Abstracts

Francesco Agrusti, Social class and formal education: an analysis through technology

In 2020, in Italy, during the Covid-19 pandemic, the existence of two reali-ties became quite evident: one in which distance learning has been developed to its fullest potential; another, in which students were left to their own desti-ny and where it was not even possible to guarantee them the possibility of following video lessons synchronously. The main aim of this paper is to create a profile of the current technological situation of Italian didactics with the help of international surveys and reports, scientific studies and national reports data. After assessing the effects of educational technology on learning, it is presented an attempt to investigate the causes of technological and cultural change, looking for possible answers in the writings of Aldo Visalberghi. In conclusion, a comparison between distance learning and traditional education is proposed to better understand what happened to Italian education during the pandemic.

Keywords: educational technology, influence of technology, distance education, digital divide.

Emma Nardi, Jean-Jacques Rousseau, an ingenious forerunner of distance education

Tickled by a mother who wanted to teach botany to her four-year-old daughter, Rousseau composed eight letters between 1771 and 1772, which are as many lessons, given that, in each letter he deals with the study of a family of plants, starting from the observation of a flower and then deriving its general characteristics.

Rousseau did not have any visual support but, with his well-known wisdom, and only using language, he created a small masterpiece that could

DOI: 10.3280/CAD2020-002010 123

be defined as *ante litteram* distance education. This article reconstructs the teaching aspects implicitly used by Rousseau and means to show how his is not a simple report of information, but a great lesson in teaching methods for the development of observation skills and lexical development.

Keywords: teaching, botanics, lexicon, rhetoric, observation.

Teresa Savoia, Distance education in the United States of XIX century. Study on rhetoric and style in distance education handbooks

Distance education in XIX century United States was an opportunity for those students who, by social and economic background, could not have obtained a certification. Several universities and private institutions created specific courses. They created an education industry which, through an aggressive advertising campaign, recruited millions of people. Their market strategy was based on a very precise rhetoric that relied on elements deeply linked to the roots of Anglo-Saxon capitalism, building motivation by hinting to a social and economic realization that in the Protestant tradition is rich in ethical, if not religious, values. Likewise, the use of handbooks structured on the needs of students, extremely practical, linear and logical in organization of contents determined their success over time. Two of these manuals have been analyzed to detect their main characteristics.

Keywords: distance education, rhetoric, education by mail, handbook for distance education, correspondence courses.

Giulia Venturi, Felice Dell'Orletta, Simonetta Montemagni, Elettra Morini, Maria Teresa Sagri, Natural Language Processing Methods and Techniques for Knowledge Extraction from School Reports

In its daily activities, the school produces large amounts of textual data in response to different needs, ranging from planning activities, to supporting internal and external communication and self-assessment. These data represent a vast and varied information asset which needs to be profitably analysed to monitor and study ongoing phenomena in the field of education. To profile the contents conveyed by this continuously growing documentation, we propose advanced methods and techniques for knowledge extraction based on language technologies. The paper illustrates the first and promising results of the proposed methodology for monitoring educational strategies through time, space and different types of schools, starting from free texts. The methodology has been tested within two scenarios focusing on i) the analysis of the strategic choices and actions implemented by schools to

achieve improvement and innovation objectives, and ii) the monitoring of the technical-professional and soft skills developed in School-Work Alternation experiences. Although preliminary, achieved results show that Natural Language Processing enabled methods and techniques can lead to effective and exhaustive school profiling.

Keywords: school system monitoring, educational data mining, big data, natural language processing, knowledge extraction.

Gabriella Agrusti, Valeria Damiani, From Comenius to multimedia learning

In Education, there is a growing need to shift the focus of research from short-term and distance-oriented relations to long-term and moderated/mediated interactions. In the field of Media Education, studies have stressed the relevance of text analysis as a semiotic mediator in the teaching and learning process. This paper examines the relation between images and learning and therefore between words/texts and their iconic representation through the "Orbis Pictus" by Comenius and later studies by R. Mayer on multimedia learning. The idea of combining words and images was for the first time methodologically conceptualized by the work by Comenius who linked the teaching to real and perceivable experience in order to improve understanding and therefore learning. Mayer's theory, in developing the principles for reducing the incidence of extraneous processes on memory workload in multimedia learning, offers possible models for structuring knowledge where images and texts are key elements for instruction. Conclusions stress the role of images that, rather than a simple support in the learning process, have relevance as structural features for teaching and learning interactions.

Keywords: Comenius, Mayer, multimedia learning, image, text, media education.

Cristiano Corsini, The costs of reopening schools at all costs. A pedagogical reflection

In order to analyze the Italian educational policy since the school lockdown of March 2020, the paper uses as a lens the Dewey's vision of the continuum between means and ends. The article examines the reopening policy of in-presence activities wondering if public opinion and educational policy have conceived the return in-presence as ends-in-view or as an absolute end-in-itself.

Keywords: distance learning, Covid, lockdown.

Olaia Fontal Merillas, Inmaculada Sánchez-Macías, Guadalupe García-Córdova, René Michel Gallegos López, Heritage education in Mexico: Assessing the quality of program design using the Q-Edutage Scale

The study presented shows an overview of heritage education in Mexico. It starts from an analytical exploration on the development of the concept of heritage education and programmes evaluation. A mixed research method has been used, in which an analysis of a sample of 100 educational projects is carried out using the SAEPEP-OEPE method, a model developed by Spanish Heritage Education Observatory. This method allows the identification, among other aspects, of trends related to heritage categories, project typologies and audience selection, as well as the quality of educational designs. As a result, five programs with excellent quality in their design are obtained as well as the need to reflect on the concept of heritage, and the possibilities of increasing the impact of experiences through documentation and replication of the exercises.

Keywords: evaluation, heritage education, Mexico, educative programmes.