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Level: Master 2 / Language and Communication
Module: Pratiques communicationnelles
Course 3: ICT in Education

- **Course Scope:** An extension to the concept of social media "how people connect at distance" (This section will explore into a more detailed analysis of the ways emerging ICT tools can be used to facilitate interactive learning activities in various settings, and how teachers and students receive their learning experiences with such ICT tools)
- **Course Learning Objectives**

At the conclusion of this course, you should be able to:

- List examples of ICT tools and discuss their applicability to the classroom learning.
- learn how to effectively integrate these technologies into your learning practices and create engaging activities.
- Evaluate a potential technology tool for applicability to your learning objectives, class content

Guiding Questions to the Course

- a) Can you think of examples illustrating ICTs?
- b) How are ICTs actually being used in education?
- c) What do we know about the impact of ICTs on student learning?
- d) What do we know about the impact of ICTs on student motivation and engagement for learning?

ICT in education

ICTs are, today, a necessary tool in a changing society. The challenge is enormous for the school which is still considered as a vector of knowledge to be

acquired by the learners in order to better prepare them for social and professional integration.

Information and communication technologies provide education with many of the tools listed above:

- Educational Software (tutorials, databases, cultural products, edutainment (including games), extracurricular ...).
- Sites on the Internet (information for teachers, educational sites).
- Videoconferencing devices.
- Electronic mail (individual exchanges, mailing lists, etc.).
- The "chats" (chatter, " chat " devices), discussion forums, MOOs and virtual universes.
- “E-learning” platforms, but also software for “multimedia language laboratories”, software or authoring systems for the creation of educational materials (for the Internet, CD-ROMs, language laboratories).
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Interactive Learning Systems (ILSs)

The *Interactive Learning Systems* can be defined as learning systems in which different components act upon each other to facilitate learning. ILSs consist of five main knowledge components:

- ☉ **Content:** contains and links to information and knowledge sources related to subject area in digital form (eg e-book, virtual lecture, e-libraries, web...). It contains tasks to be taught in relation to course aims and objectives, and skills to be developed. This should also contain dictionaries to support student whose English is not their first language.
- ☉ **Learner:** contains knowledge and considerations about the student, including individual differences (eg gender, culture, prior knowledge, age....) and preferred learning styles of learning (eg sequential, global, Active.....)

- ⊙ **Technology:** contains knowledge and considerations about the media through which information and knowledge contents can be delivered and multimedia representation to accommodate different types of interactions. This component is a dynamic component that seeks up-to-date technologies.
- ⊙ **Pedagogy:** contains pedagogical knowledge, methods and styles of teaching relevant to each subject matter, objectives, and learners' differences. The wider the range of included strategies, the more effective and efficient the teaching and learning will be.
- ⊙ **Interaction:** this is the component that coordinates and balances the other four components. It includes type of interactions, and teaching styles to be used in accordance to different contents, different learners and technologies used (see Figure1)

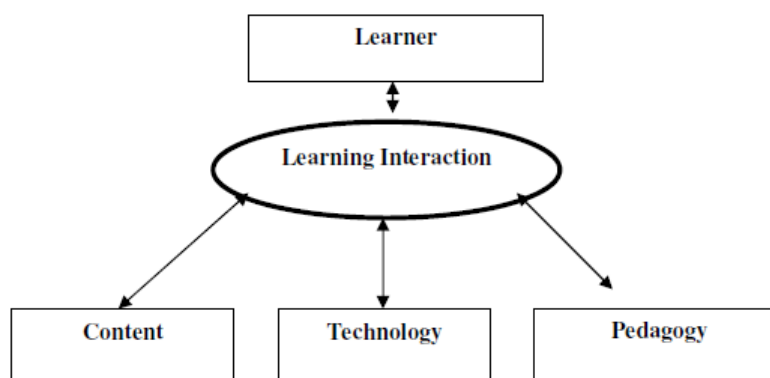


Figure 2. ILSs five main knowledge components

ICTs and Interactive Learning Systems (ILSs)

The inherent interactive features of Information and Communication Technologies (ICTs) are considered as an important component of ILS that affects students' learning processes.

ICT and Interactive Learning Systems (ILSs) can have many positive impacts on learning

- longer information retention time
- increased learning speed and level
- enhanced collaboration among peers
- higher confidence and motivation from learners

Types of interactivity in a learning systems

ICT can play an important role in promoting different types of interactivity in a learning system. Anderson (2008) outlines these categories of educational interaction:

- **Learner-Content Interaction:** Learners interact with content that results in changes in the learner's understanding: learners using hyperlinks to select and explore different topics in a website.
- **Learner-Instructor Interaction:** It allows instructors to stimulate and maintain learners' interest in the topic and provide support and encouragement to each student: Using asynchronous technologies such as E-mail and discussion boards, and synchronous technologies such as instant messenger and video conferencing.
- **Learner-Learner Interaction:** It enables learners to interact and work collaboratively with other learners, with or without the real-time presence of an instructor.

- **Learner-Interface Interaction:** It refers to manipulating tools to accomplish a task. ICT tools such as interactive multimedia, navigation control, and built-in guidance are widely used to facilitate such interaction and scaffold learning (Anderson, 2008).

Benefits of the Interactivity in a Learning Systems on Students

Here are just a few:

- **Strengthen friendships and relationships.** They can offer a sense of belonging and genuine support as learners connect with others around shared interests, challenges, passions, causes, and/or communities.
- **Help learners express themselves creatively.** They provide amazing platforms for collaborating on and sharing creativity.
- **Improve learners' digital literacy,** a required skill for almost any job today.
- **Collaborative learning** – classroom discussion groups, YouTube tutorials, and online learning libraries provide learners with greater access to knowledge than ever before.
- **Autonomy and Mastery** – They provide an outlet that allows learners autonomy to demonstrate mastery and competency to their circle of influence.

Project Assignment: Classroom Presentation

ICT in Education

Topic: Information and Communications Technology (ICT) can impact student learning when teachers are digitally literate and understand how to integrate it into curriculum.

Requirements:

- Watch the video: “Information and communication technology (ICT) in education” at <http://learningportal.iiep.unesco.org/en/issue-briefs/improve-learning/curriculum-and-materials/information-and-communication-technology-ict>
- Make a short presentation about ICTS in education dealing with the following questions:
 1. What is information communication technology in education?
 2. What is the role of ICT in education?
 3. What are the benefits of ICT in education?
 4. What is the impact of ICT in education?
 5. What are the ICT tools used in education?