# 行政院國家科學委員會專題研究計畫 成果報告

# 建構服務創新、價值共創之體驗式服務補救機制 研究成果報告(精簡版)

計畫類別:個別型

計 畫 編 號 : NSC 99-2410-H-032-096-

執 行 期 間 : 99年11月01日至100年10月31日

執 行 單 位 : 淡江大學資訊管理學系

計畫主持人:解燕豪

報告附件:出席國際會議研究心得報告及發表論文

公 開 資 訊 : 本計畫涉及專利或其他智慧財產權,2年後可公開查詢

中華民國100年11月24日

In the era of experience economy, the most important 中文摘要: purpose for service providers is to provide quality service experiences with customers. However, a service experience is composed of a set of service encounters. Delivering a high-quality service experience is very complicated and needs to be carefully designed. Furthermore, service recovery is one important key to influence service experiences but is difficult to manage. Meanwhile, customer involvements are also a possible way to co-create values with service providers. Hence, this study is to explore if there is any opportunity for service providers to enable customers to join the service recovery process to generate innovative values. Consequently, this study is to build a conceptual framework for service recovery design by considering customer involvement. We also use a scenario to demonstrate the feasibility of the proposed framework via service blueprinting.

中文關鍵詞: Service recovery, Customer involvement, Value cocreation, Service experience, Service science

英文摘要: In the era of experience economy, the most important purpose for service providers is to provide quality service experiences with customers. However, a service experience is composed of a set of service encounters. Delivering a high-quality service experience is very complicated and needs to be carefully designed. Furthermore, service recovery is one important key to influence service experiences but is difficult to manage. Meanwhile, customer involvements are also a possible way to co-create values with service providers. Hence, this study is to explore if there is any opportunity for service providers to enable customers to join the service recovery process to generate innovative values. Consequently, this study is to build a conceptual framework for service recovery design by considering customer involvement. We also use a scenario to demonstrate the feasibility of the proposed framework via service blueprinting.

英文關鍵詞:

# A FRAMEWORK FOR CUSTOMER

# INVOLVEMENT-BASED SERVICE RECOVERY DESIGN

## **Abstract**

In the era of experience economy, the most important purpose for service providers is to provide quality service experiences with customers. However, a service experience is composed of a set of service encounters. Delivering a high-quality service experience is very complicated and needs to be carefully designed. Furthermore, service recovery is one important key to influence service experiences but is difficult to manage. Meanwhile, customer involvements are also a possible way to co-create values with service providers. Hence, this study is to explore if there is any opportunity for service providers to enable customers to join the service recovery process to generate innovative values. Consequently, this study is to build a conceptual framework for service recovery design by considering customer involvement. We also use a scenario to demonstrate the feasibility of the proposed framework via service blueprinting.

Keywords: Service recovery, Customer involvement, Value co-creation, Service experience, Service science

# 1 INTRODUCTION

In the era of experience economy, service providers aim to create memorable and valuable service experiences to customers in order to satisfy customers and maintain long-term customer relations (Pine and Gilmore, 1998; Haeckel et al., 2003). When service providers can get high customer satisfaction, it can attract more customers and increase customer loyalty for high business profitability. However, a service experience is composed of a set of service encounters. In other words, a service experience can be affected by many factors including service operation, service quality, customer expectation and etc. Delivering a high-quality service experience is very complicated and needs to be carefully designed and managed. Besides, one important factor influencing the performance of service experiences is service recovery. Service recovery is resulted from service failures.

Thus, service failures mean that service providers have lower service performance which can't meet customer expectation (Hoffman and Bateson, 1997). In the moment of service failure, customers always get dissatisfaction and feel uncomfortable. Service providers have to implement service recovery processes for customers during service experience delivery. The main purpose of service recovery is to execute some actions to find customer dissatisfaction and response to errors and mistakes. Hart et al. (1990) proposed that an

appropriate service recovery approach can alter angry and dissatisfactory customers to be loyal ones. Since the topic of service recovery for service experience design has been an important issue, to our knowledge, there is less research investigating the relation between service recovery and customer involvement during service experience delivery (Dong et al., 2008).

According to Carlzon (1987) and Normann (2000), service recovery requires a repeated "moment of truth". If service provider can successfully be accepted again by customers through the faith of trust, these interactions between service providers and customers can return customers from dissatisfaction to satisfaction. In service science, customers involve in service activities is an important feature of service-dominant logic (Vargo and Lusch, 2004). Service providers deliver appropriate services that customers can join in order to create high values together. Consequently, there are still a lot of encounters that customers can touch in the service recovery process. Underlying service-dominant logic service providers can design and manage appropriate services for better recovery service experiences. Service providers have potential opportunities to involve customers in the service recovery process by employing innovative services.

Although we understand the importance of service recovery and it goes without saying that service providers have to response to customers in time, the research question is as follows: is there any possible to involve customers with a service recovery process? In order to deal with the proposed research question, this study is to examine the relation between service recovery and customer involvement during service experience delivery. Hence, the purpose of this study aims to propose a conceptual framework for service recovery design by considering customer involvement.

This study is developed in several sections. We describe the service recovery and customer involvement literatures. Next, a conceptual framework for customer involvement-based service recovery design is detailed. Then, we employ scenarios to demonstrate the proposed idea. Finally, we conclude several implications for service recovery design and opportunity for the further research.

## 2 LITERATURE REVIEW

# 2.1 Service Recovery

As mentioned earlier, the goal of service providers is to fulfill customer needs to offer suitable service experiences in order for high customer satisfaction. Service failures and service recovery are the key factors influencing customer perceptions of service experiences. According to Gronroos (1988), service recovery means that service providers adopt feasible actions and approaches to respond to service failures. Furthermore, service recovery can be

considered as a process for altering dissatisfactory customers to a level of satisfaction with a service provider after service failures occurring (Zemke and Bell, 1990). Service providers have to immediately and effectively implement the service recovery process to serve customers while service failures occurring.

Mattila (2001) noted that customers could be willing to give service providers a second opportunity while service failures are overcame successfully. In other words, when service providers can appropriately deal with service failures, customers may get higher customer satisfaction and give a positive word-of-mouth (Bitner et al., 1990; Maxham III, 2001). Understanding the significance and the clues of service recovery design for service providers is extremely important (De Matos et al., 2007; Seawright et al., 2008). Furthermore, the efficiency of service recovery is the important factor to directly influence customer satisfaction and loyalty (Smith et al., 1999).

#### 2.2 Customer Involvement

According to Vargo and Lusch (2004) and Lusch and Vargo (2008), there are two main perspectives for the considerations of services which include goods-dominant logic (namely, G-D logic) and service-dominant logic (i.e., S-D logic). G-D logic focused on the end products that are tangible (goods) and intangible (services) units of output. However, as the main trend of the globalization extremely influence the world economics, the service mindset gradually becomes more and more important in the twentieth century. S-D logic can be considered as a new direction for enterprises to get high competency. S-D logic usually utilizes the intangible and dynamic resources, so-called operant resources, to create values. Human skills, knowledge, and experiences are the main resources to generate services.

In the S-D logic, customer involvements play the important role within services. For instance, Apple provides their customers with many on-line services integrated through iPods with appropriate value proposing among Apple, online service providers and customers. iPod is a platform for users to download and upload favorite music and other information and users can conveniently acquire useful messages, share personal information and communicate with other users, online service providers and Apple via Pods. In other words, iPod adopts the value-creation network model and emphasizes on the servicing and experiencing by involving their users.

Bitner et al. (1997) emphasized that customers plays a key role to perform service activities and customer can be involved in co-creating valuable merits with service providers during service experience delivery. Besides, when customers are involved in a service recovery process, they can high customer satisfaction with the service recovery and will be willing to co-create values in the future (Dong et al., 2008). The importance is to explore service innovation and values with service recovery by customer involvement. Hence, this study

proposes a framework for service recovery design by taking customer involvement into account.

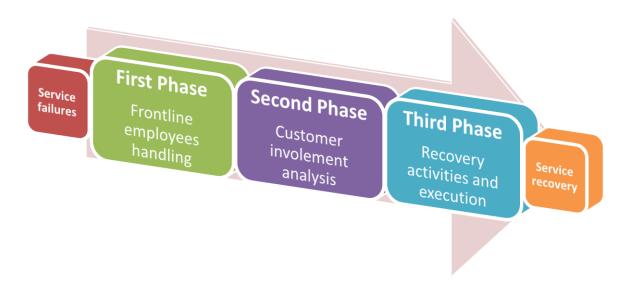


Figure 1. The design logic of service recovery

# 3 CONCEPTUAL FRAMEWORK

In order to illustrate the idea of service recovery design, this study establishes the design logic of service recovery (as shown in Figure 1). There are three main phases of the design logic including frontline employees handling, customer involvement analysis and recovery activities and execution. In the beginning, service failures occur. In the first phase, the information of service failures is delivered by either a service system or customers. Frontline employees have to efficiently and immediately deal with the situations after receiving the information of service failures. Hence, customers can feel comfortable because they consider that the service provider will take responsibility for this mistake. Then, the second phase is to analyze the possibility of customer involvement during service recovery process. According to Bitner et al. (1997), there are three levels of customer participation including high, moderate and low levels of participation. We would like to build a mechanism which can immediately analyze what customers can be involved in the service recovery process based on the above category. A historical customer database which is to store past customer data is also established to support service providers to get useful synthesis of different levels of customer participation. Last, service providers design and propose proper recovery activities according to different levels of customer participation. These recovery activities are implemented and executed by service providers and customers. Customers can contribute their past experiences and knowledge to help service providers to cope with service failures. On the other hand, service providers also can efficiently deliver correct services to customers and respond to

customers' feedback. Either service providers or customers can create values with each other through the service recovery process.

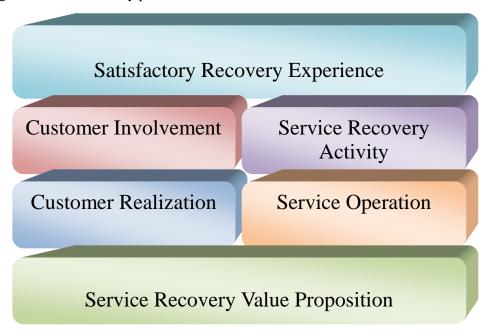


Figure 2. The conceptual framework of service recovery

According to the design logic of service recovery (Figure 1), this study also builds a conceptual framework (as depicted in Figure 2) to illustrate the important considerations during the service recovery process. From the Top-down viewpoint, service providers aim to deliver satisfactory recovery experiences to customers. They would like to show their capabilities to deal with service failures in order to enable customers to employ their services next time. For achieving appropriate recovery experiences, there are two aspects including the customer aspect and the service provider aspect which are needed to take into account. First, service providers have to design suitable recovery activities to solve the service failures. For example, Hoffman et al. (1995) investigated that the free food and discount approaches are two main recovery activities for customers who are facing service failures in the restaurant. These recovery activities are implemented by appropriate service operation setting including employees, hardware and software, service contexts and etc. On the other hand, we want to enable customers to involve in service recovery processes in order to increase high customer satisfaction and create unique values. Before taking part in service recovery processes, customers will judge if they can contribute to service recovery by their psychological realization of the service provider and service contexts. For instance, while customers have trust in a service provider, they are willing to join the service recovery activities and offer their contributions. Furthermore, above elements should be developed based on proper service recovery value propositions. The service recovery value propositions will be the guideline for design the detailed service strategies and service operations. Meanwhile, customers also will

be influenced to have different levels of customer participation by the service recovery value propositions of service providers.

# 4 SCENARIO DEMONSTRATION

In this section we will conduct a scenario to demonstrate the conceptual framework by using service blueprinting (as shown in Figure 3). Service blueprinting is a useful design tool to understand the service process in detail for service innovation. This scenario is to show that all interactions and activities during the service recovery process in the museum.

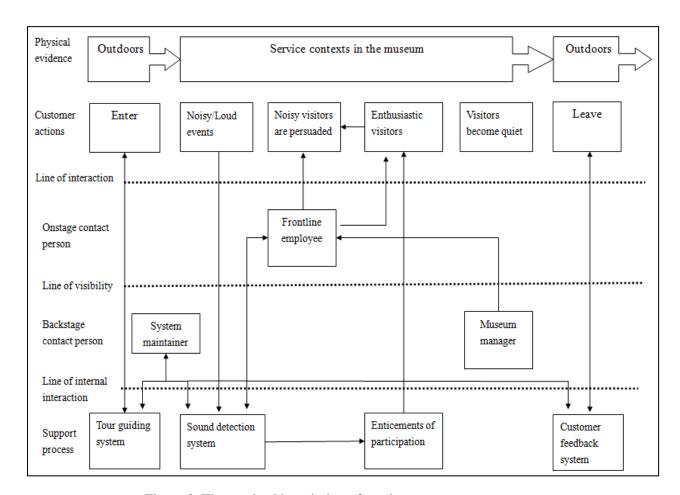


Figure 3. The service blueprinting of service recovery

The museum is a comfortable and tranquil place for visitors to learn and visit the exhibits. While visitors enter and leave the museum, they all are served by a tour guiding system and customer feedback system respectively. The tour guiding system is to deliver the guiding service to visitors to check the location and the customer feedback system can collect customer responses for further analyzing. Once some service failures are occurring, such as visitors generate loud noises, the sound detection system can automatically detect where visitors are noisy. Thus, the massage from the sound detection system can be delivered to the frontline employees who have to immediately admonish visitors to be silent in order to build a

satisfied environment. Meanwhile, the sound detection system also proposes attractive information (such as awards or discount) to encourage volunteers to persuade noisy visitors. If some visitors realize that they would like to share their skills to communicate with others, they will be a valuable member of the museum. Accordingly, the museum can efficiently deal with the noise event by a detection system and visitor involvement. Visitors can have a suitable and pleasure service experience in the museum.

Consequently, we use service blueprinting to design a service recovery process which service providers and visitors all take part in. It also helps us to understand the detailed interactions and activities of service recovery design. By using this scenario of the museum, we aim to illustrate the feasibility and possibility of the proposed idea.

# 5 CONCLUSION

In the traditional mindset, since service providers only deliver immutable services which must be beneficial for themselves rather than the consideration of customers, customers must accommodate these services. However, service-dominant logic changes this during service delivery (Vargo and Lusch, 2004). Service providers can design the service delivery process which customers can be involved and co-create value together. As mentioned earlier, when customers encounter service failure, how to involve customers with the service recovery process for high value co-creation is a very difficult issue. What kinds of motivation and service concepts do service providers have in service recovery? How are customers willing to join the service recovery process given they are unsatisfied with service failure? Is it any possible for customers and service providers to create values together in service recovery? Hence, these questions are so interesting issue that we aim to propose a conceptual framework for service recovery design by considering customer involvement and also want to investigate and find feasible resolutions to answer above interesting questions. For the further research directions, we will continue to examine the relevance between service recovery and customer involvement by conducting interviews and build a real service system for the field testing in order to illustrate the idea of the customer involvement-based service recovery design.

#### Reference

- Bitner, M.J., Booms, B. H. and Tetreault, M.S. (1990). Theservice encounter: Diagnosing favorable and unfavorable incidents. *Journal of Marketing*, 54(January), 71-84.
- Bitner, M.J., Faranda, W.T., Hubbert, A.R. and Zeithaml, V.A. (1997). Customer contributions and roles in service delivery. *International Journal of Service Industry Management*, 8(3), 193-205.
- Bitner, M.J., Ostrom, A.L. and Morgan, F.M. (2008). Service blueprinting: A practical technique for service innovation. *California Management Review*, 50(3), 66-94 Carlzon, J. (1987). *Moments of Truth*, Ballinger, Cambridge, MA.

- Dong, B., Evans, K. and Zou, S. (2008). The effects of customer participation in co-created service recovery. *Journal of the Academy of Marketing Science*, 36(1), 123-137.
- Gronroos, C. (1988). Service quality: The six criteria of good perceived service quality. *Review of Business*, 9(winter), 10-13.
- De Matos, C.A., Jorge, L.H. and Carlos, A.V.R. (2007). Service recovery paradox: a meta-analysis. *Journal of Services Research*, 10(1), 60-77.
- Haeckel, S., Carbone, L. and Berry, L. (2003). How to lead the customer experience. *Marketing Management*, 12 (1), 18-23.
- Hart, C., Heskett, J. and Sasser, E. (1990). The profitable art of service recovery. *Harvard Business Review*, 68(4), 148-156.
- Hoffman, K.D. and Bateson, E.G. (1997). *Essentials of services marketing*, Fort Worth, TX: Dryden.
- Hoffman, K. D., Kelley, S.W. and Rotalsky, H.M. (1995). Tracking service failures and employee recovery efforts. *The Journal of Services Marketing*, 9(2), 49-61.
- Lusch, R.F. and Vargo, S.L., (2008). *The service-dominant mindset*, In Bill Hefley and Wendy Murphy (eds) Service Science Management and Engineering: Education for the 21st Century, Springer, 89-96.
- Mattila, A. S. (2001). The impact of relationship type on customer loyalty in a context of service failures. *Journal of Service Research*, 4(2), 91-101.
- Maxham III, J. G. (2001). Service recovery's influence on consumer satisfaction, positive word-of-mouth, and purchase intentions. *Journal of Business Research*, 54(1), 11-24.
- Normann, R. (2000). *Service management strategy and leadership in service business*, 3rd ed., Wiley, Hoboken, NJ.
- Pine, B.J. and Gilmore, J.H. (1998). Welcome to the experience economy. *Harvard Business Review*, July-August, 97-105.
- Seawright, K.K., DeTienne, K.B., Bernhisel, M. p., and Larson, C.L.H. (2008). An empirical examination of service recovery design. *Marketing Intelligence & Planning*, 26(3), 253-274.
- Vargo, S.L., and Lusch, R.F. (2004). Evolving to a new dominant logic for marketing. *Journal of Marketing*, 68(January), 1-17.
- Zemke, R. and Bell, C. (1990). Service recovery: doing right the second time. *Training*, 27(6), 42-48.

# 行政院國家科學委員會補助國內專家學者出席國際學術會議報告

100年9月30日

報 告 人 姓 名	解燕豪 服務機關 淡江大學資管系 及 職 稱 助理教授			
曾 譲	100年9月16日~100年 9月18日 新加坡			
(中文) 2011 創新管理服務研討會 (英文) 2011 2nd International Conference on Innovation, Management and Service				
發表論文題目	(中文)基於顧客參與之服務補救設計架構 (英文)A Framework for Customer Involvement-Based Service Recovery Design			

#### 一、參加會議經過

ICIMS 2011 於新加坡舉行。會中共有來自約十多個國家(包括 Singapore, Australia, China, Czech Republic, Hong Kong, India, Japan, Jordan, Macao, Malaysia, Myanmar, Pakistan, Russian Federation, S. Korea, Singapore, Sweden, Taiwan, and United States 等國)的學者一同參與,與會人事逾三百人。ICIMS 研討會共計 2 個 keynote speeches,及 7 場 main sessions,主要包括 Decision Technologies and Service Sciences, Digital Media: Content and Communication, Electronic Government, Engineering, Economics, Security, Information Technology in Health Care, Internet and the Digital Economy, Knowledge Management Systems, Organizational Systems and Technology, Software Technology 等相關學術議題。

#### 二、與會心得

#### 1. Researchers' comments for our presentation:

- The theory of service science needs to be developed by integrating different fields and disciplines.
- The differences between service-dominant logic and good-dominant logic are the key for stating and describing the today's research and the traditional research in service field.
- Service design combines with customer expectation concept by IT is feasible to generate innovative services.
- The user of the S-D logic based input-output approach can be further defined and elaborated.
  - a. The application direction
  - b. The usage level
  - c. The practical implementation

## 2. The important subjects of human-computer interaction will include as follows:

- User task analysis and modeling
- The analysis, design, development, evaluation, and use of information systems
- Guidelines and standards for interface design

#### RDT04

三、考察參觀活動(無是項活動者省略)

無

四、建議

ICIMS 國際研討會議規模如此盛大,除大會主辦單位努力籌畫外,臺灣研討會舉辦地相關軟硬體設備齊全,都使所有參與者在研討會過程之中,感到十分舒適與便利。因此,望政府能再投入資源於國際會議所需之相關軟硬體設施,以利爭取更多國際型重要會議。

五、攜回資料名稱及內容 大會論文集電子檔。

六、其他

無



# **COPYRIGHT TRANSFER FORM**

(Please Compile This Form, Sign and Send By E-mail)

Please complete and sign this form and send it back to us with the final version of your manuscript. It is required to obtain a written confirmation from authors in order to acquire copyrights for papers published in 2011 International Conference on Innovation, Management and Service -,ICIMS 2011.

Full Name and Surname	Yen-Hao Hsieh
Title	Prof. Assoc.Prof. Asst.Prof. Dr. Mr. Ms.
Organisation	Tamkang university
Address	3F., No.73, Dayong St., Zhonghe Dist., New Taipei City 235, Taiwan (R.O.C.)
Postal code	235
City	New Taipei City
Country	Taiwan
Telephone	886-920478920
Fax	
E-mail	yhhsiehs@gmail.com
Paper Title	A Framework for Customer Involvement-Based Service Recovery Design
Authors	Yen-Hao Hsieh

#### **Copyright Transfer Statement**

The copyright to this article is transferred to International Economics Development and Research Center (IEDRC) if and when the article is accepted for publication. The undersigned hereby transfers any and all rights in and to the paper including without limitation all copyrights to IEDRC. The undersigned hereby represents and warrants that the paper is original and that he/she is the author of the paper, except for material that is clearly identified as to its original source, with permission notices from the copyright owners where required. The undersigned represents that he/she has the power and authority to make and execute this assignment.

#### We declare that:

- 1. This paper has not been published in the same form elsewhere.
- 2. It will not be submitted anywhere else for publication prior to acceptance/rejection by this Conference.
- 3. A copyright permission is obtained for materials published elsewhere and which require this permission for reproduction.

Furthermore, I/We hereby transfer the unlimited rights of publication of the above mentioned paper in whole to IEDRC. The copyright transfer covers the exclusive right to reproduce and distribute the article, including reprints, translations, photographic reproductions, microform, electronic form (offline, online) or any other reproductions of similar nature.

The corresponding author signs for and accepts responsibility for releasing this material on behalf of any and all co-authors. This agreement is to be signed by at least one of the authors who have obtained the assent of the co-author(s) where applicable. After submission of this agreement signed by the corresponding author, changes of authorship or in the order of the authors listed will not be accepted.

Yours Sincerely,

Corresponding Author's Full Name and Signature

Date:8/8/2011

on-Hao

# A FRAMEWORK FOR CUSTOMER

# INVOLVEMENT-BASED SERVICE RECOVERY DESIGN

## **Abstract**

In the era of experience economy, the most important purpose for service providers is to provide quality service experiences with customers. However, a service experience is composed of a set of service encounters. Delivering a high-quality service experience is very complicated and needs to be carefully designed. Furthermore, service recovery is one important key to influence service experiences but is difficult to manage. Meanwhile, customer involvements are also a possible way to co-create values with service providers. Hence, this study is to explore if there is any opportunity for service providers to enable customers to join the service recovery process to generate innovative values. Consequently, this study is to build a conceptual framework for service recovery design by considering customer involvement. We also use a scenario to demonstrate the feasibility of the proposed framework via service blueprinting.

Keywords: Service recovery, Customer involvement, Value co-creation, Service experience, Service science

# 1 INTRODUCTION

In the era of experience economy, service providers aim to create memorable and valuable service experiences to customers in order to satisfy customers and maintain long-term customer relations (Pine and Gilmore, 1998; Haeckel et al., 2003). When service providers can get high customer satisfaction, it can attract more customers and increase customer loyalty for high business profitability. However, a service experience is composed of a set of service encounters. In other words, a service experience can be affected by many factors including service operation, service quality, customer expectation and etc. Delivering a high-quality service experience is very complicated and needs to be carefully designed and managed. Besides, one important factor influencing the performance of service experiences is service recovery. Service recovery is resulted from service failures.

Thus, service failures mean that service providers have lower service performance which can't meet customer expectation (Hoffman and Bateson, 1997). In the moment of service failure, customers always get dissatisfaction and feel uncomfortable. Service providers have to implement service recovery processes for customers during service experience delivery. The main purpose of service recovery is to execute some actions to find customer dissatisfaction and response to errors and mistakes. Hart et al. (1990) proposed that an

appropriate service recovery approach can alter angry and dissatisfactory customers to be loyal ones. Since the topic of service recovery for service experience design has been an important issue, to our knowledge, there is less research investigating the relation between service recovery and customer involvement during service experience delivery (Dong et al., 2008).

According to Carlzon (1987) and Normann (2000), service recovery requires a repeated "moment of truth". If service provider can successfully be accepted again by customers through the faith of trust, these interactions between service providers and customers can return customers from dissatisfaction to satisfaction. In service science, customers involve in service activities is an important feature of service-dominant logic (Vargo and Lusch, 2004). Service providers deliver appropriate services that customers can join in order to create high values together. Consequently, there are still a lot of encounters that customers can touch in the service recovery process. Underlying service-dominant logic service providers can design and manage appropriate services for better recovery service experiences. Service providers have potential opportunities to involve customers in the service recovery process by employing innovative services.

Although we understand the importance of service recovery and it goes without saying that service providers have to response to customers in time, the research question is as follows: is there any possible to involve customers with a service recovery process? In order to deal with the proposed research question, this study is to examine the relation between service recovery and customer involvement during service experience delivery. Hence, the purpose of this study aims to propose a conceptual framework for service recovery design by considering customer involvement.

This study is developed in several sections. We describe the service recovery and customer involvement literatures. Next, a conceptual framework for customer involvement-based service recovery design is detailed. Then, we employ scenarios to demonstrate the proposed idea. Finally, we conclude several implications for service recovery design and opportunity for the further research.

## 2 LITERATURE REVIEW

# 2.1 Service Recovery

As mentioned earlier, the goal of service providers is to fulfill customer needs to offer suitable service experiences in order for high customer satisfaction. Service failures and service recovery are the key factors influencing customer perceptions of service experiences. According to Gronroos (1988), service recovery means that service providers adopt feasible actions and approaches to respond to service failures. Furthermore, service recovery can be

considered as a process for altering dissatisfactory customers to a level of satisfaction with a service provider after service failures occurring (Zemke and Bell, 1990). Service providers have to immediately and effectively implement the service recovery process to serve customers while service failures occurring.

Mattila (2001) noted that customers could be willing to give service providers a second opportunity while service failures are overcame successfully. In other words, when service providers can appropriately deal with service failures, customers may get higher customer satisfaction and give a positive word-of-mouth (Bitner et al., 1990; Maxham III, 2001). Understanding the significance and the clues of service recovery design for service providers is extremely important (De Matos et al., 2007; Seawright et al., 2008). Furthermore, the efficiency of service recovery is the important factor to directly influence customer satisfaction and loyalty (Smith et al., 1999).

#### 2.2 Customer Involvement

According to Vargo and Lusch (2004) and Lusch and Vargo (2008), there are two main perspectives for the considerations of services which include goods-dominant logic (namely, G-D logic) and service-dominant logic (i.e., S-D logic). G-D logic focused on the end products that are tangible (goods) and intangible (services) units of output. However, as the main trend of the globalization extremely influence the world economics, the service mindset gradually becomes more and more important in the twentieth century. S-D logic can be considered as a new direction for enterprises to get high competency. S-D logic usually utilizes the intangible and dynamic resources, so-called operant resources, to create values. Human skills, knowledge, and experiences are the main resources to generate services.

In the S-D logic, customer involvements play the important role within services. For instance, Apple provides their customers with many on-line services integrated through iPods with appropriate value proposing among Apple, online service providers and customers. iPod is a platform for users to download and upload favorite music and other information and users can conveniently acquire useful messages, share personal information and communicate with other users, online service providers and Apple via Pods. In other words, iPod adopts the value-creation network model and emphasizes on the servicing and experiencing by involving their users.

Bitner et al. (1997) emphasized that customers plays a key role to perform service activities and customer can be involved in co-creating valuable merits with service providers during service experience delivery. Besides, when customers are involved in a service recovery process, they can high customer satisfaction with the service recovery and will be willing to co-create values in the future (Dong et al., 2008). The importance is to explore service innovation and values with service recovery by customer involvement. Hence, this study

proposes a framework for service recovery design by taking customer involvement into account.

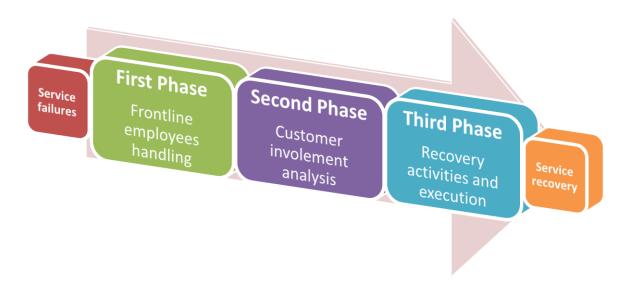


Figure 1. The design logic of service recovery

# 3 CONCEPTUAL FRAMEWORK

In order to illustrate the idea of service recovery design, this study establishes the design logic of service recovery (as shown in Figure 1). There are three main phases of the design logic including frontline employees handling, customer involvement analysis and recovery activities and execution. In the beginning, service failures occur. In the first phase, the information of service failures is delivered by either a service system or customers. Frontline employees have to efficiently and immediately deal with the situations after receiving the information of service failures. Hence, customers can feel comfortable because they consider that the service provider will take responsibility for this mistake. Then, the second phase is to analyze the possibility of customer involvement during service recovery process. According to Bitner et al. (1997), there are three levels of customer participation including high, moderate and low levels of participation. We would like to build a mechanism which can immediately analyze what customers can be involved in the service recovery process based on the above category. A historical customer database which is to store past customer data is also established to support service providers to get useful synthesis of different levels of customer participation. Last, service providers design and propose proper recovery activities according to different levels of customer participation. These recovery activities are implemented and executed by service providers and customers. Customers can contribute their past experiences and knowledge to help service providers to cope with service failures. On the other hand, service providers also can efficiently deliver correct services to customers and respond to

customers' feedback. Either service providers or customers can create values with each other through the service recovery process.

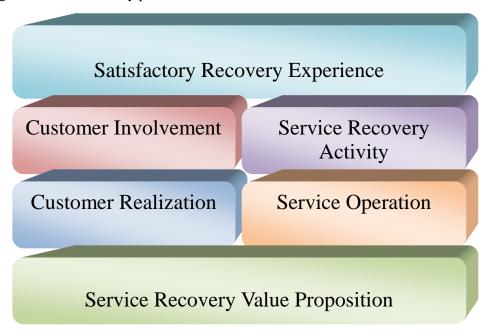


Figure 2. The conceptual framework of service recovery

According to the design logic of service recovery (Figure 1), this study also builds a conceptual framework (as depicted in Figure 2) to illustrate the important considerations during the service recovery process. From the Top-down viewpoint, service providers aim to deliver satisfactory recovery experiences to customers. They would like to show their capabilities to deal with service failures in order to enable customers to employ their services next time. For achieving appropriate recovery experiences, there are two aspects including the customer aspect and the service provider aspect which are needed to take into account. First, service providers have to design suitable recovery activities to solve the service failures. For example, Hoffman et al. (1995) investigated that the free food and discount approaches are two main recovery activities for customers who are facing service failures in the restaurant. These recovery activities are implemented by appropriate service operation setting including employees, hardware and software, service contexts and etc. On the other hand, we want to enable customers to involve in service recovery processes in order to increase high customer satisfaction and create unique values. Before taking part in service recovery processes, customers will judge if they can contribute to service recovery by their psychological realization of the service provider and service contexts. For instance, while customers have trust in a service provider, they are willing to join the service recovery activities and offer their contributions. Furthermore, above elements should be developed based on proper service recovery value propositions. The service recovery value propositions will be the guideline for design the detailed service strategies and service operations. Meanwhile, customers also will

be influenced to have different levels of customer participation by the service recovery value propositions of service providers.

# 4 SCENARIO DEMONSTRATION

In this section we will conduct a scenario to demonstrate the conceptual framework by using service blueprinting (as shown in Figure 3). Service blueprinting is a useful design tool to understand the service process in detail for service innovation. This scenario is to show that all interactions and activities during the service recovery process in the museum.

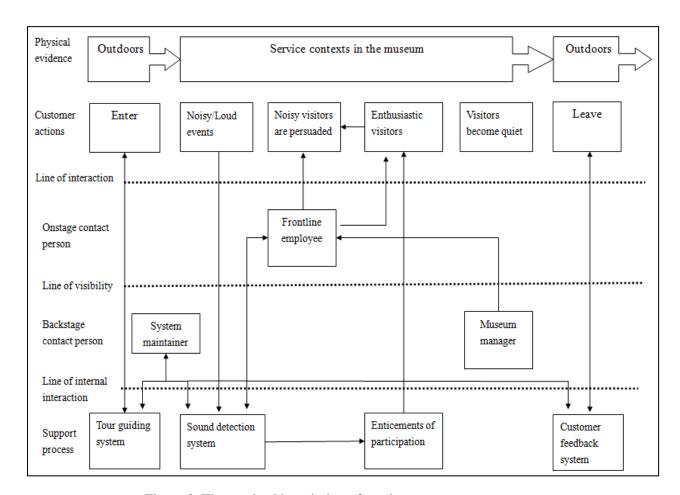


Figure 3. The service blueprinting of service recovery

The museum is a comfortable and tranquil place for visitors to learn and visit the exhibits. While visitors enter and leave the museum, they all are served by a tour guiding system and customer feedback system respectively. The tour guiding system is to deliver the guiding service to visitors to check the location and the customer feedback system can collect customer responses for further analyzing. Once some service failures are occurring, such as visitors generate loud noises, the sound detection system can automatically detect where visitors are noisy. Thus, the massage from the sound detection system can be delivered to the frontline employees who have to immediately admonish visitors to be silent in order to build a

satisfied environment. Meanwhile, the sound detection system also proposes attractive information (such as awards or discount) to encourage volunteers to persuade noisy visitors. If some visitors realize that they would like to share their skills to communicate with others, they will be a valuable member of the museum. Accordingly, the museum can efficiently deal with the noise event by a detection system and visitor involvement. Visitors can have a suitable and pleasure service experience in the museum.

Consequently, we use service blueprinting to design a service recovery process which service providers and visitors all take part in. It also helps us to understand the detailed interactions and activities of service recovery design. By using this scenario of the museum, we aim to illustrate the feasibility and possibility of the proposed idea.

# 5 CONCLUSION

In the traditional mindset, since service providers only deliver immutable services which must be beneficial for themselves rather than the consideration of customers, customers must accommodate these services. However, service-dominant logic changes this during service delivery (Vargo and Lusch, 2004). Service providers can design the service delivery process which customers can be involved and co-create value together. As mentioned earlier, when customers encounter service failure, how to involve customers with the service recovery process for high value co-creation is a very difficult issue. What kinds of motivation and service concepts do service providers have in service recovery? How are customers willing to join the service recovery process given they are unsatisfied with service failure? Is it any possible for customers and service providers to create values together in service recovery? Hence, these questions are so interesting issue that we aim to propose a conceptual framework for service recovery design by considering customer involvement and also want to investigate and find feasible resolutions to answer above interesting questions. For the further research directions, we will continue to examine the relevance between service recovery and customer involvement by conducting interviews and build a real service system for the field testing in order to illustrate the idea of the customer involvement-based service recovery design.

#### Reference

- Bitner, M.J., Booms, B. H. and Tetreault, M.S. (1990). Theservice encounter: Diagnosing favorable and unfavorable incidents. *Journal of Marketing*, 54(January), 71-84.
- Bitner, M.J., Faranda, W.T., Hubbert, A.R. and Zeithaml, V.A. (1997). Customer contributions and roles in service delivery. *International Journal of Service Industry Management*, 8(3), 193-205.
- Bitner, M.J., Ostrom, A.L. and Morgan, F.M. (2008). Service blueprinting: A practical technique for service innovation. *California Management Review*, 50(3), 66-94 Carlzon, J. (1987). *Moments of Truth*, Ballinger, Cambridge, MA.

- Dong, B., Evans, K. and Zou, S. (2008). The effects of customer participation in co-created service recovery. *Journal of the Academy of Marketing Science*, 36(1), 123-137.
- Gronroos, C. (1988). Service quality: The six criteria of good perceived service quality. *Review of Business*, 9(winter), 10-13.
- De Matos, C.A., Jorge, L.H. and Carlos, A.V.R. (2007). Service recovery paradox: a meta-analysis. *Journal of Services Research*, 10(1), 60-77.
- Haeckel, S., Carbone, L. and Berry, L. (2003). How to lead the customer experience. *Marketing Management*, 12 (1), 18-23.
- Hart, C., Heskett, J. and Sasser, E. (1990). The profitable art of service recovery. *Harvard Business Review*, 68(4), 148-156.
- Hoffman, K.D. and Bateson, E.G. (1997). *Essentials of services marketing*, Fort Worth, TX: Dryden.
- Hoffman, K. D., Kelley, S.W. and Rotalsky, H.M. (1995). Tracking service failures and employee recovery efforts. *The Journal of Services Marketing*, 9(2), 49-61.
- Lusch, R.F. and Vargo, S.L., (2008). *The service-dominant mindset*, In Bill Hefley and Wendy Murphy (eds) Service Science Management and Engineering: Education for the 21st Century, Springer, 89-96.
- Mattila, A. S. (2001). The impact of relationship type on customer loyalty in a context of service failures. *Journal of Service Research*, 4(2), 91-101.
- Maxham III, J. G. (2001). Service recovery's influence on consumer satisfaction, positive word-of-mouth, and purchase intentions. *Journal of Business Research*, 54(1), 11-24.
- Normann, R. (2000). *Service management strategy and leadership in service business*, 3rd ed., Wiley, Hoboken, NJ.
- Pine, B.J. and Gilmore, J.H. (1998). Welcome to the experience economy. *Harvard Business Review*, July-August, 97-105.
- Seawright, K.K., DeTienne, K.B., Bernhisel, M. p., and Larson, C.L.H. (2008). An empirical examination of service recovery design. *Marketing Intelligence & Planning*, 26(3), 253-274.
- Vargo, S.L., and Lusch, R.F. (2004). Evolving to a new dominant logic for marketing. *Journal of Marketing*, 68(January), 1-17.
- Zemke, R. and Bell, C. (1990). Service recovery: doing right the second time. *Training*, 27(6), 42-48.

# 國科會補助計畫衍生研發成果推廣資料表

日期:2011/11/24

國科會補助計畫

計畫名稱: 建構服務創新、價值共創之體驗式服務補救機制

計畫主持人: 解燕豪

計畫編號: 99-2410-H-032-096- 學門領域: 資訊管理

無研發成果推廣資料

# 99 年度專題研究計畫研究成果彙整表

計畫編號: 99-2410-H-032-096-計畫主持人:解燕豪

計畫名稱:建構服務創新、價值共創之體驗式服務補救機制							
7 2 7	114 / 20 111 / 11 / 11	N ALL TYNE ON		量化			備註(質化說明:
成果項目		實際已達成 數(被接受 或已發表)		本計畫實 際貢獻百 分比	單位	如數個計畫共同 成果、成果列為 該期刊之封面故 事等)	
	論文著作	期刊論文	0	0	100%		
		研究報告/技術報告	0	0	100%	篇	
		研討會論文	0	0	100%		
		專書	0	0	100%		
	± 41	申請中件數	0	0	100%	2,1	
	專利	已獲得件數	0	0	100%	件	
國內		件數	0	0	100%	件	
	技術移轉	權利金	0	0	100%	千元	
		碩士生	2	2	100%		
	參與計畫人力	博士生	0	0	100%	, ,,	
	(本國籍)	博士後研究員	0	0	100%	人次	
		專任助理	0	0	100%		
	論文著作	期刊論文	1	1	100%		A Dynamic Model of Service Recovery
		研究報告/技術報告	0	0	100%		
國外		研討會論文	1	1	100%	篇	A FRAMEWORK FOR CUSTOMER INVOLVEMENT-BASED SERVICE RECOVERY DESIGN
		專書	0	0	100%	章/本	
	專利	申請中件數	0	0	100%	件	
		已獲得件數	0	0	100%		
	技術移轉	件數	0	0	100%	件	
		權利金	0	0	100%	千元	
		碩士生	0	0	100%	人次	
		博士生	0	0	100%		
		博士後研究員	0	0	100%		
		專任助理	0	0	100%		

無

其他成果 (無法以量化表達之成 果如辦理學術活動、獲 得獎項、重要屬際影響 作、研究成果國際影響 力及其他協助產業益 有 類等,請以文字敘述填 列。)

	成果項目	量化	名稱或內容性質簡述
科	測驗工具(含質性與量性)	0	
教	課程/模組	0	
處	電腦及網路系統或工具	0	
計畫	教材	0	
加加	舉辦之活動/競賽	0	
	研討會/工作坊	0	
項	電子報、網站	0	
目	計畫成果推廣之參與(閱聽)人數	0	

# 國科會補助專題研究計畫成果報告自評表

請就研究內容與原計畫相符程度、達成預期目標情況、研究成果之學術或應用價值(簡要敘述成果所代表之意義、價值、影響或進一步發展之可能性)、是否適合在學術期刊發表或申請專利、主要發現或其他有關價值等,作一綜合評估。

ŀ	1.	請就研究內容與原計畫相符程度、達成預期目標情況作一綜合評估
		■達成目標
		□未達成目標(請說明,以100字為限)
		□實驗失敗
		□因故實驗中斷
		□其他原因
	-	說明:
4	2.	研究成果在學術期刊發表或申請專利等情形:
		論文:■已發表 □未發表之文稿 □撰寫中 □無
		專利:□已獲得 □申請中 ■無
		技轉:□已技轉 □洽談中 ■無
		其他:(以100字為限)
4	3.	請依學術成就、技術創新、社會影響等方面,評估研究成果之學術或應用價
		值(簡要敘述成果所代表之意義、價值、影響或進一步發展之可能性)(以
		500 字為限)
		首先、我們想要了解是否在服務補救過程,顧客在面對服務失敗時,在極不滿意的狀態下,
		存在有任何的機會,服務供應商能夠促使顧客積極的參與。第二、我們期望能建立一個體
		驗式服務補救方法論,來有效設計並管理服務補救。第三、我們目標基於服務支配邏輯的
		觀點下,建立一個整合性架構,來讓服務供應商能基於本身優良的服務文化,來創作並維
		持適合的服務策略。本研究的目的及價值可分以下三點: 第一、建立一個概念架構來研究
		服務補救、顧客參與及價值共創的相關性。第二、基於體驗式的服務設計概念下,將顧客
		情緒管理及顧客期望管理應用在真實的服務系統之中。第三、提出一個策略性的架構來協
		助服務企業建立並維持其創新性的服務文化。