



African Virtual University  
Université Virtuelle Africaine  
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## **AVU POLICY BRIEF**

**AN OFFICIAL PUBLICATION OF THE AFRICAN VIRTUAL UNIVERSITY**

Research & Practice in Open, Distance & eLearning

Policy Brief Number 2017-56

### **Managing Teaching and Learning: Learner Interaction in ODeL for Professional Development**

#### **Issue at-hand**

ODeL has introduced a total paradigm shift in teaching and learning: interaction in distance education is different from interaction in regular face-to-face education. This is because in distance education roles have been flipped - the teacher facilitates learning and the learner demonstrates more responsibility in learning. Interaction in online forums is a deliberate function. Usually it is the instructional designer with the collaboration of the course or program coordinator that decides on the degree of interaction that the learner will engage in so that it is pedagogically meaningful. Learner interaction in online distance education occurs in the following clusters (i) learner-content interaction, (ii) learner-instructor interaction, (iii) learner-learner interaction and (iv) learner technology interaction. A sound knowledge of the learning styles of the learners that can provide correct guidelines regarding the type of interaction that should be present and where it should exist.

However, in Open Distance Electronic Learning for Professional Development (ODELPD) situations, where emerging practitioners are being trained, it is important for them to discover the challenges of learner interaction first hand. They should be exposed to all possibilities and should understand the problems in each possibility as well as equipped with how to address these. For effective overall interaction, an understanding of learning styles is really important.

#### **Learning interaction and learning styles**

Towards that end, conscious of the fact that discussions of e-learning have focused mostly on technology, Strother & Alford (2003) have delineated a comprehensive list of human factors that need to be given equal consideration. They argue that individuals are different one from the other. Different learning styles and multiple intelligences provide the appropriate frame of

reference from which to pick and choose following appropriate needs analysis of students' profile, for program development. This will help ensure that the program is developed based on the closest degree of match between program type and learner profile. They advance that a "good pedagogical model ... [will accommodate] a variety of intelligences. This should help resolve any tension that had been identified between teaching styles and learning styles. Course designers need to recognize that individual students prefer one learning style to another and incorporate the abilities of multiple intelligences in their teaching process. However the learning style of the learner and the teaching style of the tutor/organization need to interact in favorable spaces to allow each unfold their optimum potential.

***Policy recommendation. (i) Ensure that ODeLPD courses carry interaction possibilities for all learning styles and provided the space for emerging practitioners to reflect on the relevance of each type on interaction and how best to incorporate it, (ii) ensure the future trainees have appropriate access to connectivity, bandwidth and own a computer, (iii) provide initial training to the professionals involved so that they navigate with ease with the technology.***

There are several types of learner interaction.

#### **Learner-content interaction**

Learner-content interaction is characteristic of education in general. In classical times, such interaction was rather static. With big and ancient textbooks, there was little to really space engage the learner with the learning content. In distance education where learner and teacher are not present, it may be expected that this type of interaction will be more difficult. In fact the learner's interaction with the content of learning is mediated by technology, which is a non-human means. This is a planned process and usually facilitated by both an instructional designer as well as the course developer. In this process, by interacting with new contents, Moore (1996, p.128) informs us that the learner constructs new knowledge by "accommodating information into previously existing cognitive structures". Interaction with content results in changes in the learner's understanding and life perspectives.

However online distance education that is offered on Learner Management Systems (LMSs) offers several ways in which interaction with the content can be enhanced and augmented. In fact, Strother & Alford believe that "today's technology can be used to facilitate learning in each of the intelligence areas" (2003, p. 1974). Indeed, contemporary LMSs provide possibilities of embedding audio and video elements in the content so that different learning styles are satisfied. However, difficulties can be experienced if the instructional design is not clear or confusing.

Two issues are important here: workload and degree of comfort. In an online learning environment, curriculum should be established as a roadmap with easily distinguishable milestones - in terms of objectives and outcomes. Otherwise, students can be confused and easily drop out or complete the course without having meaningfully achieved learning outcomes. Heavy workloads can also lead to drop out. If the curriculum is not compatible to

their given situations, they may drop out. Sensitivity needs to be exercised to support the students to complete the program. A similar view is shared by Nagel & Kotze (2010) when they state that course design as well as presentation mechanisms; along with excellence in online dialogic interaction separate the excellent online course from the mediocre or weak one.

### **Learner –tutor interaction**

The other type of interaction is the one that happens with the tutor. Depending on the type of online distance education and especially when it is not offered on an LMS, the tutor may be the only human being with whom the learner interacts in the learning process. The main aim of the tutor is to facilitate learner interaction with the learning content. The role of facilitator implies that the learning rapport may be more informal. Learners need to feel comfortable and experience the tutor's social presence (Garrison, 2009) to effectively articulate a given curriculum. They need tutor support to be able to relate the curriculum to their given contexts and cultures. The tutor may try to stimulate or maintain the learners' interest in the subject and their motivation to learn. Their role is also to organize the students' application of what they are learning through assignments where they have to demonstrate the extent to which they have grasped new content.

As part of their role, they provide counsel, support and encouragement to each learner. It is true that the extent and nature of this support will vary according to the educational level of the learners, the teacher's personality and philosophy and other situational and organizational factors (Moore, 1996). Tutors are also responsible for the organization of formal and informal testing to ascertain if the learner is making progress. To scaffold the development of understanding and competence among others, the online tutor should be committed towards facilitation and especially the use of questioning/problem posing. Generating knowledge relies on asking, researching and answering good questions. Through cycles of deepening reflection, guided by the use of prompts and probes, learning experiences are more likely to be 'transformative'. Thus, interaction between learner and a distant teacher will be especially beneficial for the learner who can draw on the experience of a professional tutor while interacting with the content (Moore, 1996). Such personalization of instruction along with accompanying explanations and support is a long-recognized advantage of distance education. In fact, because it happens in [often] moderated threaded conversations, in online distance learning situations the chances of interacting with one's tutor are sometimes higher than in face-to-face situations.

Effective teaching and facilitation is measured by student persistence, achievement and satisfaction. Possible shortcomings on the facilitation side would become visible if students start shunning discussions or where the facilitator's dominating presence prevents them from participating adequately in discussions. If this happens, breakdowns in levels of participation

would become visible on the LMS and program managers can easily diagnose and address difficulties, by checking the level and frequency of participation. In-built in the LMS are measures that can help address emerging facilitation problems. As a facilitator, upon diagnosis of problems, the professional trainee should learn to organize separate discussion sessions or e-mail exchanges to find personal solutions.

### **Learner-learner interaction.**

Learner-learner interaction can happen between two individual learners or in group settings with or without the synchronous presence of an instructor. This forms part of a new approach to constructivist learning where all those involved in a course can participate to construct new knowledge. There are times where content makes it necessary for the practitioner to experience group interaction as a strategy for learning. The online learning platform provides options to render interaction stimulating and motivating. There are possibilities for moderated discussions on threaded conversations that are expertly geared to meet learning outcomes or to construct group projects in forums where sometimes learners are encouraged to work together towards projects. This constructivist approach is valuable as a way of helping students to think out the content that has been presented and to test it in exchanges with their peers (Moore & Kearsley, 1996).

### **Learner- technology interaction**

In online distance education situations, the learner-technology relationship has multiple foci. First its success is dependent on connectivity, broadband and access to computers. Second, it is important for learners to know how to use their computers as well as the LMS on which the learning content is uploaded. In the scenario where all these are not easily available and the LMS is not user-friendly, experiencing frustration in the teaching-learning landscape is most probable. Nagel and Kotze point to the fact that “students drop out of classes when they cannot use the computer functionalities, cannot find the content” (Nagel & Kotze, 2010, p.46). To avoid these problems, it is advisable to induct the learners into the use of the LMS. Once they master navigational skills, they should be able to deal with the computer interface with a degree of comfort.

Technology’s interaction with pedagogy is the lubricant that brings students to master learning outcomes. Technology and media are an integral part of the plethora tools for instructional design that supports inquiry as well as delivery of feedback. Technology, pedagogy and communication theories interact to create situations that closely mimic social relationships that develop in classroom situations. Flexibly, the asynchronous nature of the LMSs enables learners to ‘walk into the classroom’ at their convenience. The range of integrated media and learning

resources permits students to choose what suits them best and accommodates a variety of intelligences and individual learning styles (Strother & Alford, 2003). The LMS should provide space for interactive, collaborative and critical-reflective activities consistent with the Community of Inquiry (COI) framework (Garrison, 2009). Mediated by technology, such activities enable the creation of a deep and meaningful (collaborative-constructivist) learning experience through the development of three interdependent elements – social, cognitive and teaching presence. Instructional designers need to design and organize courses to ensure that they provide the type of interaction that reflects all learning styles to ensure an optimal level of interaction.

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Published in the framework of the AVU Multinational Project Part II,  
funded by the African Development Bank

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