CHAPTER I

INTRODUCTION

A. Background

Joining Indonesia in the ASEAN Economic Community (AEC) in 2015 automatically opens the opportunity for the Indonesian people to be able to get a decent job in the ASEAN region but it also mean that Indonesia will be the arrival of many foreigners who want to invest or looking for work. To be able to compete in the era of AEC, every individual should have good quality. Without any preparation to improve the quality of human resources, enactment of ASEAN Economic Community (AEC) would be a threat to Indonesia.

This issue becomes a great challenge for education in Indonesia to create the generations that has not only academic skills but also the skills that required in the workplace, one of the skills is teamwork skills. The teamwork skill is included as one kind of psychological development of human. This is in line with *Peraturan Pemerintah No. 19 tahun 2005* on National Standards of Education on article 19, paragraph 1, states that: "The process of learning in the educational unit organized in an interactive, inspiring, fun, challenging, motivating learners to actively participate and provide enough space for innovation, creativity and independence in accordance with their talents, interests, physical and psychological development of learners."

In order to reach what government expected, ideally all of subject that taught in school should be able to enhance the teamwork skills but in the fact some subjects like science, that called as exact knowledge it just improve the academic skills of student. In the other hand most of student agree that Science is difficult subject, based on the preliminary study which is done by observing and interviewing the teacher of one of Public Junior High School in Kuningan, the achievement of science subject is still not

maximum, there are still many student that can't reach the standard minimum score. According to the teacher the problems arisen because of students did not pay attention and did not show active participation during the science lesson take a place. Student rarely involved in demonstration or even interactive discussion that can build the conceptual mastery. While during the group work, the interaction among student during performing tasks always dominated by student who have high achievement while other just lies on him. This condition make student not interested and easy to give up in learning science.

The problem elaborate above needs effort to solve, that is by applying the instructional model that stimulate their interest to learn and makes them enjoy during learning science so that they will not easy to feel bored and give up to learn science. Thus students' learning activity and learning achievement can be improved. The learning model that can address this problem is cooperative learning that can be defined as a teaching method that involves students in learning process in order to understand and learn content of the subject (Slavin, 2011).

One of types of Cooperative Learning is Teams-Games-Tournaments (TGT). TGT technique developed by De Vires on 1980, students is divided into heterogenic groups in a balanced way according to their abilities and genders. The purpose of establishing heterogenic group is to form groups with students of varying levels of success, interest, ability and so on. In this way, in tournament games, the groups with similar capacities can compete with each other's. TGT is believed can improve student understanding and also teamwork skill. Some of researchers have proved that use of TGT can improve student learning achievement (Van Wijk, 2011; Harmandar and Emine, 2008; Veloo and Chairhany, 2013) and students' teamwork skills (González and Covlán, 2015).

TGT is actually a cooperative learning type which is adaptable to most subject and grade levels (DeVires, 1980), but in this research the topic

was used to implement this learning model is food additives and addictive substance chapter. This topic is chosen because it comprises many chemical terminologies that might be difficult to remember and understood by the student. Researcher hope by implementing TGT student understanding and teamwork skills can be improved.

According to elaboration above, it is necessary to implement the study which is entitled "Students' Understanding Improvement and Teamwork Skills Profile after Implementation Teams-Games-Tournaments (TGT) in Learning Food Additives and Addictive Substances"

B. Research Problem

According to the background which is elaborated above, the research problem of this study is "How is the effect of Teams-Games-Tournaments (TGT) on Students' Understanding and Teamwork Skills in Learning Food Additives and Addictive Substances"

C. Research Question

In order to make this study focus, the research problem above is described with the following questions:

1. How is the implementation of Teams-Games-Tournaments (TGT) in learning food additives and addictive substances?
2. How is the effect of Teams-Games-Tournaments (TGT) on students' understanding in learning food additives and addictive substances?
3. How is profile of students' teamwork skills in learning food additives and addictive substances?

D. Limitation of Problem

In order to make the research more focused, the problem is limited as follow:

1. Conceptual mastery (students' understanding) that is measured in this research involves level cognitive of understanding (C2), applying (C3),

and analyzing (C4) based on taxonomy Bloom revision by Anderson et al. 2001.

2. Teamwork skills are described as a set of skills that individuals use to foster the success and effective teamwork which are produced when all the individuals involved harmonize their contributions and work towards a common goal.
3. In this research, topic of food additives and addictive substances that limited by Core Competence No. 3 and Basic Competence No. 3.7 of 8th grade of Junior High School on *Kurikulum 2013*. The topics that will elaborate are kind of food additives and its function, kind of addictive substances and the effect of additive and addictive substance.

E. Research Objective

The objectives of this study specified as follow:

1. Determine the effect of the Teams-Games-Tournaments (TGT) on the students' understanding.
2. Determine the profile of students' teamwork skills after implementation Teams-Games-Tournaments (TGT)

F. Research Benefit

The results of this study are expected to provide the following benefits:

1. For teacher this research can be used as the suggestion to vary the learning methods and models and also hone the teacher ability in implementing the effective learning through Teams-Games-Tournaments (TGT) in Science subjects.
2. For student this research can be used as the suggestion to student in enhance the students' understanding towards Science topics through Teams-Games-Tournaments (TGT) and enhance the effectivity and productivity of Science learning process so that student gets better achievement in Science subject.

3. For another researcher this research can be use as the consideration for further research developers.

G. Research Structure

In order to get systematic structure of the paper, this research paper is arranged based on the following organizational structure:

1. Chapter I: Introduction

   In this chapter there will be the background of research, research problem and limitation of problem, research objective, research benefit, and organizational structure of research paper, and limitation of problem.

2. Chapter II: Literature Review

   The second chapter will represent the literature review about Teams-Games-Tournaments (TGT), students' understanding and teamwork skills.

3. Chapter III: Research Methodology

   The third chapter gives the explanation about research method, research design, population and sample, instrument, procedure, and data collection and analysis.

4. Chapter IV: Result and Discussion

   The fourth chapter discuss about the result of research and how it interpreted.

5. Chapter V: Conclusion and Suggestion

   The fifth chapter is about conclusion and suggestion.