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Applying *The Twenty First Century Skills (4c Skills)* in Present Classroom Instructions

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***Abstract*-The teacher's skill in developing good and successful classroom learning has been high attention for the government for years. Several government decrees are issued to make standardized classroom learning to get the maximum achievement; among others, PP No 44 2015 on SNPT, Permendikbud No 022 2016 on Standar Proses Pembelajaran, PP No 55 2017 on Standar Pendidikan Guru. However, the quality of the teachers' classroom learning is still far from the expectations. Most teachers find it difficult to implement the four twenty first century skills. They still have to develop applying communication skills, creativity skills, critical thinking, and collaboration. All these problems are quite pressing to solve in order for them to have better understanding and skills to run successful classes implementing the twenty first century skills. To answer this, teachers should have good understanding and skills implementing classroom learning based on the scientific approach.**

Keywords: creativity, critical thinking, collaboration, communication

1. Introduction

Modernization has been going on quite rapidly, pertaining to economy, technology, automation, social life, and also education. Entering the twenty first century, Indonesian education has developed much better compared to the previous years in terms of social awareness in trying to build capability to cut the quality gap among nations, not only in South East Asia but also in international scope. The government has been working hard preparing all necessary needs to develop education covering human resources, facilities, and any regulation to promote better quality and quantity of education.

Ideally**,** as all necessary regulations are already supplied and sufficed, the government should be able to make all schools throughout the country run their daily activities as expected. All teachers who are assigned to hold classroom interactions have professional teaching competences. Even though many have already got their professional certificates, their teaching skills still need much development. That's quite reasonable as such workshops or professional discussion, or even seminar are quite rare to hold for them, especially after they have already achieved their professional certificates. Even when such professional discussions, workshops, or seminars are held, it is just quite surprising that those teachers, both certificates possessed or those in waiting; do not have their personal intention to join. The government would never let such a thing happen as they have regular extra income from being professional teachers which they have to spend to develop their professionalism. The intention and willingness to eagerly develop professionalism should engulf in the mental spirit of teachers. Let alone those professional ones.

Having no regular basis of maintaining professional skills, either for those having and having no certificates, brings about a condition which is contrary to the expected situation in teaching and learning process. As can be seen daily, teachers still find it difficult to design classroom learning which promote high activities. Quite many teachers still apply old teaching strategy by applying teacher centered teaching and learning activities. This usually happens to old and high experienced teachers as they have developed too much on that way; it is not easy for them to adjust themselves into the desired and recommended strategy. Teachers know much that teaching basically organizes many activities to achieve successful learning (Sardiman, 2004:48).

Therefore, as mentioned above, even though all necessary solutions have been applied and still going on, education problems still come out on their place

hampering the on going education throughout Indonesia from elementary level into high learning levels.

In this quite progressive advancement of science and technology, efforts must be applied to develop all means in education including teaching and learning improvements. The development of education could possible start from the classroom teaching and learning improvements. Interestingly, the success of the national education could stem from the success of designing classroom learning which students must experience and designed by the teacher. A good and successful learning must come from the success of the teacher in designing learning competence, finding out the learning strategy, implementing the learning plan, and also applying correct and suitable learning evaluations, and many more (Nasution, 2010:80).

As now entering the twenty first century, it is exactly the right time for teachers to design good and innovative classroom learning activities which really facilitate students to develop their twenty first century skills; creativity, critical thinking, collaboration, and communication. These four phrases or expressions, creativity, critical thinking, collaboration, and communication, are quite popular lately, especially in the education world. These four skills are exactly helpful in the students' future lives as clarified in the following note (Wendy, 2012);

These days, more and more employment opportunities are requiring people who can think adroitly—and often think on their feet. In no way am I suggesting that learning facts is out of date. Rather, I am suggesting that facts and data alone will not cut it in our 21st century. This is not only because front-line workers are called upon to make critical judgments, but also because the data and information is constantly changing, evolving, and being updated.

For teachers, whatever they teach, those expressions do not only come into their everyday terminology, but they have to give those teachers inspirations, assignments, or even homework. They give teachers inspirations because the teachers must believe that what they teach to student everyday must bring the students high creativity, critical thinking, collaboration, and good communication.

Those four expressions are also the sounding words for teachers which should always push them to think of what kind of activities or designed learning to lead students to implant these four expressions; creativity, critical thinking, collaboration, and communication into the students' unaware soft skills.

Through these four expressions, teachers are always reminded to really have good teaching and learning plans which they need to implement for students in their classroom interactions and also in the students' daily life. This also means that they must keep thinking professionally to develop better classroom learning and also better achievement for the students.

However, implementing those twenty first century skills is still vague for most teachers as if they walked in the darkness of a jungle. Therefore, when asked how to implement them, different teachers could possibly give different answers and views without being able to present the correct same concept. This is saddening as they have to stand in the front row of students to expose good examples for students in the education environment.

The four century skills; creativity, critical thinking, collaboration, and communication, are best implemented through scientific approach based teaching and learning. Through this approach, the present teaching and learning can accommodate all those four skills altogether. The implementation is not that complex. Therefore, teachers should learn how to understand that well and be capable to implement them in the right steps of the sequence of the scientific steps in the teaching and learning course.

2. Method

The data collected for this report were taken from peer teaching of PPG programs. Even though peer teaching in PPG programs was not considered as the real teaching classes, but it was certainly impossible that the teaching ability the participants presented their skills did not really express their teaching competencies. Therefore, observing their performances in realizing their lesson plans could certainly express their real teaching ability or competences.

As the activities were peer teaching, therefore, the method used was participatory observations. It was considered as participatory because the researcher always got himself engaged in giving feedbacks after every performance had come to an end.

The number of observed samples was 10 participants doing their professional jobs teaching their peers.

Basically, the focus of the observation was applied on the main learning step or the core step of the teaching and learning process when the students were doing the scientific approach steps of the classroom instructions.

This is intently meant to know whether or not the teacher doing the teaching and learning activities knew the concept well and were able to realize it in the professional battle.

3. Result and Discussion

3.1 **Observation result**

The observation results are classified and indicated in terms of those four century skills;

Critical thinking is a way of thinking students should develop for their life skill, as said in the following: Critical thinking is not a set of skills that can be deployed at any time, in any context. It is a type of thought that even 3-year-olds can engage in—and even trained scientists can fail in (Willingham, 2007). However, technically this is another problem which most teachers find it quite difficult to realize it in their professional activities. As teachers were brought up to have no experience in learning the application of critical thinking, it could take longer time to understand and implement it purposefully.

From the teaching observations, it was hardly visible that such of this skill is applied by the teachers. The problem could possibly come from the facts that most teachers do not really know critical thinking thoroughly, as explained in the following (Nilson, 2013); It is little wonder we don't understand what critical thinking is. The literature around it is abstract and fragmented among several different scholars or scholarly teams who work in their own skills and don't build on or even cite each other.

Therefore, they tend to just follow what the text book leads them to do so in their classroom interactions. They mostly believe that the application of critical thinking is normally done when students are assigned to do an assignment, exercise, or even a test.

Pushing students to develop their creativity is considerably easier than pushing students to think critically. The end process or result of those two skills could possible be used to justify why developing creativity is considered easier than thinking critically. Developing creativity simply ends in the students' products and mostly real than abstract, while thinking critically could end up in the form of a theory or a statement which is considered an abstract concept.

The result of teaching observation truly underlined the statement above as the teacher assigned students more on making language products or writing certain types of writing products than on pushing students to get or show their conceptual understanding or comprehension. The teachers must not only complete the teaching and learning activities by assigning students to develop their creativity by making their products. They also have to implement follow up activities such as checking, correcting, confirming the products into the desired goals.

The realization of holding collaboration in the teaching and learning instructions showed that the percentage of teachers in implementing this skill is a fifty-fifty position. Basically, most teachers got good awareness in taking such skill into their teaching and learning activities. However, their skills in managing this collaboration skill for students still need further development. Many were observed to give no feedbacks, no confirmations. Feedbacks and confirmations are very important for students to underline the students' understanding on the points being discussed or learned. Without giving any feedback or confirmation on the subject being discussed could give bad impressions for students. The teacher could possibly be blamed to have no mastery on the discipline.

The ability to develop communication skill is mainly focused on the teacher's taking too much time explaining a topic, or describing a certain talk to students. The teacher seems to have no clear map of designing communication aspects on the teaching and learning distribution. Therefore, during the length of the lesson, the teacher has no initiative to implement cooperative learning techniques into the classroom learning as cooperative learning technique is the main indicator ensuring that the teacher has great awareness in applying communication skills in the classroom learning.

Other obvious observation data came into spots ensuring that the teacher did not feel quite concerned on her position when she has to speak to the class. The teacher was speaking to the class wherever she was. This is just a clear indicator that the teacher needs communication skills very badly. A good basic communication skill which the teacher should build and maintain is building an eye contact. Therefore, speaking at a random place in the class without realizing where the teacher is would not be able to build an effective communication between the teacher and students as some students are on the right speaking position while others are not. Their position could even back the

teacher when students are still doing a certain task in the group.

Observation results show that most teachers really need better communication skills in order to build effective and efficient classroom communications between the teacher and students, students to students, a group representative to students other groups.

3.2 The Twenty First Century Skills in Scientific Approach Based Learning

Applying scientific approach based learning in the classroom instruction is much recommended this century. However, teachers do not seem aware that these two popular entries into the Indonesian education this century are in fact closely related. Many do not know how and when to apply the twenty first century skills in their flow of teaching and learning activities. The twenty first century skills are now up-to-date trend to pursue as good jobs require those skills as *Nancy W. Gleason* (2018; 4) convinced: Many of the new jobs that will exist even ten years from now, we cannot imagine yet. The well-paying jobs will involve creativity, data analytics, and cyber security.

Therefore, believing that scientific approach based learning is the main key for the implementation of the twenty first century skills would then help teachers understand and implement them in the professional job easily.

Therefore, the main and pressing job now is to make all teachers really understand what and how scientific based learning is all about. The scientific based learning is a kind of learning which implements the scientific approach steps in the learning implementation. The steps consist of observing, questioning, collecting information, associating, and communicating (Wikipedia). As this learning approach is stemmed from pure science, the implementation of these learning steps could vary based on the characteristic of the discipline. In language learning, the scientific approach steps could be modified into a simpler and easier one, not necessarily as mentioned above. Those steps are observing, questioning, analyzing, and finally networking.

Observing skill which is applied as the first step is the step for students to expose their critical thinking as they have to ask themselves a question or questions in order to know better and deeper what is being observed. Being led by observing activity, students should also become more creative as they have to make questions significantly relevant to what topic or premise being exposed. Therefore, thinking critically should not be presented theoretically. Instead, students must learn from their own logics based on the facts or data presented to lead into their own logical questions, or conclusion, as Daniel (2007) recommended; Thinking critically should be taught in the context of subject matter.

Questioning step is not an easy step because the students have to really observe the observable premise which could lead the students to create critical question or questions. Observing without questioning is looking at premises without using logics working in the mind. Questioning without being based on the observable premises is just a useless effort without logical context or connection. Therefore, observing must bring about questions, and questions must come from the observing activity.

Analyzing step is the step for students to get the result of what they are observing. The result taken from the analyzing step should be understood and taken as the demanded answer for the question raised. Therefore, the first three steps, observing, questioning, and analyzing, are really meant for students to get good understanding in the form of information or knowledge.

Creating good communication and collaboration can be implemented through those three steps as each of those three steps can be implemented through small group learning which all classroom participants can develop these skills well; communication and collaboration.

4. Conclusion

From the description above, it can be concluded that most English teachers still have to develop their professional skills much, especially related to the application of the twenty first century skills. Most English teachers have to learn much to understand the meaning of scientific approach based learning in order to really be able to implement this approach in the classroom teaching and learning. To implement the twenty first century skills, English teachers have to use scientific approach based learning. Each step of the scientific approach based learning can be used to apply the twenty first century skills well and paternally.

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