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Dynamics of interaction in online courses: an analysis of the use of forums and chats.

Interaction dynamics in distance education courses: an analysis on the use of Forums and chats

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SUMMARY

This work focuses on digital technologies in education, specifically distance education (DE) and the interactivity between students and teachers. The overall objective is to analyze the perception of interactivity in the Virtual Learning Environment (VLE), considering the most used tools, the subjects that contribute to learning, and the understanding of the concept of interactivity. The methodology adopted consists of a literature review and document analysis, based on the data and case studies presented in the work "Digital Technologies in Education".

(SOUSA; MOITA; CARVALHO, 2011). The results of the analysis indicate that the Forum stands out as the most interactive tool in the VLE, followed by Task, Chat, and Questionnaire. It is concluded that distance education offers diverse possibilities for the use of materials and methodologies that stimulate creativity, but there needs to be greater awareness of the potential of technological tools in promoting collaborative learning.

Keywords: Digital technologies. Distance education. Interactivity. Virtual learning environment.

ABSTRACT

This work focuses on digital technologies in education, with a focus on distance education (EAD) and interactivity between students and teachers. The general objective is to analyze the perception of interactivity in the Virtual Learning Environment (VLE), considering the most used tools, the disciplines that contribute to learning and the understanding of the concept of interactivity. The methodology adopted consists of a bibliographic review and document analysis, based on data and case studies presented in the work "Digital Technologies in Education" (SOUSA; MOITA; CARVALHO, 2011). The results of the analysis indicate that the Forum stands out as the most interactive tool in the VLE, followed by Task, Chat and Questionnaire. It is concluded that distance education offers several possibilities for the use of materials and methodologies that stimulate creativity, but there needs to be greater awareness of the potential of technological tools in promoting collaborative learning.

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1. INTRODUCTION

This work focuses on digital technologies in education, with an emphasis on education for Distance education (EAD) and the interactivity between students and teachers. EAD is a teaching modality which uses digital technologies as mediators of learning, offering flexibility of Time, space, and rhythm are given to students. Interactivity, in turn, is the ability to establish communication and interaction between the subjects involved in the educational process, whether between student-teacher, student-student, student-content, or student-interface.

Interactivity is considered an essential element for the quality and effectiveness of distance education. because it fosters motivation, participation, and knowledge building among students. The problem of The research guiding this bibliographic analysis aims to understand how interactivity is perceived and implemented in the Virtual Learning Environment (VLE). The VLE is the virtual space where the



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teaching and learning activities in distance education, providing various technological tools.

to facilitate communication and interaction between participants.

The overall objective of this article is to analyze, through specialized literature, the perception of students on interactivity in the LMS, identifying the most used and interactive tools, as well as the subjects that contribute most to collaborative learning.

2. THEORETICAL FRAMEWORK

2.1 Fundamentals of Distance Education and Technologies

Distance education is a teaching and learning modality that uses digital and network technological supports to mediate the teaching process, whether integrated into systems of blended in-person teaching or teaching conducted entirely through physical distance. Currently, the Distance education is undergoing a period of change, with the development of technologies that facilitate each process. Learning in virtual environments is increasingly taking place, in synchronous or asynchronous ways (SOUSA; MOITA; CARVALHO, 2011).

The advancement of interactive technologies has enabled real-time contact between various regions. Different types of software emerged, capable of developing various activities within the Virtual Learning Environments (VLEs), such as Moodle, which is free software, provide a space... intended for the development of online activities. However, for the process to work... For learning to occur, there needs to be mediation between the methodology applied and the needs of the student. student, aiming to address the shortcomings that exist in the development of self-learning.

According to Belloni (2003), distance and open education is increasingly seen as a a teaching method that is extremely suitable and desirable for meeting new demands. educational changes resulting from the new world economic order. The distinctive feature It consists of mediating the relationships between teachers and students, replacing the proposal of Regular classroom attendance is being offered through a new approach in which teachers teach and students learn. through unconventional situations.

3. MATERIALS AND METHODS

The conduct of this study adopted a methodological approach based on review. The analysis was bibliographic and based on the documentary analysis of secondary data. The primary source of analysis was... data and case studies presented in the book "Digital Technologies in Education", by the authors Robson Pequeno de Sousa, Filomena MC da S. C Moita and Ana Beatriz Gomes Carvalho (2011).

The methodological choice provided an investigation grounded in the perspectives of these specialists, focusing on the analysis of data relating to the dynamics and organization of courses Distance Management as described in the literature. The analysis focused on the interpretation of the data.



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quantitative and qualitative data presented by the authors on the interaction of 150 students in a Virtual Learning Environment, allowing for descriptive and interpretive analyses of the effectiveness of teaching tools.

4. RESULTS AND DISCUSSION

The analysis of the data presented in the reference literature (SOUSA; MOITA; CARVALHO, 2011) allows us to understand the dynamics of interactivity in distance learning courses. Evaluating the tools of the Virtual Learning Environment (VLE), studies indicate that the Forum stands out significantly, being cited by approximately 69.2% of participants as the most interactive tool. Next, The Task (41.0%), Chat (38.5%) and Questionnaire (20.5%) appear.

This predominance of the Forum is due to its asynchronous nature, which allows for reflection and exchange of ideas, collective construction of knowledge, and detailed feedback between student and teacher. A The perceived interactivity in the Forum is directly associated with the opportunity to express opinions and contribute knowledge collectively.

Regarding the understanding of the concept of interactivity, the document analysis reveals that the Students understand it primarily as communication between people, encompassing the exchange of Information and the sharing of experiences.

With regard to subjects, those that make intensive use of multimedia resources (such as Basic Computer Science and Information Systems tend to be perceived as the subjects that contribute the most for learning. The availability of resources such as video lessons, audio, slides, and quick tests. It was perceived as an important pedagogical differentiator for retaining attention and content.

The analysis also reveals that, although students recognize that investment in Technological resources promote interactivity, but there is still a gap in the full understanding of... How these tools enhance collaborative learning. For many, the opportunities In-depth debate and dialogue still seem distant from everyday academic life, indicating that need for greater teacher mediation.

FINAL CONSIDERATIONS

This article analyzed interactivity in distance education based on a literature review. specialized. The data shows that the Forum is consolidating itself as the main tool for interaction in the LMS, surpassing synchronous tools like Chat, due to its ability to to promote structured debates.

It can be concluded that distance education offers diverse possibilities for the use of materials and methodologies that stimulate the student's creativity and flexibility, favoring the self-learning. However, technology alone does not guarantee interaction; there needs to be a



Effective pedagogical mediation to transform the potential of tools into learning.

real collaboration.

It is crucial to raise awareness about the potential of these tools.

technological advancements, as well as greater proximity between students, teachers, and tutors, to overcome the feeling of isolation that sometimes affects students in distance learning programs.

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