



Introduction

2.1 INTRODUCTION

There's no need to convince anyone to use digital technologies for education. It is like persuading a farmer to use a modern, high-tech machine, rather than horse and a lister for plowing. So do not expect please, that in this module you will read about advantages of e-learning or using e-applications in teacher's job. These are obvious. You will also not be bored with even a persuasive theory of didactics than can be adapted for new technological methodology. That is good for university lectures. And we are to work with kids to encourage them to learn with what they have all around: modern technology and the immensity of information, as we all living in the era of information. In the society living in that era, the role of the teacher changes from the "transmitter" of knowledge into the "curator" that provides a roadmap of learning and using the knowledge gained from the variety of sources.

Thus, the core of the methodology in this module is the "content curation" method, which is the method that came from the world of media and art, as it is biased on the work of museum and art exhibition curators, but it is also incorporated by journalists. This method, however can be very useful in teaching and learning process, as it is based on the educational philosophy of constructivism and connectivism. This method, in a very short description, is about gathering, choosing, processing and adapting information needed to achieve selected learning outcomes, throughout the wide world of information. This method is also strictly related to the PBL (*Problem Base Learning*) method, in which teacher is a donor of a problem to be solved by students, and his/her role is limited to be a facilitator and tutor in the process. But it also can be implemented in other, especially classical methods of teaching, even in the didactic method – hated, as it is teacher and content oriented, but still important in some areas of teaching.

With such approach, there are five steps of processing: first (step 1), we must determine the learning outcomes and the profile of students, that will allow us to choose the proper method of teaching, than (step 2) we must collect proper data to establish the teaching and learning process. Next step (step 3) is to find the right format for the data – appropriate to the kind and area of educational material. Then (step 4) we need to publish this material and make it easy accessible for the students. And finally (step 5) we must evaluate the job that is done.

According to this model, you will find four general topics in this module:

1. "Content curation" as a method of using ICT tools and web applications in education. (step 1)

In this section there will be more detailed information about methods and approaches that can be used in combination with ICT tools and internet applications. This topic will help to determine methods of teaching and learning and will explain the philosophy that lies behind the “content curation”. Additionally it will enable teachers to use their and their pupil’s work at school.

2. Topic 2: Tools and applications that support development of media and creative competences. (step 2 & 3)

In this section there will be proposed some tools to search, collect and apply tools that allows to create appropriate, attractive and friendly materials for both: teaching and learning. This will allow to develop digital competences not only for teacher, but also for pupils. Interactive materials, comics, films or music allow children to develop their natural creativity and eagerness to learn.

3. Tools and applications facilitating group and project work of pupils. (step 4)

This section allows to find and adjust proper environment to learning process, according to the type of the problem, capabilities of the pupils, accessibility of the equipment, etc.

4. Tools and applications that can be used in analytical and evaluation methods. (step 5)

This topic is to give information on the possibilities of using analytical and evaluation tools in the educational process. The purpose of evaluation is to have self-assessment of pupils’ efforts In order to improve it, so it is extremely important do develop their analytical competences. But it is also important to give the right feedback in such a way that it will encourage to further efforts and the right web-based application can help in evaluation of pupils’ achievements.

Each topic is equipped with examples of applications or tools that exists in the Internet, with short description and video instructions where available.

2.2 EXPANDED TEXT

From the point of view of human's development, present times can be described as an age of information. Theoreticians describe modern society as an "information society", which means that we are surrounded by information and use it to create new ones. Fast development of media and means of communication causes the knowledge as accessible as never before. But this also means that we must change our attitude to it: knowledge is still power, but the access for it is so wide, that we can easily become a victim of information noise. And this draws into conclusion, that education systems cannot further rely on traditional didactic methods and philosophy of "knowledge transmission" that lies beneath it. This is not a new approach as in the Roman Club Report, published in 1979 it was stated that we should make any limits in learning. This means that we should open for the new ways and technologies in education rather that pit ourselves in strict bounds of classical approach. For this, we don't have to make any new discoveries for education, as mostly we have philosophies of doing and methods of educational processing around us. We should only be opened for new approaches and technologies that draws from many spheres of our social life.

We use information personally, i.e. we use them to solve our personal problems and creates our personal perspective through which we perceive the world around us. Such an approach is based on constructivism – the view, that (in a big simplification) every personal creates knowledge from perceived information and thus makes the view about the reality. The mind is only a mediator between the world of facts and the personal experience that we create through learning. This is why the Problem Based Learning (PBL) method is one of the best to do so.

In PBL we begin with the problem to be solved. This problem requires knowledge and skills that can be obtained by a learner in the process of solving the problem. This method can be used on every step of education process and with using ICT tools as well. The role of the teacher, except of the fact that he/she is a the problem donor, is rather as a facilitator of the process of learning, who show the spheres and type of information needed, who helps with the method used to solve the problem, who support the process by giving the right tools or motivates for further and systematic work. In one word: the teacher is a kind of "curator" that keep his/her mind above the process of learning.