## **CUSTOMER REPORT**

For

# **Data Analysis Internship**

By:

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Submitted to

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## **Preface**

This report is to prepare data and analyze it to find strategies, methods, and an overview of data sources including customer addresses and customer information. The purpose of generating this report is to represent the data analysis test for sending to SmileFOKUS (Thailand) Co., Ltd.

In addition, this report should be tested my skills in data analysis whether data preparation, data visualization, data analysis, and so on. I would improve my skills to be better than now, so I have to find more experience in this field.

I hope this report would cover full information and great looking as much as possible, and it might be a useful report for scoring.

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I separated the analysis into 2 parts including data preparation and data analysis. These parts are created by Tableau both Tableau Prep and Tableau Desktop. The procedure is following as below:

## 1. Data Preparation

For data preparation, I take data sources through the ETL process for preparing data. First, I use excel files including customer information and customer address to extract into Tableau Prep.

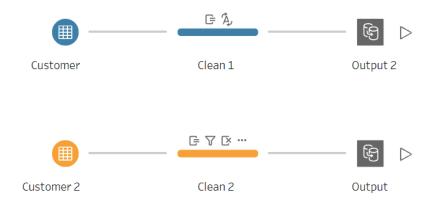


Figure 1 Data preparation from Tableau Prep

The next step is to transform data sources. I clean the data for both of them to be more cleansing, understanding, and easy to analyze. In the customer information file, I change the type of data to be more appropriate and created a new field to calculate the usage point of the customer.

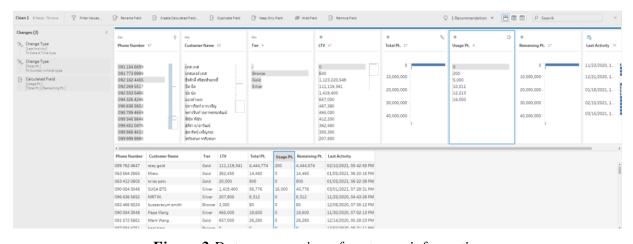


Figure 2 Data preparation of customer information

For the customer address, I changed the type of data to be appropriate and deleted all null values to identify them more clearly. Moreover, I generate a field to save the province of data to analyze more understanding.

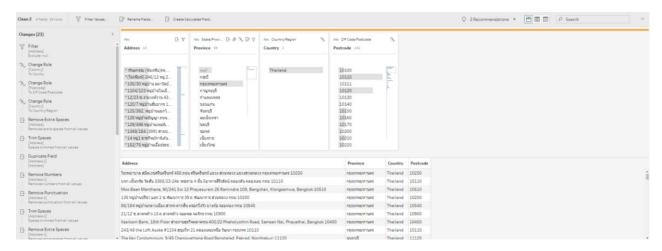


Figure 3 Data preparation of customer address

## 2. Data Analysis

#### a. Customer Information

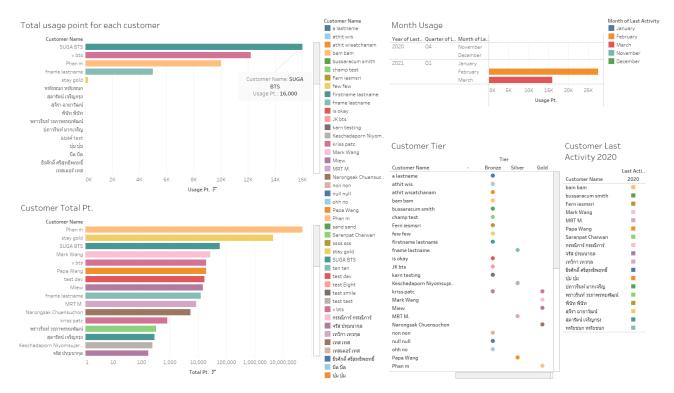


Figure 4 The dashboard of customer information

I created the dashboard that consists of 5 sheets. The explanation is following as below:

#### 1) The total usage point for each customer

This sheet contains the customer's name and total usage point which could be analyzed for the customer who is used the highest total point in the system. From the sheet, we could see that the customer who is used the highest number of points is Ms. Sugar BTS she used a total of 16,000 points. Moreover, customers who used the point have only 5 people from all customers that perhaps our promotions are inappropriate or dissatisfied to customers.

This sheet could answer the question:

- a. Who is use highest points?
- b. How many points for each people use?
- c. Who is perhaps the most active in our systems?
- d. Why do customers not use any points?

#### 2) The total point for each customer

This sheet contains the total points of each customer that is viewed as logarithm style. As we can see, Mr. Phan M. has the highest point which is more than a tenth million. Therefore, it perhaps represents that Mr. Phan M. has the most active in our systems.

This sheet could answer the question:

- a. Who has the highest points?
- b. What is the average of the point that all customers had?
- c. What promotion should be created for customers to let them use their points?

#### 3) Total usage point in each month

This sheet contains the usage point for each month. This could be analyzed that our customers were initially interested in February 2021. As we can see, in February customers most used their points as more than 25,000 points, but in March using points is decreased. Therefore, we have to save the level by improving strategies or promotions to give better satisfaction to customers.

This sheet could answer the question:

- a. What month has the highest points usage?
- b. From the chart, what ways should we improve our organization?
- c. Why are points most used in February?
- d. Why are points decreased in March?

#### 4) The customer tiers

This sheet contains tiers that customers had including none, bronze, silver, and gold. This sheet shows us the customer's tier. As we can see, for example, the tier that contains the highest number of customers is bronze. Silver and Gold tiers have the same numbers of customers as together. Therefore, we should find some strategies that save the level and evolve our customers' tier.

This sheet could answer the question:

- a. What tier contains the highest numbers of customers?
- b. What strategies help to save the level and evolve customers' tier?
- c. How many customers for each tier?

#### 5) The customer who was last active in 2020

This sheet contains all customers who are last active in 2020. This sheet could let us find the reason why customers do not act in our systems and find the strategies to pull them back or increase more customers to our systems.

This sheet could answer the question:

a. How many customers are last active in 2020?

# b. Customer Address

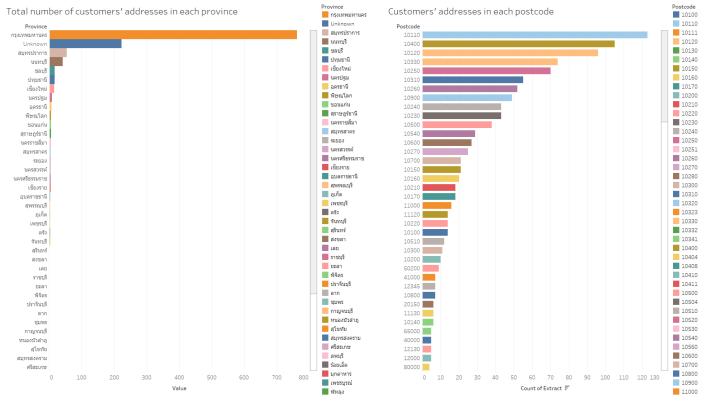


Figure 5 The dashboard of the customer address

#### 1) Total numbers of customers' addresses in each province

This sheet contains the number of customers' addresses in each province. As you can see, Bangkok is the highest number of customers, so we should improve our promotions or strategies to appropriate customers satisfaction in Bangkok. Unknown means customers' addresses that do not tell their province certainly.

This sheet could answer the question:

- a. What province has the highest number of customers?
- b. How many customers' addresses are in each province?

#### 2) Customers' addresses in each postcode

This sheet contains the number of customers' addresses in each postcode. As you can see, postcode "10110" has the highest number of customers' addresses. Moreover, we could check the district for each postcode, so we would know what district contains the highest number of customers' addresses.

This sheet could answer the question:

- a. What postcode contains the highest number of customers' addresses?
- b. What district contains the highest number of customers' addresses?
- c. How many customers' addresses are in each postcode?
- d. How many customers' addresses are in each district?
- e. What strategies should we do to increase the number of customers in low quantity in the district?