Implementation of Customer Relationship Management as an Effort to Improving the Outlet Quality of Customer Satisfaction PT. Pos Indonesia (Persero) In Bandung Post Office 40000

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ABSTRACT

PT. Pos Indonesia (Persero) is a State-owned enterprise that always had been doing business service delivery. At the moment to do the measurement quality of service at the post Office Bandung has been using servqual. On the method of measurement done there is still a lack. It leads to information obtained from the results of the data collection in progress currently cannot represent hopes and repair service company towards customers. This caused company difficult in improving the quality of service to customers because company didn't know the expectations and improvement of service desired by customer.

Based on these problems gave rise to idea of designing and implementing strategy Customer Relationship Management. Which on application can help Service Managers in recommending company's service improvement suggestions are effective, in accordance with expectations and needs of customers.

After the testing phase, this information system can overcome the problems that occur. The company can figure out how big the problem of the difference between the perception of customers against the services has been accepted by customer against expectations that will be accepted, and provide recommendations on improvements of service advice so as to maintain quality service to customer satisfaction at PT. Pos Indonesia (Persero).

Keywords: Customer Relationship Management, Service Quality, Servqual, Information System, Post Office.

1. INTRODUCTION

PT Pos Indonesia (Persero) or known as the post office is one of the State-owned enterprise that always had been doing business service delivery. PT Pos Indonesia (Persero) in the now not only manage packages, letters, stamps, and postage labels, but also already moving to other services such as financial and logistics services to its customers. Customers of PT Pos Indonesia (Persero) is a direct consumer use Postal services from Indonesia, and in the city of Bandung, one of the post office is located at Jalan Asia Afrika No. 49 which is also a post office Bandung 40000.

Based on the interviews that have been done to Mr. Fitriadi as Manager of service at the post Office of Bandung 40000, he explained that at this time the company has had a process of collecting data to measure customer satisfaction. The data collection is carried out by means of dissemination of the questionnaire. Questionnaire presented aim to know and improve the quality of service at their outlets based on the decision of Directors of PT. Pos Indonesia (Persero) number: 15/DIRUT/0314 using Servqual. On the method of measurement is done there is still a shortage. The lack of a new company that is implementing the measurement of the level of our satisfaction in terms of customer perceptions of customers against the Ministry that has been given, but does not measure customer expectations against which will be accepted, so that the information obtained from the results of the data collection in progress currently can not represent the hopes and repair service company towards customers. This resulted in the company hard in improving the quality of service to customers because the company did not know the expectations and improvement of service desired by the customer.

The fall in the quality of service at the outlet of PT. Pos Indonesia (Persero) related services to customers can be due to several factors, such as the complaint against employees or customers about the means provided. Akuratnya our satisfaction measurement assessment less customers in terms of expected customers, resulting in a difficult Ministry managers in determining an improvement against a decline in the quality of service and negatively impact outlet PT. Pos Indonesia (Persero). The impact of the longer the drop in quality service to customer satisfaction that ignored the greater losses obtained in the company.

Based on to the problems already on the previous mentioned above then it needs an application of information systems, Customer Relationship Management (CRM) service quality improvement efforts as PT Pos Indonesia (Persero) in Bandung 40000 post office. Information systems are expected to be used to get the results of measurements for better customer satisfaction by developing the

measurements that have been there before and can assist in performing the service quality improvement advice recommendations on post office outlets Bandung 40000 who are experiencing a decline in the quality of service.

1.1 Basic Concept of CRM

Customer Relationship management (CRM) is a type of management that discuss about the handling of the relationship between the companies with customers that can help companies in the process of management of customers, so companies have good value in the eyes of the customer. [1]

1.2 Stages of CRM

Implementation of the CRM concept is organizing the process surrounding CRM customers and not only on the internal functions of the company. There are three stages in CRM, namely:

a. Acquire

Acquire (or acquires) is the stage of acquiring customers. At this stage the company doing business strategy by giving a good impression to customers against the company by providing the best service companies so that interested customers to conduct transactions with the company.

b. Retain

Retain is the stage where the company tried to maintain the relationship with customers, in other words get a customer and then maintain a relationship with them. In this step the company pays attention to its customers by always providing the best service companies primarily on services offered

c. Enhance

Enhance is a process where the company builds good relationships with customers. With customer wishes and always heard to serve him so well that created a loyal customer of product/service of the company.

1.3 Type of CRM

Types of customer relationship management (CRM) is the operational CRM, collaborative CRM and analytical CRM/full integrated CRM.

1. Operational CRM business function associated with a company that includes the servicing of customers, management of orders, invoice or billing, management and sales automation.

2. Analytical CRM is an activity that includes menyimpanan, move, process, interpret and report the user or customer data, which then analyzes what mereke need.

3. Collaborative CRM is aktifiktas to combine all the necessary communication, coordination and collaboration between vendor and customer. [1]

1.4 Framework of Dynamic CRM

Research on CRM framework conducted by Chung-Hoon Park and Young-Gul Kim, reviewed the relevance of information and marketing strategies, and create a model that is described in the "Framework of Dynamic-CRM". CRM Dynamic-frame can be seen in the following image:

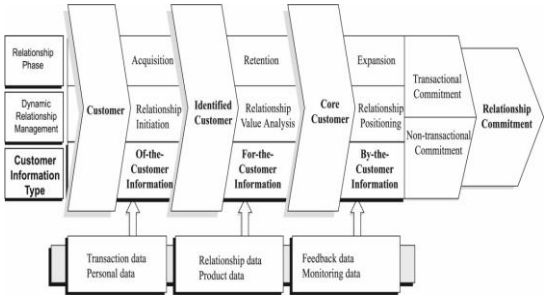


Figure 1. Framework Dynamic CRM [2]

This framework can be considered a pattern or model of reference an organization in improving the maturity of management of their customers. In the framework there are several phases including:

1. Relationship Initiation

At this stage of the initiation of the relationship with the customer, the organization conducts logging towards customers, typically with membership registration.

2. Relationship Value Analysis

In order to make CRM more effectively, we recommend every customer relationships are analyzed from both the point of view of either the customer or organization. There are two dimensions in determining the value of every relationship the values from the viewpoint of customers and customer rights from the perspective of the organization.

3. Relationship Positioning

Build mutually beneficial relationships is very important to keep a long-term relationship between the customer and the organization. If such a relationship continues between the customer and the Organization will form a strong commitment either transactional or nontransactional and the relationship developed to the stage of relationship commitment. [2]

2. CONTENT RESEARCH

2.1 Analysis CRM

a. *Acquire*

At this stage the company doing business strategy by giving a good impression to customers so that interested customers to conduct transactions with the company. At the post Office of Bandung 40000 do some strategies such as Direct Response Advertising, i.e. a mix of advertising and promotion that form a massive-scale promotion. For example: “Kirim Paket di Kantor Pos, Bisa dapat Go Pro Hero 5 Black Edition”.

b. *Retain*

At this stage a business strategy undertaken by the company include:

1. Company Information

Fitur Informasi perusahaan memiliki fungsi agar pelaggan mengetahui profil dari Kantor Pos Bandung. Informasi perusahaan tersebut diantaranya, lokasi dan jam operasional kantor. Profil perusahaan yang dapat diketahui oleh pelanggan agar dapat membangun rasa kepercayaan pelanggan terhadap kantor pos yaitu tentang informasi kualitas pelayanan, serta informasi tentang promosi yang sedang diadakan oleh perusahaan.

2. Repair Information Services

The repair feature can be accessed by customer service, customer service, and also by the Service Manager. The goal of repair information service aims to inform customers that the repair service of anything from a questionnaire processed by whether repaired or not, if the complaint that they must have been fixed then the customers stay feel whether there are differences of ministries that have been fixed already expectations or not.

c. *Enhance*

At this stage the company can do the handling of complaints, this facility accommodate complaints given by the customer through the system, with this customer complaint spells out other options in other than by direct go to customer service.

2.2 Analysis Framework of Dynamic

As for arrangement/stages of the framework of dynamic CRM such as follows:

a. *Relationship Initiation,* the company prepares the data required for the measurement of quality of service outlet in the form of data services that are provided at the outlet.
b. *Relationship Value Analysis*, in this phase, conducted from the data management processes are already available by using servqual method.
c. *Relationship Positioning,* After processing the data using servqual done the next step was to maintain service outlets to acquire high-value and deliver improvements to the service outlet that scored low.

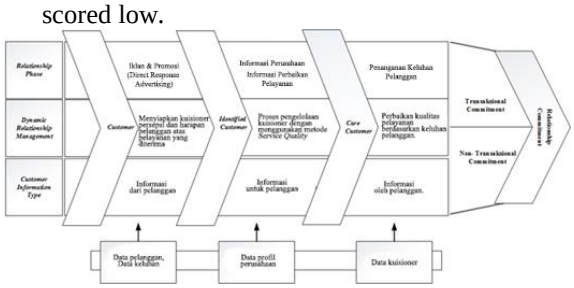


Figure 2. Analysis Framework of Dynamic CRM

In the framework of this dynamic explains a series of stages in the development/implementation of CRM. His most important is specifically delegated substantive information obtained from customers so that retrieved the output in the form of relationship commitment. Information of concern are as follows::

1. Information about the customer (*of the customer information*)

This stage is a stage where the companies do the stages to acquire customers by way of data input of customers and customer survey data input through the website that will be created.

2. For the customer information

This stage is a stage where the company builds good relationships with customers. Information can be obtained by the customer including company information, filing a complaint through a questionnaire, and repair service.

3. By the customer information

This stage is a stage where the company maintains relationships with customers, in other words the company obtain information from customers and maintain relationships with customers by assessing the quality of service of the post office outlet in Bandung 40000 questionnaire via the form provided.

After the third stage of the above done then the company will get two types of relations given by customers i.e., transactional and non-transactional commitment commitment. transactional – is the relationship given the customer to the company in the form of transaction/purchase of the services offered by the company. Non-transactional relationships is the commitment given to the company in the form of customer complaints and suggestions regarding criticism of the Ministry and the work of the company. With the two types of relationships between customers and the company will then be created relationship commitment which is the main purpose of the CRM concept is applied.

2.3 Analysis of Customer Satisfaction

In this study an analysis of the customer satisfaction will be differentiated into customer satisfaction Analysis in progress and customer satisfaction Analysis was developed. Customers who analyzed was the customers who come to the outlet and perform transactions.

a. Analysis of the Customer Satisfaction Measurement in Progress

The process of measuring customer satisfaction on the quality of service companies that run when these are described as follows:

1) Preparation and dissemination of a questionnaire

From the Division of the questionnaire obtained data on the profile of respondents the user service at the post Office of Bandung 40000. Samples taken as many as 60 randomly selected respondents. Data collection research was done by spreading the customer satisfaction questionnaire to each user's post office services in Bandung 40000. Any users of the services must be filled in the questionnaire regarding the assessment of the Ministry of truth.

There is a range of questionnaires that are available based on the decision of the Board of Directors of PT Pos Indonesia (Persero) No:

15/DIRUT/0314 on 28 March 2014, i.e. the customer satisfaction questionnaire based on real work at the post Office of Bandung 40000. This questionnaire also called questionnaires with perception. This questionnaire is based from charging the applicants by assessing the real performance of the services available at the post Office of Bandung 40000.

In a questionnaire filed there were 28 questions raised in the questionnaire, and to declare an assessment customer can fill in answers based on likert scale comprising 6 grains of criteria.

2) Preparation of Raw Data Matrix

After the whole questionnaire was distributed and collected got back, the next step is conducted preparation of matrix of raw data. It was done in order to make easier the ni in doing data processing.

3) Values Customer Satisfaction

The value of customer satisfaction obtained from the answers given by the respondents that the results will be known as well as the amount of the average value of satisfaction based on each respondent and the number and average value of satisfaction based on each statement.

How to find the average value of satisfaction based on each respondent and the number and average value of satisfaction based on each statement is done by the following formula.

- Level of satisfaction Upon the respondent.

$$\overline{Xi} = \frac{\Sigma(Nj.Xi)}{\Sigma k} \quad (1)$$

Keterangan:

$\overline{Xi}$ = the average respondent answers to the revelation to i

$\Sigma(Nj.Xi)$ = the amount of weight to the statement-i answer

Σk = Many of the respondents

- Overall average obtained from calculations based on the customer satisfaction questionnaire respondents conducted namely of 4.49 by category quite satisfied. For services that get low satisfaction rating will concern Man ager Service for repair and gothigh marks for maintained.Tingkat Kepuasan Pelanggan berdasarkan pertanyaan yang diberikan dalam kuesioner.

$$\overline{Yi} = \frac{\Sigma(Nj.Yi)}{\Sigma k} \quad (2)$$

Keterangan:

$\overline{Yi}$ = the average respondent answers to the revelation to i

$\Sigma(Nj.Yi)$ = the amount of weight to the statement-i answer

Σk = Many of the respondents

Measurement of the satisfaction level of customers ' satisfaction based on statements, it is known that the average value obtained i.e. amounting to 4.44 by category quite satisfied.

Conclusion:

After an analysis of the customer satisfaction measurement procedure using servqual in progress, there are shortcomings in this process so that the necessary development. Development that needs to be done is to collect data of expectations (hopes) from customers, simplification of questionnaires, testing statement against statement questionnaire, the placement of the data analysis results into the Cartesian diagram to know the priority of handling service, and provide recommendations to the Ministry that has the lowest value. The addition of these things is to make improvements to the quality of service be achieved.

b. Analysis Development of the measurement customer satisfaction

The process of measuring customer satisfaction on the quality of service companies that will be developed will be described at this time as follows:

1. The preparation and dissemination of a questionnaire

From the Division of the questionnaire obtained data on the profile of respondents the user service at the post Office of Bandung 40000. Samples taken 30 randomly selected respondents.

After knowing a general overview about the respondent development procedure of customer satisfaction, there are two kinds of questionnaires that will be provided. to wit:

- Questionnaire Service according to the expectations of the Customers

This questionnaire is also called with the questionnaire expectations (expectations).

- Questionnaire customer satisfaction based on real work at the post Office of Bandung 40000.

This questionnaire also called questionnaires with perception.

In a questionnaire that asked questions there will be 23 statement expressed in the questionnaires, the statements retrieved from statements on the questionnaire currently existing with noticed the consideration of statements on the same dimension of servqual may be incorporated to become a new statement.

2. Testing of the measuring instrument

Testing of measuring instrument i.e. in the form of a questionnaire that contains the level of satisfaction of the customers in terms of expectations and reality. The results of this questionnaire the raw data is then used to test validity and reliability.

3. Preparation of Raw Data Matrix

After the whole questionnaire was distributed and collected again, the next step is conducted preparation

of matrix of raw data. This is done in order to simplify the process of doing data processing.

4. Performance of Service Satisfaction Index Value

The value of the index performance (NIK) level of satisfaction of customers will make a point in a Cartesian diagram. NIK is the level of customer satisfaction is obtained by searching the average level of satisfaction score is an attribute. The calculation is done with the following formula:

$$\boldsymbol{i} = \frac{\Sigma\,(Nj.Xi)}{\Sigma\,k} \qquad \textbf{(3)}$$

Dimana:

N = assessment for every 1 variables question
X = skala likert (1,2,3,4,5)
K = many of the respondents
i = NIK (represented by $\overline{X}$ or $\overline{Y}$)

5. Cartesian Diagram Service Satisfaction Expectations and Perceptions

To see the position of the placement of the data that has been analyzed, then satisfaction assessment service outlet can be based on expectations and perceptions can be divided into four parts, namely:

Table 1 Division of Quadrants Valuation Expectations and perceptions

Quadrant	Description
I	Priority (considered very important and still not satisfied)
II	Preserve Achievements (considered important and gratifying)
III	Low priority (considered less important and less satisfactory)
IV	Very low priority (considered less important and has satisfactory)

Next level elements will be elaborated and divided into four parts in a Cartesian diagram.

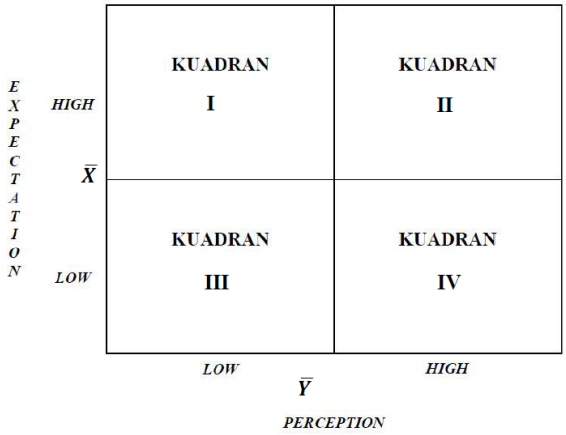


Figure 3 Division Of Cartesian Diagram

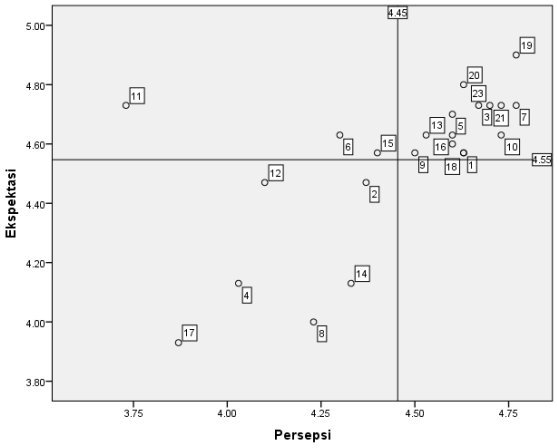


Figure 4 The value in the Cartesian Chart Expectations NIK

6. Recommendations for Improvement Suggestions

Quality of service results from the calculation of PT. Pos Indonesia (Persero), companies have to do a repair service on the category of the largest negative value statement in advance in order to be immediately in accordance with what is expected by the customer.

Table 2 Evaluation Of The Results Of The Assessment Service The Largest Negative Gap

Dimension	Statement	Description	Recommendations Repair
Reliability	The Customer Service Officer alacrity in serving the information and complaints	Poor Service	Customer service officers should be on evaluation, revised and enhanced to match the expectations and needs of the customer.

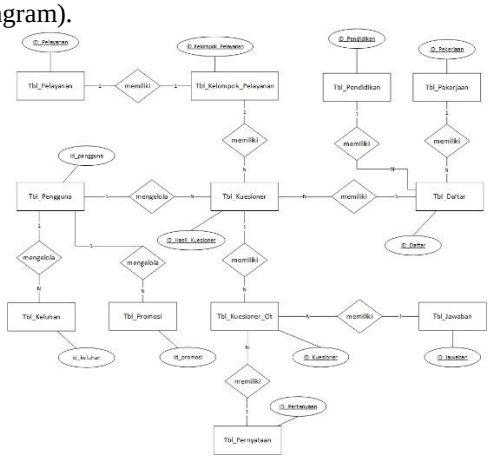
Conclusion:

From the results of the development of service quality measurement procedure at the company, a new questionnaire was formed from several simplified representations of the former questionnaire, statements are almost similar in one dimension are combined so that the number of the statement to be more concise and can be more focused against the Ministry asked. Then the measurement Gap difference between 5 perceptions and expectations have been made to obtain more accurate information to the services which need to get noticed by the Manager of the service to be provided, with improvement has he knew the difference between the perceptions and expectations of customers, then aim to improve the quality of service to customer satisfaction has been successfully implemented.

2.4 Data Base Analyisis

Data base analysis done so obtained a system which corresponds to what you want, which can be

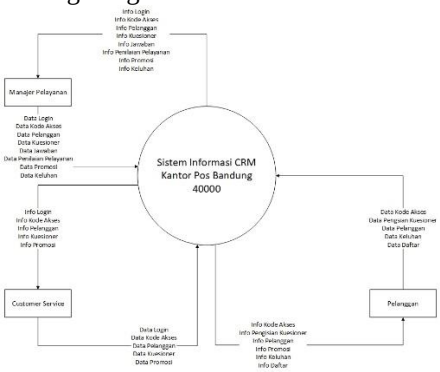
done by stages create an ERD (Entity Relationship Diagram).



Gambar 5 ERD Information System CRM

2.5 Context Diagram

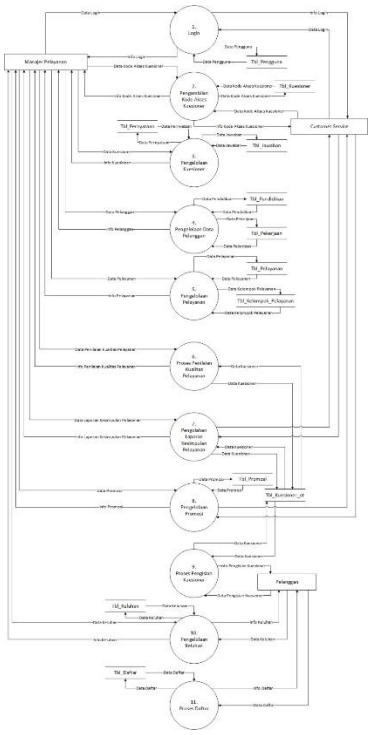
Context diagrams are used to describe the system first in the outline. Context diagram on the application of Customer Relationship Management can be seen in the following image:



Gambar 6. 2.5 Context Diagram

2.6 Data Flow Diagram

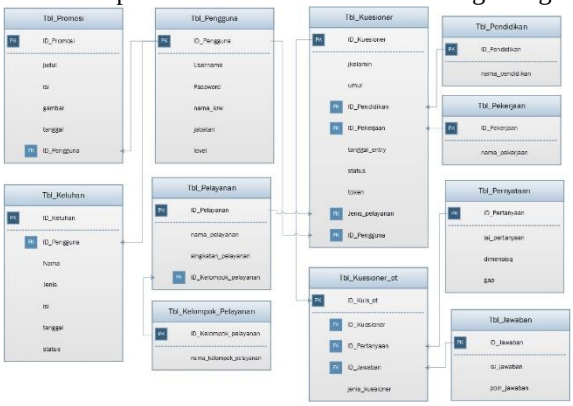
Data Flow Diagram (DFD) is a structured modeling which serves to illustrate the functional network system connecting each other with the Groove data either manually or computerized. Can be seen in the following image:



Gambar 7. DFD Level 1

2.7 Relationships Scheme

Describes the connectedness of the table in the system in detail or clear, then use table relationships. Table relationships can be seen in the following image:

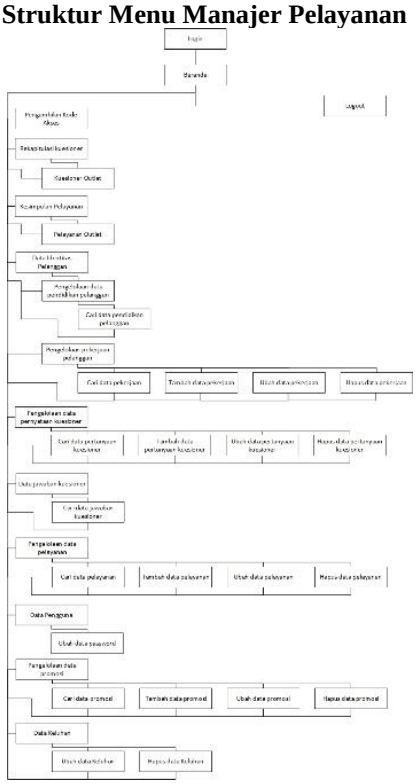


Gambar 8 Relationships Scheme

2.8 Design Menu structure

The design of the structure of the menu is designed to provide the functions that will be used in information systems will be built. There are designing the menu for each user, including: Service Manager menu structure :

2.8.1 Struktur Menu Manajer Pelayanan



Gambar 9 The Structure Of The Menu Manager Service

2.9 Interface Implementation

Interface implementation is done based on any display of the system that is built with the coding in the form of program files. Display interface implementations are built.

2.9.1 Implementation Service Manager Interface

Tabel 3 Implementation Services Manager Interface

No	Menu	Deskripsi	File
1	Login	Used as login page for admin	login.php
2	Beranda	Used as the admin home page	index.php
3	Rekapitulasi Kuisioner Outlet	Used to view a recap of the questionnaire data outlet has entered	rekap_ot.php
4	Kesimpulan Pelayanan Outlet	Used to seeing the conclusion of service quality outlet	kesimpulan_ot.php
5	Data Pendidikan	Used to view data on education	pendidikan.php
6	Kelola Data Pekerjaan	Used to view data on education Job data is used to manage customers	pekerjaan.php, simpan.php, hapus.php
7	Kelola Data Pernyataan	Used to manage the data statement questionnaire	pernyataan.php, simpan.php, hapus.php
8	Data Jawaban	Digunakan untuk melihat data jawaban	jawaban.php
9	Manage Data Services Group	Used to view the data services group	kelompok-pelayanan.php, simpan.php, hapus.php
10	Data Service	Used to view data service	pelayanan.php
11	Manage User Data	Used to manage the user data	pengguna.php, ubah_pw.php, simpan.php
12	Manage Data Promotion	Used to manage the data promotion	promosi.php, tambah.php, edit.php, hapus.php
13	Manage Data Complaint	Used to manage data complaints	Keluhan.php, edit.php, hapus.php

2.10 Testing the System

Testing the system in question to know the performance of information systems that have been made in accordance with the objectives of the design of information systems.

Table 4 Blackbox Testing Scenarios

Materials Testing	Testing Details	Types of Tests
Login	Login Verification	*Black Box*
Recap Of The Questionnaire	Looking for data questionnaire	*Black Box*
Educational Data	Looking for data on education	*Black Box*
Manage Data Jobs	a. Adding data jobs b. Adding data jobs c. looking for job data d. remove any job	*Black Box*
Manage The Data Statement	a. Add a data statement b. change your statement c. Searching the data statement d. Remove the data statement	*Black Box*
Data Answer	Looking for data answer	*Black Box*
Manage Data Services Group	a. Adding data services group b. change your group services c. Searching data group services d. remove any group services	*Black Box*
Manage Data Services	a. Add the data service b. change your services c. looking for data services d. remove the data service	*Black box*
Manage User Data	Change user data	*Black box*
Manage Data Promotion	a. Adding data promotion	*Black box*

Materials Testing	Testing Details	Types of Tests
	b. change your promotion c. Searching the data promotion d. remove any promotion	
Manage Data Complaint	a. Adding data promotion b. change your promotion c. Searching the data promotion d. remove any promotion	*Black box*
Entrance questionnaire	Verification of the access code	*Black box*
Add data questionnaire	Add data questionnaire	*Black box*

3. CLOSING

3.1 Conclusion

Information systems Customer Relasionship Management Bandung 40000 post office has been built and testing done against its system so that it can be summed up as follows:

1. Customer Relationship Management (CRM) can be applied as a reparation service quality outlet towards customer satisfaction and customer satisfaction assessment knowing against PT. Pos Indonesia (Persero) in Bandung 40000 post office.
2. This information system can help Service Managers in recommending repair advice service outlet in accordance with the expectations and needs of the customer

3.2 Suggestion

Here are a few suggestions for further development:

1. Are expected to be able to improve the look of the presentation of the data in the conclusion to the Manager of the service.
2. Is expected to display the interface to each user made more attractive.

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