same survey. The major advantage of applying this hybrid Kano-questionnaire is that a product or service feature can be classified into an appropriate Kano's category and be analyzed by some statistical methods to identify some significant factors if some demographic information is provided.

An integrated approach of Kano's model and IPA

Vavra (1997) used self-stated or explicit importance and implicitly derived importance from IPA to form a two-dimensional importance grid to identify three satisfaction factors. The self-stated importance is to ask each respondent to evaluate the importance of a particular item based on a Likert scale, while the derived importance is to derive the importance value for each item such as multiple regression, structural equation modeling, or partial correlation (Deng et al., 2008). Three satisfaction factors as shown in Figure 3 include basic attributes (expected or must-be), one-dimensional performance attributes with either high importance or low importance and exciting attributes (unexpected or delightful) (Matzler and Sauerwein, 2002; Busacca and Padula, 2005). Two grids are required in order to classify each item into one of the three satisfaction factors and one of the four quadrants. Importance-Performance Analysis is to identify the strength or weakness of a particular item, while explicit and implicit importance grids are to further analyze the satisfaction of this particular item statistically.

In this study, an integrated approach of Kano's model and IPA is proposed to identify the strength or weakness and the satisfaction factor simultaneously for a particular item by the same questionnaire. In fact, a hybrid Kano-questionnaire proposed by Chen and Su (2005) can be implemented in an IPA to replace the self -stated importance. Since the importance of this hybrid Kano-questionnaire is determined and perceived by the respondents, the importance-axis is then renamed as

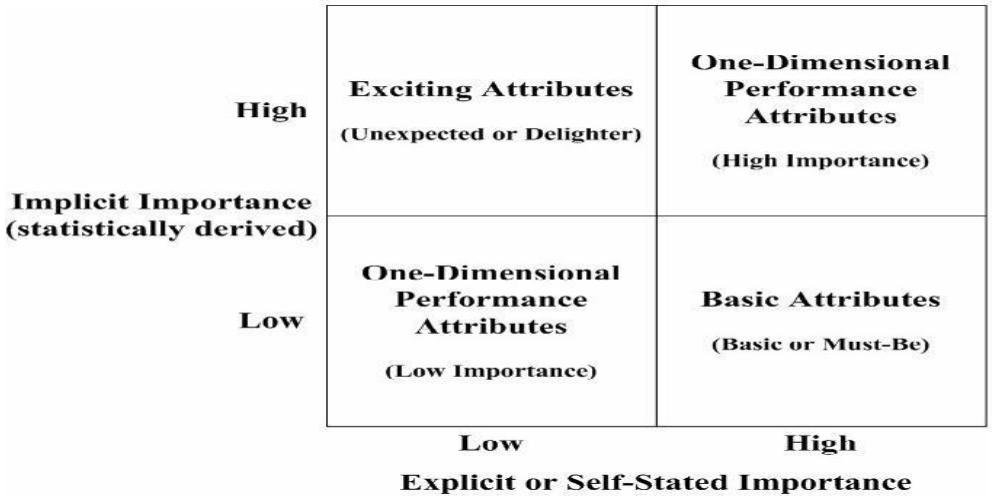

Figure 3. Three satisfaction factors by explicit and implicit importance.

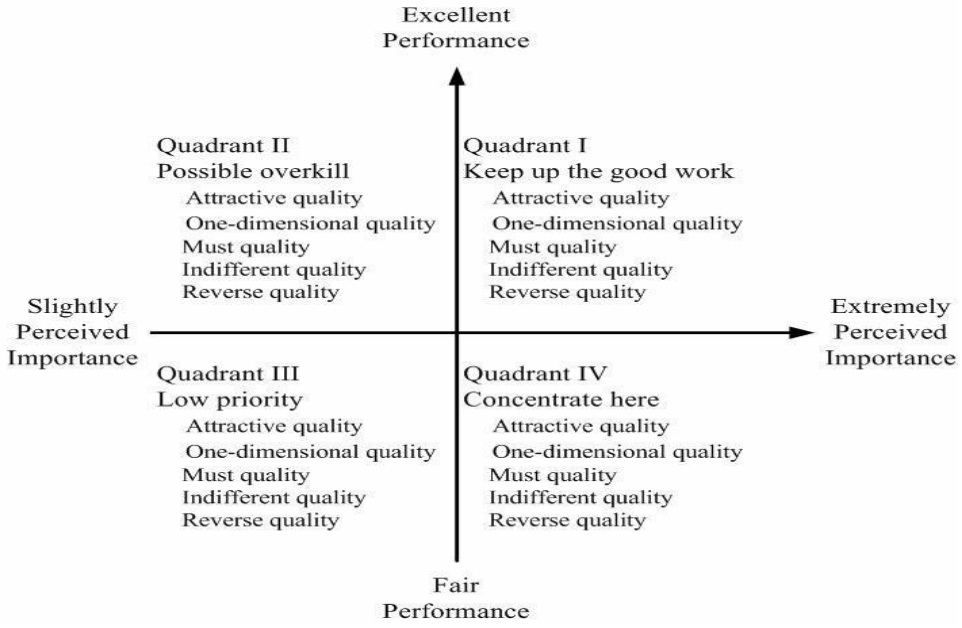

Figure 4. The perceived Importance-Performance Analysis.

perceived importance-axis shown in Figure 4. The survey of gathering the needed information was shown in Table 3. Each service feature can be plotted in one of the four quadrants by using "how do you feel if a particular service feature of E-Life Mall Corporation were present" and "how do you evaluate the performance of this particular service feature of E-Life Mall Corporation." Moreover, when a service feature has been classified into one of the four quadrants, the appropriate Kano's category can be evaluated by using "how do you feel if a particular service feature of E-Life Mall Corporation was present" and "how do you feel if a particular service feature of E-Life Mall Corporation was not present."

A CASE STUDY

A case study of applying the proposed approach model in identifying key success factors of E-Life Mall Corporation is illustrated here. A questionnaire was developed based on the related references including Onkvisit and Shaw (1981) , Chen (2004), Chang (2005) and Kotler (2006). There are seven constructs with thirty items, shown in Table 4, in this questionnaire including channel strategy,

Table 3. A typical questionnaire used to perceive the importance-performance analysis.

	How do you feel if this particular service feature of E-life Mall Corporation was present?	How do you feel if this particular service feature of E-life Mall Corporation was not present?	How do you evaluate the performance of this particular service feature of E-life Mall Corporation?
Quick maintenance service	Delight	Delight	Very satisfactory
	Expect it and like it	Expect it and like it	Satisfactory
	No feeling	No feeling	Neutral
	Live with it	Live with it	Dissatisfactory
	Do not like it	Do not like it	Very dissatisfactory

commodity strategy, promotion strategy, price competitiveness, after-sale service quality, information systems service and corporate image. Table 3 is a typical questionnaire used in this study. For each item, a pair of questions was asked if this particular item was present and if this particular item was not present. The information of the perceived importance for each item is from the question "if this particular item was present". The selections of "delight", "expect it and like it", "no feeling", "live with it" and "do not like it" can be transformed into numerical figures of 5, 4, 3, 2 and 1, respectively, based on the hybrid Kano-questionnaire. In addition, the performance for each item was evaluated by a Likert-type five-point scale, where 1 and 5 represent 'very dissatisfactory' and 'very satisfactory', respectively.

The survey was conducted from July 22 - August 4 in 2007 in Taichung City, Taiwan. A total of 197 valid questionnaires were received and the valid return rate was 93.8%. The reliability of the survey was measured by Cronbach's α and the numerical figures of the seven constructs and overall reliabilities in perceived importance and performance of E-Life Mall Corporation were provided in Table 5. The construct validity was supported by factor loading, while the structure in factor analysis went well with the structure of the questionnaire by the Kaiser-Meyer-Olkin statistic of 0.873 and Bartlett's test of sphericity with χ^2 = 3593.246 (P-value = 0.000). In the survey, some demographic information such as gender, age, occupation, income and visit frequency per week are depicted in Table 6. The mean values of perceived importance and performance of E-Life Mall Corporation are summarized in Table 7.

The major strengths and weaknesses of E-Life Mall Corporation in critical success factors are depicted in Figure 5. Items 1, 3, 11, 15, 19, 20, 21, 27 and 29 are located in Quadrant I, and these nine critical success factors are the major strengths possessed by E- Life Mall Corporation. In contrast to the major strengths, items 5, 8, 12, 13, 14, 18, 22, 23, 24 and 25 are placed in Quadrant IV, which indicate that E-Life Mall Corporation does not perform well in these ten critical success factors from the customers' viewpoints. In order to penetrate the marketplace, E-Life Mall Corporation needs to invest more resources to improve these ten critical success factors in higher priority. By further taking into account the Kano's category for each item, Table 8 summarizes the specific information and Figure 6 provides the integrated information of IPA and the type of quality based on Kano's category. As such, both Quadrants I and II are viewed as strengths. In order to gain competitiveness, items belonging to attractive quality should be placed in the highest priority, while one-dimensional quality items and must-be quality items should be placed in second and third priority, respectively. If many items are classified into the same Kano's category, the perceived importance can become the "weight" to differentiate the items. In contrast to the strengths, Quadrants III and IV are considered as the weaknesses. Under such circumstances, must-be quality items are the most important items to be improved. The sequence is M > O > A. By observing Figure 6 and Table 8, items 1, 3, 11, 15, 19, 20, 21, 27 and 29 are viewed as the major strengths of E-Life Mall Corporation. In addition, items 1, 11 and 29 are attractive quality elements, whereas the others are one-dimensional quality elements. In this case, items 1, 11 and 29 are the three highest elements to be implemented. To further rank the priority, the importance values of these three items can be used, that is, 11 (4.4772) > 29 (4.4619) > 1 (4.4264). When these three attractive quality elements are implemented, the next step is to implement one-dimensional quality elements. For the fact that items 3, 15, 19, 20, 21 and 27 belong to one-dimensional quality element, the sequence can be determined by the importance values. Thus, 20 (4.5990) > 19 (4.4619) > 27 (4.4365) > 15 (4.4315) > 3 (4.3959) > 21 (4.3452) is obtained. Therefore, the priority of excelling operational excellence of E-Life Mall Corporation is 11 > 29 > 1 > 20 > 19>27>15>3>21.

The items falling in Quadrant II belong to possible overkill with low importance but high performance. For the fact that these items are considered as the next competitive advantages, the firm should avoid committing excessive resources on these items. In this quadrant, item 10 is the attractive quality element, while item 28 belongs to the must-be quality element and items

Table 4. Thirty items in the questionnaire based on seven constructs.

Construct	Item
Store management strategy	Adequate chain stores close to the residential areas.
	Adequate products supply.
	Efficient and accurate logistics distribution.
	Provision of virtual channel.
Commodity strategy	Complete product range for one-stop shopping requirements.
	Faster goods replacement and new products to the market.
	Unique commodities.
	Neatness on goods' display and layout.
Promotion strategy	Creative promotion strategies for both virtual and practical channels integration.
	Promotional activities for occasional festivals.
	Intensive promotional or discount activities.
	Free or low-income threshold of the membership systems.
Price competitiveness	Competitive and cheaper products.
	Cheap accessories and maintenance.
	Clear price tags for products.
	Lowest price guarantee with refund.
After-sale service quality	24-hour toll-free telephone service.
	Quick maintenance services.
	Home delivery services.
	Home installation services.
	Easy access for store activities information.
	Maintenance products for home delivery service.
Information systems service	Professional advices online.
	Provision of online services such as product introduction and price inquiry.
	Ease and convenience of use of online services.
	Customer information retention and the initiative offers' links.
Corporate image	Good company's image and credibility.
	Sound financial position.
	Public welfare activities to the community.
	Descriptions of the concept of operations.

Table 5. The reliabilities measured by Cronbach's α.

Construct	Perceived importance	Performance
Store management strategy	0.705	0.789
Commodity strategy	0.738	0.772
Promotion strategy	0.775	0.722
Price competitiveness	0.764	0.832
After-sale service quality	0.810	0.792
Information systems service	0.833	0.903
Corporate image	0.756	0.839
Overall reliability	0.940	0.941

Table 6. The demographic information from the survey.

Item	Classification	Number of times	Percentage (%)
Gender	Male	100	50.8
	Female	97	49.2
Age group	20 and below	9	4.6
	21-30	106	53.8
	31-40	58	29.4
	41-50	8	4.1
	51-60	13	6.6
	61 and above	3	1.5
Occupation	Manufacturing	53	26.9
	IT industry	8	4.1
	Finance and insurance	30	15.2
	Service industry	30	15.2
	Industry, commerce and trade	14	7.1
	Student	30	15.2
	Public servant	14	7.1
	Liberal industry	2	1.0
	Other	16	8.1
Income	20,000 and below	41	20.8
	20,001 – 40,000	98	49.7
	40,001 – 60,000	32	16.2
	60,001 – 80,000	25	12.7
	80,001 – 100,000	1	0.5
Visit frequency per week	Zero or one	173	87.8
	Two or three	22	11.2
	Six and above	2	1.0

Table 7. The mean values of perceived importance and performance of E-Life Mall Corporation.

Service item	Perceived importance	Performance
1	4.4264	3.5787
2	4.3299	3.2538
3	4.3959	3.2944
4	3.9949	3.0863
5	4.4213	3.1371
6	4.0457	3.1066
7	4.1371	3.1066
8	4.4822	3.2589
9	4.1421	3.3096
10	4.1320	3.4619
11	4.4772	3.4061
12	4.3858	3.2335
13	4.5279	3.0761
14	4.4721	3.1168
15	4.4315	3.3655
16	4.2487	3.0863

Table 7. Cont'd

17	4.2690	3.1320
18	4.4924	3.0660
19	4.4619	3.4061
20	4.5990	3.6193
21	4.3452	3.2792
22	4.4619	3.2132
23	4.3401	3.0355
24	4.3858	3.1168
25	4.3706	3.0863
26	4.1523	3.1218
27	4.4365	3.7665
28	4.2792	3.5076
29	4.4619	3.4569
30	4.0660	3.6193
Grand mean	4.3391	3.2768

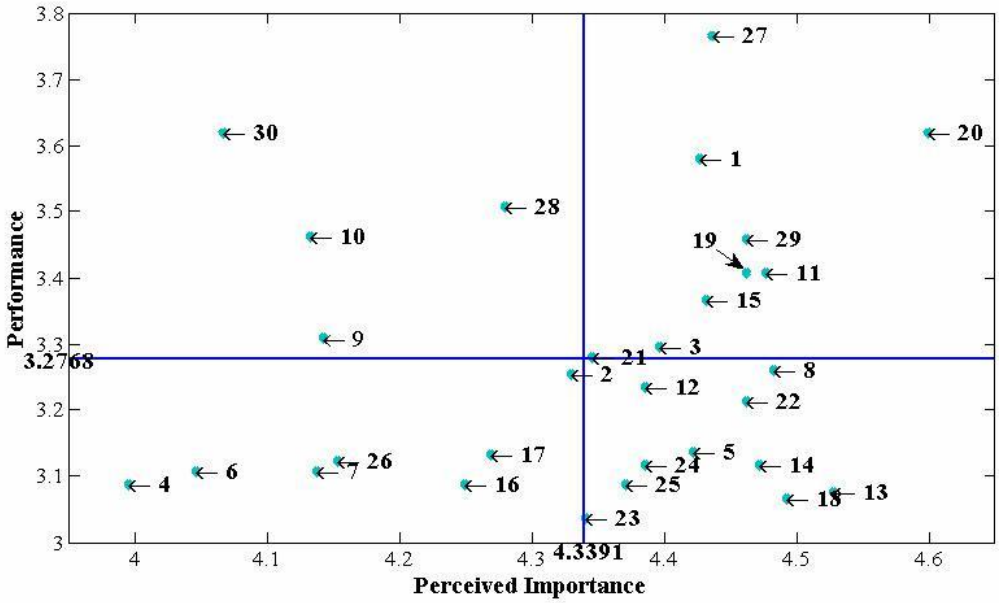

Figure 5. The perceived Importance-Performance Analysis of E-Life Mall Corporation.

9 and 30 are indifferent quality elements. Therefore, the priority of the next competitive advantages for E-Life Mall Corporation is 10 (4.1320) > 28 (4.2792) > 9 (4.1421) > 30 (4.0660) . The items classified into Quadrant III are in low priority with both low importance and performance. These items belong to the minor weaknesses which should be improved after the major weaknesses identified in Quadrant IV. In this quadrant, items 2 and 26 are must-be quality elements, items 16 and 17 belong to one-dimensional quality elements, item 7 is attractive quality element and items 4 and 6 are indifferent quality elements. Therefore, the sequence of improving minor weaknesses for E-Life Mall Corporation is 2 (4.3299) > 26 (4.1523) > 17 (4.2690) > 16 (4.2487) > 7 (4.1371) > 6 (4.0457) > 4 (3.9949). Items 5, 8, 12, 13, 14, 18, 22, 23, 24 and 25 are located in Quadrant IV and they belong to the major weaknesses of E- Life Mall Corporation. By further observing the Kano's classification in Table 8, items 5, 8, 12 and 24 are attractive quality elements, and items 13, 14, 18, 22, 23 and 25 are one-dimensional quality elements. In this case, there is no any must-be quality element. Thus, the focus begins with one-dimensional quality elements. That is, items 13, 14, 18, 22, 23 and 25 have higher priorities than items 5, 8, 12,

Table 8. The Kano's categories of thirty items in this study.

Kano's category	Item
Attractive quality	Adequate chain stores close to the residential areas.
	Complete product range for one-stop shopping requirements.
	Unique commodities.
	Neatness on goods' display and layout.
	Promotional activities for occasional festivals.
	Intensive promotional or discount activities.
	Free or low-income threshold of the membership systems.
	Provision of online services such as product introduction and price inquiry.
	Public welfare activities to the community.
One-dimensional quality	Efficient and accurate logistics distribution.
	Competitive and cheaper products.
	Cheap accessories and maintenance.
	Clear price tags for products.
	Lowest price guarantee with refund.
	24-hour toll-free telephone service.
	Quick maintenance services.
	Home delivery services.
	Home installation services.
	Easy access for store activities information.
	Maintenance products for home delivery service.
	Professional advices online.
	Ease and convenience of use of online services.
	Good company's image and credibility.
Must-be quality	Adequate products' supply.
	Customer information retention and the initiative offer links.
	Sound financial position.
Indifferent quality	Provision of virtual channel.
	Faster goods replacement and new products to the market.
	Creative promotion strategies for both virtual and practical channels integration.
	Descriptions of the concept of operations.

and 24 for continuous improvement since the expectations of items 5, 8, 12 and 24 are relatively lower than those of the one-dimensional quality elements. To further prioritize the implementation procedure of six one-dimensional quality elements, the importance values can be used. Thus, 13 (4.5279) > 18 (4.4924) > 14 (4.4721) > 22 (4.4619) > 25 (4.3706) > 23 (4.3401) is observed. By the same token, the implementation procedure of these four attractive quality elements is 8 (4.4824) > 5 (4.4213) > 12 (4.3858) = 24 (4.3858) . Finally, the priority of continuous improvement on E-Life Mall Corporation is 13 > 18 > 14 > 22>25>23>8>5>12=24.

CONCLUSIONS AND DISCUSSION

This study proposes an integrated approach of Importance-Performance Analysis and Kano's model in identifying key success factors. Competition is an essential consideration in an external marketing analysis. Competitive firms have to understand a reasonable assessment of their competitors in order to select the most accurate competitive indicators and then compete most effectively. Grunert and Ellegaard (1993) concluded that KSFs are "a skill or resource that a company can invest in, which explains a major part of the observable differences in perceived value and/ or costs of the market the company is operating on". In addition, Aaker (2001) suggested that, an important output of market analysis is the identification of KSFs for strategic groups in the market. Moreover, KFSs are assets and skills that provide the bases for competing successfully (Aaker, 2001).

Thus, key success factors were composed of the results in this study. Some strategies can be developed

Performance

Quadrant II

Item	Kano's Category	Perceived Importance
10	A	4.1320
28	M	4.2792
9	I	4.1421
30	I	4.0660

Quadrant I

Item	Kano's Category	Perceived Importance
11	A	4.4772
29	A	4.4619
1	A	4.4264
20	O	4.5990
19	O	4.4619
27	O	4.4365
15	O	4.4315
3	O	4.3959
21	O	4.3452

Perceived Importance

Quadrant III

Item	Kano's Category	Perceived Importance
2	M	4.3299
26	M	4.1523
17	O	4.2690
16	O	4.2487
7	A	4.1371
6	I	4.0457
4	I	3.9949

Quadrant IV

Item	Kano's Category	Perceived Importance
13	O	4.5279
18	O	4.4924
14	O	4.4721
22	O	4.4619
25	O	4.3706
23	O	4.3401
8	A	4.4822
5	A	4.4213
12	A	4.3858
24	A	4.3858

Figure 6. The information of Kano's category for each item under perceived Importance-Performance Analysis.

based on Figure 6, in that Quadrant I kept up the good work. As such, two major strategies can be identified by E-Life Mall Corporation, namely attractive-keeping marketing strategy and one-dimensional- keeping marketing strategy. The focal point of the former strategy is to keep the intensity of distribution of stores, the number of activities or discount schemes for promotion and the public welfare activities to the community. From the managerial implications, the competitiveness of E-Life Mall Corporation comes from maintaining these strategies in the highest priority. Therefore, the management of E-Life Mall Corporation should pay much attention to strengthen and retain these strategies to solidify the competitive advantages. Moreover, by maintaining these strategies, customer satisfaction would be improved drastically to become the competitive differentiation.

The essentials of one-dimensional-keeping marketing strategy include the efficiency of logistics distribution, clear price tags on commodities, home delivery services, home installation services, easy access of activities information of stores for advertisement and corporate image-building. The competitiveness of E-Life Mall Corporation is to maintain these strategies. The more the management strengthens and retains the strategies, the more satisfied the customers would be. Therefore, E-Life Mall Corporation can use these marketing strategies more effectively to meet customer needs and increase the competitive gaps with its major competitors. On Quadrant IV, two major strategies can also be identified by E-Life Mall Corporation, that is, attractive-concentrating marketing strategy and one-dimensional-concentrating marketing strategy. The focal point of the former strategy includes the width of product mix, product layout in stores, free or low-cost threshold of the membership systems and online internet marketing. From the managerial implications, E-Life Mall Corporation does not perform well in these strategies, which are the major weaknesses in the market. Therefore, the management should put more resources to remedy these deficiencies in high priority. In doing so, customer satisfaction can be improved to form the competitive differentiation. The essentials of one- dimensional-concentrating marketing strategy are to set the prices which are lower than the competitors' prices, improve the prices of accessories and maintenance, speed up the maintenance services, offer maintenance products for home delivery services, make professional inquiry online available and provide ease-of-use online interface. From the managerial implications, E-Life Mall Corporation does not perform well in these customer-focused strategies, which are the major weaknesses in the market. Therefore, the management should invest more resources to improve these weaknesses in the highest priority. The customers would feel more satisfied if E-Life Mall Corporation can provide more of these marketing strategies. In contrast, the customer might feel less satisfied if the company provides less. By doing these strategies well to meet customer needs, the competitive gaps between the company and competitors can be increased.

In summary, in order to keep up the good work, attractive-keeping marketing strategy is more important than one-dimensional-keeping marketing strategy. On the contrary, one- dimensional-concentrating marketing strategy is more important than attractive-concentrating marketing strategy and more resources should be invested in one- dimensional-concentrating marketing strategy when the major weaknesses are identified. By performing attractive-keeping marketing strategy, the company can dramatically enhance customer satisfaction to gain competitiveness. Both academics and managers believe that customer satisfaction will drive improved business performance (Oliver, 1997) . Moreover, an increase in customer satisfaction should ultimately lead to either or both an increase in sales (Drake et al., 1998) or a decrease in costs and, hence, improved profitability (Yeung and Ennew, 2000). From the managerial implication, by performing attracting- keeping marketing strategy, the company can enhance sales, or improve business performance. In order to reduce customer dissatisfaction, one-dimensional-concentrating marketing strategy should be placed in front of attractive-concentrating marketing strategy when the resources in the company are limited. According to Hirschman (1970), customer dissatisfaction provokes two active negative responses, voice and exit, which present different opportunities and threats to profits. Levesque and McDougall (1996) argued that, customer dissatisfaction erodes the firm's reputation.

Additionally, Heskett et al. (1997) suggested that, customer dissatisfaction will impede customer loyalty and repeat purchase. From the managerial implication, by performing one-dimensional-concentrating marketing strategy, the company possibly reduces hamper of customer loyalty, repeat purchase and firm's reputation. Kano's model which provides a two-dimensional view of quality is a very useful tool to identify which customer requirements of a particular product or service might be more than the proportional satisfaction to customers. In addition, IPA can be applied to identify the strengths and weaknesses quality attributes from customers' points of view by simultaneously evaluating importance and performance. The proposed approach provides much more useful information that allows the decision maker to not only classify the quality attributes into different categories based on Herzberg's two-factor theory of job satisfaction, but also prioritize the importance of these quality attributes for improvement.

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