TEACHERS-ICT INTEGRATED INSTRUCTION IN SCIENCE

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In the fast changing world, technology plays an important role in the development of the different fields of the society. Education in the country should undergo modification in order to adjust to the changing environment and to catch up with the latest advancement of technology.

The skills of the students such as reading, writing and counting is not only the basic needs, the different innovation such as in technology has become broadly implemented in the society. It becomes a necessity for the learners and teachers to acquire ICT skills. According to Zindi and Aucoin (2005), it is the responsibility of educational institution to provide new and functional facilities that will greatly help the learners. They play an important role in imparting knowledge to them. This shows that the education sector has to do its share in developing technologically literate individuals to help them maintain a standard of living and create a balanced lifestyle (Bitter & Pierson, 2005). This greatly shows that the educational system plays a very important role for it is considered as “the force that, when functioning properly, promotes literacy or, when failing, allows illiteracy” (Bitter & Pierson, 2005, p. 3). There are countries which have ongoing ICT integration in education such as US, Europe, Australia, Japan, Singapore, Malaysia and Philippines.

The use of Information and Communication Technologies (ICT) in teaching and learning process motivated the learner for the holistic development and makes learning a meaningful one. This not only involve the learners’ cognitive level but also their manipulative skills.

K to 12 Curriculum is very new to all the person in the academe. The government said that the Philippines is ready to this advancement in education. But on
the other hand, education is facing difficulty. One of the contributory factor in this condition in education is the insufficient of instructional materials such as the learning materials. That is why there is an extensive effort to improve the low performance of students in Science and other subjects by the government to come up with materials that are readily available for use by students. Ramirez (2006) explained that our educators denounced that strategy and instructional materials cannot be separate in teaching-learning process. It is proven that learners learn more in the use of their senses in the education process. This ensures better understanding of the lesson.

On the contrary, Nacario (2014) said, the use of IM’s that is integrated to technology will be the answer to develop the learning of students. Today’s trends in education is that learners should be hands-on with what they are doing so that they could have a life-long learning. Teachers must accept the reality that students of this generation are techno-natives who can easily navigate through new technology.

Studies have shown that Philippine education needs an immediate attention and healing to ensure and sustain quality education. Science education is no exception. Most of the students observed science as a difficult and complicated subject.

Philippines categorically poor and ranked seventh among the Southeast Asian Nations in terms of education and innovation. More so, Philippines ranked 99th out of 138 economies in terms of primary education. The Philippines ranked 69th in educational system, 112th in science and math, and 76th on Internet access.

That’s why we need to integrate our lesson particularly in Science with ICT. The instruction involves the 5E learning model, reflective teaching laboratory activity, interactive games, and video clips.

This will be beneficial to us as a teacher. Those things that we can’t imagine or see like the heavenly bodies, atoms, smaller organism and etc., we can used videos for the students to see it. We can motivate them to learn by letting them experience the real
life situation. We can use games in encouraging them to learn difficult topics while enjoying.

This is the new trends in education, teachers should be open-minded in executing his lesson with the integration of ICT. We know that change is very difficult we must try this to provide quality education.

References:

