

## **Chapter III**

### **Research Method**

The methodology is absolutely needed in any research in order to find the accurate, and effective research. This chapter presents the description of the research method used in the study. It includes research design, research method, research instrument, and population and sample.

To prevent that the research is going astray, a methodology is required, as Hasan (2004) said that *Penyaluran rasa ingin tahu manusia terhadap sesuatu masalah dengan perlakuan tertentu (seperti memeriksa, mengusut, menelaah, dan mempelajari secara cermat dan sungguh-sungguh) sehingga diperoleh sesuatu (seperti mencapai kebenaran memperoleh jawaban atas masalah, pengembangan ilmu pengetahuan, dan sebagainya)*. It means that the distribution of human curiosity to a problem with a particular treatment (such as checking, investigating, analyzing, and studied carefully and sincerely) in order to obtain something (such as reaching the truth answers to the problem, the development of science, and so on).

#### **1.1 Research Design**

The research design is a unified, detailed and specific plan on how to acquire, analyze, and interpret data. According to Nazir (in Nasution, 2004), research design is: “All the processes required in the planning and execution of the study, from the preparation phase to the preparation stage of the report.”

Research design is used to analyze and identify the subject of this study. In order to make the research going in the right way, a research design is needed. The design of this research is descriptive quantitative method because the data is presented in numerical and descriptive form. According to Sugiyono (2012: 13) *penelitian deskriptif yaitu, penelitian yang dilakukan untuk mengetahui nilai variabel mandiri, baik satu variabel atau lebih (independen) tanpa membuat perbandingan, atau menghubungkan dengan variabel yang lain.*

Which mean descriptive research is a study conducted to determine variables, either the variable is one or even more without making comparison or connect with other variables. Quantitative methods emphasize objective measurements and the statistical, mathematical, or numerical analysis of data collected through polls, questionnaires, and surveys, or by manipulating pre-existing statistical data using computational techniques.

To undergo the research there are few steps to do, those are:

1. Preparation

Before we undergo the research we will need to prepare what to do. Because the research are quantitative, the researcher will use questionnaire and observation. The questionnaire will based on variable X which is the interest in speaking English conversation. The observation will based on variable Y which is speaking fluency, using video recorder. The research is on Pasundan University at Setiabudhi consist of English Department Students.

## 2. Implementation

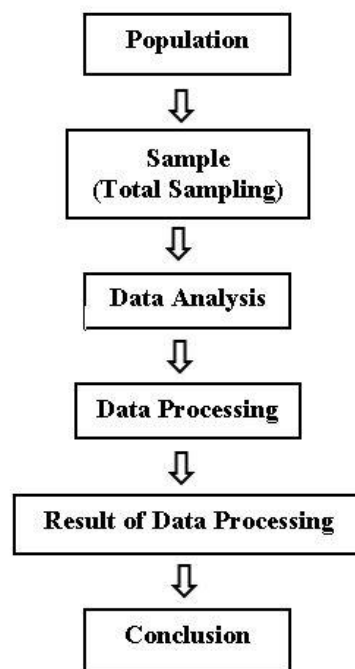
In the execution the researcher goes to the field collecting the data by meeting the students in campus area. Wherever the students are, the researcher will execute in place. Executing in place consist of giving the students questionnaire that they must answer. After they finish answering all the questionnaire given by researcher, the researcher will need to observe them by video recorder on how they chat in conversation. When all of those requirement complete, the researcher will enter the total of population and sample to the formula which then give the result of the research.

## 3. Reporting

First is introductory section which is the initial part of the research report and contains background on the implementation of research, problem formulation, research objectives, research benefits and hypotheses. Then theoretical study, the section on theoretical studies is a section that contains the results of a study conducted by researchers on the theory and results of previous studies related to the research conducted. The research method contains everything that is done by researchers starting from the preparation, implementation and end of a study. The research method section contains data collection techniques, data processing methods or techniques, population and samples, tools, materials, place and time of research. The results and discussion of the study contain data from research results that were collected during the study. The data obtained is conveyed in the form of questionnaires and observation. The last are the conclusions and suggestions,

containing the conclusions produced are answers to hypotheses that have been tested for truth. Advice from researchers to other parties, namely readers and other researchers to conduct further research.

With this method, the data obtained will be more accurate to fulfill the research objective. The data obtained from the English Department students in the interest in practicing English as well as the result in their fluency can be translated in numbers. The descriptive method is divided into some stages, those are:



## 1.2 Research Method

According to Sugiyono (2015) research method means the scientific way to get data with the purpose of certain usability data. “*Metode penelitian diartikan cara ilmiah untuk mendapatkan data dengan tujuan data kegunaan tertentu.*” This

research uses quantitative method with survey research. According to Sugiyono (2015) Quantitative methods can be interpreted as research methods based on positivism philosophy, used to examine in a particular population or sample, data collection using research instruments, quantitative data analysis / statistics, with the aim to test the hypothesis set.

The method of this research is quantitative research which the result of the research will be processed and analyzed to make a conclusion. This mean that the research is emphasize in numeric. Syaodih (2006) said that *Penelitian kuantitatif didasari oleh filsafat positivisme yang menekankan fenomena-fenomena objektif dan dikaji secara kuantitatif*. It means that we should conduct quantitative research with philosophy of positivism with objective phenomenon. While the survey research is the research used to explain the causal relationship and hypothesis testing. According to Sugiyono (2015) understanding of survey research is a study conducted on large and small populations, but the data studied is data from samples taken from the population, so that found relative events, distribution, and relationships between sociological and psychological variables.

*“Penelitian survey adalah penelitian yang dilakukan pada populasi besar maupun kecil, tetapi data yang dipelajari adalah data dari sampel yang diambil dari populasi tersebut, sehingga ditemukan kejadian-kejadian relatif, distribusi, dan hubungan-hubungan antar variabel sosiologis maupun psikologis.”*

The method used in this study was a correlational method in a quantitative design. In correlational method, the researcher uses the correlation statistical test to describe and measure between two or more variables. In other words, it is used to

analyze whether there is any correlation between two or more variables. This study is conducted to know the correlation between two variables. They are practicing English and students' speaking fluency as the independent variable and students' speaking ability as the dependent variable.

The method of this research is quantitative because the Correlation between the Interest in practicing English conversation and speaking fluency cannot be measured by description only, it will need to convert the result of the research into number which is capable by using quantitative method.

In the process of writing, the writer did field research. To get data of students' motivation, he distributed questionnaires and conducted oral test to the students as the sample. Then, after data completed, the data will be analyzed by the formula of correlation product moment.

### **1.3 Operational Definitions**

According to Sugiyono (2014) operational definition is the determination of the constants or properties to be studied so as to be a variable that can be measured. The operational definition describes the particular way in which to research and operate the con- text, making it possible for other researchers to replicate measurements in the same way or develop better ways of measuring constants. The operational definition is a definition that is given to a variable by giving meaning or specifies activities or to provide an operational.

*Nazir (2003) berpendapat bahwa "Definisi operasional merupakan suatu definisi yang diberikan kepada suatu variabel dengan cara memberikan arti atau menspesifikasikan kegiatan ataupun memberikan suatu operasional."*

### **1. Interest in practicing English conversation (Independent Variable)**

Interest is the tendency of a person to choose a particular activity among other activities which are different. In that case, interest motivates people to choose the fittest and the most appealing activity in their daily life. Every activity has their own quality and people are often selective on the thing that they found attractive.

The independent variable is a variable that cannot be influenced by other variables and is marked with the letter X to facilitate the researcher in identifying. The independent variable in the intention is the variable of merit price. Once the data are collected completely by the writer, then this data will be conducted quantitatively or it is often called the analysis of statistical data. To determine whether there is the correlation between Interest in practicing English conversation (X) to the students' speaking fluency (Y) or not. Then the data which have been analyzed will use the Likert scale rank correlation formula to find the hypothesis. The independent variable (X) in this research practicing English conversation by the students of UNPAS. There were some problems found in learning English by the English Department Students of Pasundan University. The main problem faced by the students was the lack of performance in speaking English. Interest in speaking English is still low too. Consequently, their low interest would affect their speaking performance. If the performance of speaking is low, it can be drawn a conclusion that the result or achievement in learning English itself is low too.

## **2. Mediation variables**

Mediation variables are the variables that strengthen and weaken the direct relationship between independent variables with variable dependent. Variable mediation in the intention of customer satisfaction and loyalty.

## **3. Speaking Fluency (Dependent variable)**

The dependent variable is a variable that can be influenced by other variables or it can be interpreted that variable has dependency from other variables and marked with letter (Y) to facilitate the researcher in identifying. The dependent variable in question is an acceptable price variable. The Dependent variable (Y) is the students' speaking fluency. The difficulties of speaking skill were caused by some reasons. The causes came from the students. They are lack interest in speaking English. One of the reasons making learning speaking failed was that the students' assumption that English is a difficult subject to be mastered. They had an argument that the problem causing the lack ability to master English are the influence of Indonesian organ of speech. They thought that Indonesian people cannot speak as well as native speaker because both have the different system in organ of speech. Then, they also regarded vocabulary and grammar as the other difficult things in mastering speaking English.

On the other hand, the lack performance of speaking English is also caused by no practice in speaking. One of the students explained that actually he had ever tried to speak with his mates in order to increase his fluency in speaking.



**Table 3.1 Operational Definition**

No	Variable	Operational Definition	Measurement tool	Scale
1	The interest in practicing english (X)	<ul style="list-style-type: none"> <li>- Eagerness</li> <li>- Oftentimes</li> </ul>	Questionnaire	Score 4: if the respondents are Strongly Agree. Score 3: if the respondents are Agree. Score 2: if the respondents are Disagree. Score 1: if the respondents are strongly disagree.
2	Speaking Fluency (Y)	<ul style="list-style-type: none"> <li>- Accuracy</li> <li>- pronounce</li> </ul>	Questionnaire	

Source: Adapted by the author

#### **1.4 Research Instrument**

Research instrument by Sugiyono (2015) is a measuring instrument such as tests, questionnaires, interview guides and observation guidelines used by researchers to collect data in a study. *“Instrumen penelitian adalah merupakan alat ukur seperti tes, kuesioner, pedoman wawancara dan pedoman observasi yang digunakan peneliti untuk mengumpulkan data dalam suatu penelitian.”*

Principally researching is measuring, then there must be a good measuring tool. Gauges in research is usually called research instruments. Thus research instrument is an instrument used to measure the natural and social phenomena are observed. Specifically these phenomena is called the research variables.

*Karena pada prinsipnya meneliti adalah melakukan pengukuran, maka harus ada alat ukur yang baik. Alat ukur dalam penelitian biasanya dinamakan instrumen penelitian. Jadi instrument penelitian adalah suatu alat yang digunakan mengukur fenomena alam maupun sosial yang diamati. Secara spesifik semua fenomena ini disebut variabel penelitian. Sugiyono (2012)*

The research instrument is used as a data collection tool, and the instruments commonly used in the research are some questionnaires and questionnaires submitted and given to each respondent who is sampled in the research during observation and interview.

The instrument of this research is questionnaire from the English Department students in the interest in practicing English as well as the result in their fluency can be translated in numbers. As Sugiyono (2012) said that “*kuesioner merupakan teknik pengumpulan data yang dilakukan dengan cara memberi seperangkat pertanyaan atau pernyataan tertulis kepada responden untuk dijawabnya*” (questionnaire is a technique of data collection which done by giving a set of questions or a written statement to the respondent to be answered). It means that to collect the data, we give the questions or statement for respondent to be answered.

The type of the question is closed questionnaire. A closed questionnaire is a set of questionnaire and options that already settled by researcher According to Sugiyono (2012) *pertanyaan tertutup adalah pertanyaan yang mengharapkan jawaban singkat atau mengharapkan responden untuk memilih salah satu alternatif jawaban dari setiap pertanyaan yang telah tersedia.*

In this research, the content of the questionnaire will be some question about the interest in practicing English (X). The respondent will alternatively choose the answer between 1 to 4. 1 count as strongly disagree and 4 represent strongly agree.

The scale to measure this research is Likert Scale. The Likert Scale is a tool used to develop instruments used to measure the attitudes, perceptions, and opinions of a person or group of people against the potentials and problems of an object, the design of a product, the process of creating products and products that have been developed or created. According to Sugiyono (2012:93) *skala likert digunakan untuk mengukur sikap, pendapat, dan persepsi seseorang atau sekelompok orang tentang fenomena sosial* (Likert Scale is used to measure attitudes, opinions and the perception of a person or group of a social phenomenon).

In Sugiyono (2012: 93), there are four to five answer from highly positive to highly negative. But according to Mulyatiningsih (2012: 29) suggested to use four scales of answers without using a neutral answer in order that respondent answers will be more assertive. *“menyarankan untuk menggunakan empat skala jawaban tanpa menggunakan jawaban netral agar jawaban responden akan lebih tegas.”* Therefore, the choice of the answer is as the following table in the next page;

**Table 3.2 Likert Scale**

Category	Scale
a. Strongly Agree	4
b. Agree	3
c. Disagree	2
d. Strongly Disagree	1

Source : Mulyatiningsih (2012)

The questionnaires that have been selected are:

No.	Indicators
1	I like learning English using English Conversation techniques
2	Learning English with discussion techniques makes it easy for me to understand the subject matter
3	I always try to answer reading questions
4	I ask the lecturer if I have difficulties in learning English
5	I would rather ask a friend if I have difficulty in learning English
6	I try to always discuss with a group of friends in answering reading questions.
7	I am active in expressing ideas in discussions
8	I contributed opinions during group work
9	I don't want to participate in discussions in reading lessons as long as I pass the major courses.
10	I will always be active in English lessons in class because it is very important in life, first with future work.
11	I work on the assignments given by lecturers.
12	I did the test with my own abilities
13	I pay attention and ask things that are less clear when my friends present the results of the discussion.
14	I like to present the results of the discussion
15	I appreciate friends' opinions during group discussions
16	I am happy with the award that my group achieved
17	I study harder if I experience many difficulties in answering English questions / questions.
18	I studied material at home before being taught on campus
19	I studied the material that had been taught on campus

The speaking Fluency (Y) will use observation method which will use video recorder using hand phone camera with the video quality of 640x480p and normal audio microphone quality. The topics will be directed by researcher to make the students easily reply the conversation.

In order to achieve the final result the researcher need, we need to have a research design. In the design there are few steps to do as told above. To make the design work, we will need population and sample which will be explained next.

## **1.5 Population and Sample**

### **1) Population**

The population is the whole subject of the study. If one wishes to examine all elements present in the study area, the research is a population study or population study or census study. Understanding of the sample is a part of the subject in the population studied, which is certainly capable of representative can represent the population. The population in this research are the active of English students association or students of English department of Faculty of Arts and Letters, Pasundan University.

Sugiyono (2011) defines the population as a generalization region consisting of objects or subjects that become quantities and certain characteristics set by the researchers to learn and then drawn conclusions. In this study, the population used

is a limited population or finite population, where there are clear data sources whose limits are quantitative because they have limited characteristics (Nawawi, 2007).

So the population is not just people but also objects and other natural objects. Population is also not just the number of objects / subjects studied, but includes the characteristics / properties possessed by the subject or object.

## **2) Sample**

According Sugiyono, sample is part or number and characteristic possessed by the population. When large populations, and researchers are not possible to learn everything in the population, for example because of the funding, energy and time, the researchers will take samples from that population. What is learned from the sample, the conclusion will be applied to the population. For that sample taken from population must be really representative (Sugiyono, 2011).

According to Arikunto (2002), if we examine some of the population, then the research is called sample research. In facilitating this sampling by using a handle that if the subject is less than 100, better taken all so that the research is a population study. If the number of subjects is large can be taken between 10 to 15%, or 20 to 25% or more.

In this research, the sample are from the active students of English Department of Faculty of Arts and Letters, Pasundan University which is considered that they are still active going to campus and learning outside the class. Total sampling is used in the research. The sample itself is purposive because the

researcher consider the sample that available on sight. The time itself is in a month from August to September.

## **1.6 Process of Instrument Development**

### **1.6.1 Validity**

Validity test is a tool that shows how far an instrument has precision and accuracy in performing the measuring function.

Azwar in his book says that scales that are structured by well-defined measurable regions and with theoretically clear boundaries will be valid, either from coverage content, since the beginning of scale development, the relevance of the item to the objectives actually can be evaluated so as to be able to assess whether the content of the scale is feasible (Azwar, 2010)

Valid instruments means measuring instruments which used to obtain data (measures) were valid. Valid means the instrument can be used to measure what should be measured.(Sugiyono, 2012). *Instrumen yang valid berarti alat ukur yang digunakan untuk mendapatkan data (mengukur) itu valid. Valid berarti instrument tersebut dapat digunakan untuk mengukur apa yang seharusnya diukur.*(Sugiyono, 2012).

The validity test is a degree of accuracy between the real data occurs with data collected by the researcher. Validity as one of the degree of accuracy or reliability of measurement instruments regarding the content of questions (Sugiyono, 2012). The test technique used is correlation technique through Product Moment correlation coefficient. The ordinal score of each question item tested for

its validity is correlated with the overall ordinal score of the item. If the correlation coefficient is positive, then the item is declared valid, whereas if negative then the item is invalid and will be excluded from the questionnaire or replaced with a statement of improvement. How to find correlation value is as follows:

$$r_{xy} = \frac{n(\sum XY) - (\sum X)(\sum Y)}{\sqrt{[(\sum X^2) - (\sum X)^2/n][(\sum Y^2) - (\sum Y)^2/n]}}$$

$r$  = correlation coefficient

$n$  = sample total

$\sum X$  = items total score

$\sum Y$  = answer items total score

$\sum X^2$  = total square items score

$\sum Y^2$  = The sum of the total squares of answer scores

$\sum XY$  = Total multiplication score of an item's answer with total score

As for the criteria, for determining that instrument is valid, count  $r$  should equal to or more than  $r$  table at a significant level of 5% (five percent). And vice versa if the count  $r$  is smaller than  $r$  table at a significant level of 5% then the instrument is said to be invalid, (Sugiyono:2012), As we can see below:

- a. If  $r_{\text{count}} (r \text{ pearson}) \geq r_{\text{table}}$  then item is valid.
- b. If  $r_{\text{count}} (r \text{ pearson}) \leq r_{\text{table}}$  then items is invalid.



### 1.6.2 Reliability

According to Azwar (2010), reliability refers to consistency measurements that contain the meaning of accuracy measurement. Unreliable measurements will produce scores that do not can be trusted because of differences in scores produced by individuals influenced by an error factor rather than a difference factor indeed an instrument is said to be reliable if it can be trusted to collect research data.

The instrument is a reliable instrument when used several times to measure the same object, will generate the same data. Measuring tool of rubber are examples of instruments that are not reliable/consistent. *Instrumen yang reliabel adalah instrumen yang bila digunakan beberapa kali untuk mengukur obyek yang sama, akan menghasilkan data yang sama. Alat ukur panjang dari karet adalah contoh instrument yang tidak reliabel/konsisten. (Sugiyono, 2012)*

In this research, the reliability will use Alpha Cronbach's formula and it will be calculated in the SPSS (Statistical Product and Service Solution) Version 16.0 for Windows in order to know the accuracy data and can be easier to be understood. The Alpha Cronbach's formula as follow:

$$r_{11} = \left[ \frac{k}{k-1} \right] \left[ 1 - \frac{\Sigma \sigma b^2}{\sigma^2 t} \right]$$

Remarks:

$r_{11}$  = Reliability Instrument

$k$  = amount of item question

$\Sigma\sigma b^2$  = Sum of variant item question

$\sigma^2 t$  = Variant Total

According to Sekaran and Bougie (2013), said that reliability value which less than the number of 0.60 is considered poor, and the average of 0.70 can be accepted, whereas value which is more than 0.80 is considered good. To determine that the statement items are reliable, it can be compared between  $r$  alpha and  $r$  table. If  $r$  alpha is more than  $r$  table (0.444), it means that this statement items are reliable. This research uses software SPSS Statistics Version 16.0 for Windows to ease and minimize a miscalculation in calculating the reliability on processing the data. The criteria index reliability as follow:

**Table 3.3 Index of Reliability**

No	Interval	Criteria
1	< 0,60	Low
2	0,60 – 0,70	Sufficient
3	0,70 – 0,80	High
4	0,80 – 0,96	Very High

Source: Zikmund and Babin (2010)

## **1.7 Technique of Data Collection**

Data collection techniques are considered important for the success of the research. It involves with the way to collect the data, who the source is, and what instrument to use. The type of data source is primary data which means the data is collected immediately from the respondent. Sugiyono (2012) said that *Sumber primer adalah sumber data yang langsung memberikan data kepada pengumpul data*. It means the primary source is a data source that directly provide data to data collectors.

The instrument is taken from the questionnaire which distribute to the active students at English Department, Faculty of Arts and Letters, Pasundan University. The data collecting execution, will use questionnaire which will be shared on the paper. This purpose is in hope to make them easier, in order to be some valid and reliable statements that they should answer. The observation method will use video recorder using hand phone camera with the video quality of 640x480p and normal audio microphone quality. The topics will be directed by researcher to make the students easily reply the conversation.

## **1.8 Data Analysis and Hypothesis Test**

### **1.8.1 Data Analysis**

Data processing techniques in this study use a computation calculation SPSS (Statistical Product and Service Solution) Version 16.0 for Windows because this program has a high statistical ability and the data

management system in the graphical environment use a simple descriptive menus and dialog boxes so making it easy to understand how the operation (Sugiyanto, 2012).

The analytical method used in this research is Descriptive Analysis Percentage. This percentage descriptive is processed by frequency divided by the number of respondents and multiplied by 100 percent, as stated Sudjana (2001: 129) are as follow:

$$P = f/N \times 100\%$$

Description:

P = Percentage

f = Frequency

N = Number of Respondents

100% = Constant Number

The calculation of this descriptive percentage as follows:

- a. Correcting the questionnaire answers from respondents.
- b. Calculating the frequency of respondent's answers
- c. The overall number of respondents is 53
- d. Insert into the formula.
- e. Interpret the result with the table below

**Tabel 3.4**

**Interpretation Criteria Percentage**

No	Score Percentage	Criteria
1	20 % - 36 %	Very Low / Worse
2	36.01 % - 52 %	Low / Bad
3	52.01 % - 68 %	Highly Sufficient / Fair
4	69.01 % - 84 %	High / Good
5	84.01 % - 100%	Very High / Very Good

Source: Narimawati (2007:85)

**1.8.2 Testing Hypothesis**

This formula which is then will be calculated in SPSS (Statistical Product and Service Solution) Version 16.0 for Windows program that in the end will be taken the decision by comparing the  $\rho_{\text{count}}$  and  $\rho_{\text{table}}$  ( $\rho = \text{rho}$ ) as we can see from the determining statistical hypothesis as follow:

$H_0$ : There is no correlation between The Interest in Practicing English conversation on the speaking fluency

$H_a$ : There is a positive and significant correlation between The Interest in Practicing English conversation on the speaking fluency

Reject  $H_0$  and Accept  $H_a$  if  $\rho_{\text{count}} > \rho_{\text{table}}$

Accept  $H_0$  and Reject  $H_a$  if  $\rho_{\text{count}} \leq \rho_{\text{table}}$

Before determining the hypothesis, the critic value of  $\rho_{table}$  should be known in advance. It is used as the standard of  $\rho_{table}$  which will then be compared with  $\rho_{count}$ . The method to know the critic value of  $\rho_{table}$  is by using the degree freedom =  $n-2$  ( $df = n-2$ ) formula with a significant level of 5 % or equal to 0.05. Then, to interpret the coefficient correlation between both of the variable, it is used the table criteria as follow:

**Table 3.5**

**Interpretation of Coefficient Correlation**

Interval Coefficient	Correlation Level
0.00 – 0.199	Very Low
0.20 – 0.399	Low
0.40 – 0.599	Moderate
0.60 – 0.799	Strong
0.80 – 1.000	Very Strong