CHAPTER I
INTRODUCTION

1.1 Background

In improving the quality of Indonesia Human Resources has been realized in some of Indonesia's mission is contained in the *Garis-Garis Besar Haluan Negara (GBHN)* are realizing the national education system and a democratic climate and quality in order to strengthen noble, creative, innovative, insightful nationality, intelligent, healthy, disciplined and responsible, skilled and master science and technology in order to develop Indonesia's human quality looks very much. This is in line with UU No.20 of 2003 on *Sistem Pendidikan Nasional (Sisdiknas)* which serves to develop skills and form the character and civilization of the nation's dignity. With reference to the vision and mission of the Indonesian people as well as the functions and purposes of National Education, as mentioned above, the Ministry of National Education since 2010 to develop a character education at all levels of education. Given the importance of character, then the educational institution has a responsibility to incorporate them through the learning process.

Investment value in the context of the character formation of students have performed in the subjects of religious education, civic, and Indonesian. But the investment value is still considered less successful. This is evidenced by the many actions that are still showing a decline in morale among others, increased promiscuity, escalating violence teenagers, crimes against friends, the habit of cheating, drug abuse, and destruction of property of others. Unsuccessful investment in education has resulted in value for learners who are not in character such as honesty, responsibility, discipline even affection, for example the current real state officials have taken many corrupt practices that harm the State so that creating a public lie that hard to accept people they do not even have a little escape to another country and do not want to be responsible for his actions. In the classroom, students are cheated when the test even in doing the tasks assigned by the teacher. They do not want to try it first according to his ability and not a few of them do not do the work

completely. Fighting between students that may cause damage to public facilities and infrastructure. Many road users do not obey traffic rules and the difficulty of applying queuing culture. This is a result of the lack of character values of honesty, responsibility and discipline ingrained in Indonesian society. It has become a social problem still cannot be solved completely until now..

Many people think that this condition allegedly originated from what is produced by the world of education. Demoralized occur because the learning process tends to teach moral education and character and limited to text and less prepares students to address and deal with the contradictory and real life education that most contributed to this situation. non In the context of formal education in school, one of the causes for education in Indonesia is more focused on intellectual or cognitive development, while the soft skills aspect or non academic as the main element of character education has not been considered in an optimal and even tended to be ignored.

According to Sudarminta (in Zubaedi, 2011:3), which should strengthen educational practice aspects of character or virtue so far only able to produce a variety of human attitudes and behavior contrary to what is taught. For example how Pancasila Moral Education (PMP) and religion in the past is the subject of two types of values, which were not successfully instill moral values and humanism into the center of consciousness of students. Based on the results of research Afiya (in Zubaedi, 2011:3), the material taught religious education includes moral teaching materials, tend to focus on the enrichment of knowledge (cognitive), whereas the formation of attitudes (affective), and habituation (psychomotor) are minimal. Teaching of religious education is dominated by the transfer of science and religion are more textual recitation, so making it less touching aspects of social life on the teachings of tolerance in society and the nation. In other words, other aspects that exist in students, the affective aspect of moral virtue and received less attention. Therefore, beginning in 2010 Ministry of National Education has sought an integrated character education innovation is done in an integrated character education

into all subjects including physics subjects and integrated into all levels of education, especially Junior High School. The reason in the age to adolescence is a critical period of moral development, especially when individuals move from a relatively homogeneous primary school to secondary school where they are faced with the contradiction between the moral concepts that they have received with what they experience outside the family and neighbors so as to continue their education to a higher level learners who already have a moral provision brought into a better human being. Therefore, character education in school as long as it needs to be studied and sought alternative solutions, and needs to be developed in more operational operations so that more easily implemented in schools. Based on these explanations can be concluded that character education can be realized through the teaching of science at the Junior High School. Zubaedi (2011:273) state that: *"Pendidikan karakter pada dasarnya melekat pada setiap mata pelajaran karena setiap mata pelajaran pada dasarnya memiliki nilai-nilai karakter yang harus dilalui dan dicapai siswa.* In the development of character values to students can be done through the Science subjects According Sumaji et al, as cited by Sofyan Sauri (in Zubaedi, 2011:292), science contains a lot of the value of life. Science in this process is a learning process and take the meaning to life and the world around us. Many important values of life that can be learned from science, to give consequences to educators to be able to develop a science as one of the media in shaping students' personal. In this case, students can be invited to examine and learn the values that are useful in science in society.

Character development can also be done in physics, which is one branch of Natural Science subjects. In *Peraturan Menteri Pendidikan Nasional (Permendiknas)* No.23/2006 when examined in depth, each formulation of Graduate Competency Standards an implicit or explicit contained substance of the character. The substance of value/ character is in Graduated Competency Standards (*Standar Kompetensi Lulusan*) Junior High School students that faith and piety, justice, responsibility, discipline, nationalistic, mutual cooperation, persistent, creative and caring. Then the

distribution of investment value of each character in the science subjects in particular are curiosity, logical thinking, critical, creative, and innovative, honest, healthy lifestyle, confidence, respect for diversity, discipline, self-reliant, responsible, caring environment, and love science. Therefore, in discussing of physics matter, a teacher can develop one of the characters are as real physical matter is directed to develop students' role in understanding the natural phenomenon from the viewpoint of theoretical physics, to explore various sources of information and analyze it to improve that understanding.

Implementation process of learning science, especially physics subjects is one of the less desirable class of students. Because many students who feel less able to advance in studying the physics and feel that physics is a difficult and boring subject. As a result, the students learn physics is relatively low. In addition to individual factors such students, the teaching of physics that are presented are also less attractive that affect students' low motivation in learning physics. Physics is the science that is interesting, especially supported by the development of Science and Technology (Science and Technology) is rapidly increasing and current developments in physics put into one of the most important subjects. Therefore, to create learning interesting and meaningful physics educators need to combine the character development in teaching.

In an effort to implement character education in all subjects, educational institutions need to produce teachers who can understand how the concept of character education. This is because the real task of educators is not just transferring knowledge or information but also to educate students to be a person of character and morality. Therefore, educators must be able to make words and behavior of their students in the class to be either embedded in the end be of good character education later. Educator is a role model for students and has a very large role in shaping students' character. Educators role as forming of for young people based on *UU Guru dan Dosen UU No. 14 Tahun 2005*, teacher is defined as professional educators, with the primary task of educating, teaching, guiding, directing, training, and evaluate

students on early childhood education, formal education, primary education and secondary education.

The success of character education in each subject one of which is influenced by the precision of a master in creating conditions and an attractive learning environment such as the selection of models, strategies, approaches and even the method of learning. Therefore, a teacher to be able to do their job in educating students of characters required to understand and have adequate skills in developing effective learning model, creative and fun. Based on *Panduan Pendidikan Karakter di SMP* , the implementation of character education is integrated in the learning process take place from the planning, implementation, and evaluation of learning in all subjects. Among the principles to be adopted in the learning plan, carry out the learning process, and evaluation of the learning principles of Contextual Teaching and Learning which has been introduced to teachers, including school teachers throughout Indonesia since 2002. The principles are the Constructivism, Questioning, Inquiry, Learning Community, Modeling, Reflection, and Authentic Assessment. However, in this study, researchers selected as the basic principles of learning theory Constructivism to integrate character education.

Problem solving is a form of learning strategies based on understanding constructivism. Berkowitz and Bier (in Sani, 2011:3), argued that the practice is necessary in forming the character of the problem solving, empathy, social skills, conflict resolution, reconciliation efforts, and life skills. Problem solving is a strategy of teaching where students are given problems, then asked to solve. The purpose of problem-solving model is to instill in the students how to think systematically and logically in a problem solve problems. This will grow if there is a pattern of interactive learning which emphasizes communications direction that will put a lot of students as a variable that is indirectly provided the students how to solve problems in life and able to be responsible for settlement of these problems. One of the

advantages of solving problems that learning can help students to develop new knowledge and it is responsible for the learning they do Sanjaya (2009: 220).

Problem solving is a very important part in learning physics (Heller, Keith & Anderson, 1991:627) in J. Phys for problem solving can help students to process information that already exists in the minds of students and help students to construct knowledge he already has. Quite appropriate problem solving strategies in integrating the character of learning because, according to Zubaedi (2011:240), there are some skills that are necessary for someone to practice the values that are shared so that constructive and moral behavior in society. One of these skills are the skills to resolve conflicts. This is in accordance with problem solving strategies to teach students the steps in solving problems both subject matter and the problems of life. In order to run a problem solving strategy in performing well, we need a method of learning that can support the implementation of problem solving strategies. Researchers are trying to use the method of discussion, because the method of discussion to foster cooperation within the students to work together to solve problems to be faced. Discussion method is implemented so that all students can attempt to apply and solve problems and communicate physics. Because, learning to use a problem solving approach is to be student centered. Discussions with other friends of the newly learned concepts will make them to understand more deeply challenged. They express concepts and ideas with each other their own, listening to the idea of another friend, is argumentative, rational debate their different ideas. Of the debate, those who have no true idea, can improve the idea by taking the idea of another friend who is true, whereas if their ideas are correct, they become more convinced of the truth of the idea. Problem solving with discussion method provides the opportunity for students to take more responsibility for the success of the group and the results of solving problems that have been discussed.

Problem Solving strategy are consistent and can assist in the formation of a character value that should be developed by a teacher to educators, especially secondary educators.

Based on the above, then the author will conduct a study in experimental research, entitled *"The Effect of Character Education Implementation in Students Responsibility and Problem Solving Competency of Light Using Problem Solving Strategy at Junior High School"* .

1.2 Problems Identification

In accordance with the background of the issues described above, identified several problems:

1. Low character of the students responsibility in school
2. Fighting between students are increasing
3. Attitude of cheating is increase and become a habit
4. Discipline is decreasing
5. Implementation of character learning matter is not optimal
6. In general, teachers does not integrate character education in learning physics
7. Activities students are less in Teaching and Learning Activities
8. Lack of students' skills in solving a problem, especially problems in learning Science

1.3 Problem Limitations

Due to limitation of time and ability to conduct holistic research, all of the issues identified must be reduced, investigators need to limit the problem to be studied in order to analyze the results of this research can be done more in and directed.

Research issues to be tested are:

1. How to implement of character education in science teaching in order to improve student responsibility at Junior High School?
2. What is the effect of integration of character education using Problem Solving strategy to student competency in problem solving?

1.4 Problem Formulation

Based on the description of the limit problem, the problem in this research can be formulated as follows:

1. How does the character responsibility of Junior High School Class VIII students after following teaching and learning with character education implementation in Problem Solving strategy?
2. Is there any effect of character education implementation in Problem Solving strategy in improving of students responsibility at Class VIII Junior High School?
3. Is there any effect of character education implementation using Problem Solving strategy to Junior High School Class VIII student competency in problem solving?
4. Is there any interaction between students responsibility and problem solving competency?

1.5 Research Objectives

The purpose of the implementation of this research are as follows:

1. Knowing the improvement of students responsibility and problem solving competency at Junior High School Class VIII by implementing character education in Problem Solving strategy.
2. Knowing the effect of character education implementation in Problem Solving strategy in improving of students responsibility at class VIII Junior High School.

3. Knowing the effect of character education implementation using Problem Solving strategy to Junior High School Class VIII student problem solving competency.

4. Knowing the interaction between students responsibility and problem solving competency

1.6 Research Benefits

Expected benefits in this research are:

1. As a handle material for researchers in carrying out their teaching duties in the future.

2. As input to the teachers / prospective teachers that Problem Solving learning strategy can be an alternative option to develop the character of students

3. For additional reference material, for researchers interested in undertaking further research on character improvement in learning process