

COMMUNITY OF INQUIRY AS A THEORETICAL MODEL OF TEACHING APPLIED TO NURSING
COMMUNITY OF INQUIRY COMO MODELO TEÓRICO DE ENSINO APLICADO À ENFERMAGEM
COMMUNITY OF INQUIRY COMO MODELO TEÓRICO DE ENSEÑANZA APLICADA A ENFERMERÍA

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ABSTRACT

Objective: to present the Community of Inquiry (Col) model as a possible reference in the guidance and evaluation of actions developed in a virtual environment, either in distance or semi-presential mode, in Nursing teaching in different contexts. **Method:** theoretical reflection study with the description of the Col and reports on higher education in Nursing. **Results:** In this model three central elements are proposed – social presence, cognitive presence and the presence of teaching – that give sustainability to the collaborative constructivist learning in a virtual environment. It also has an instrument that evaluates in 34 questions these three presences. Col has already been used in the planning and evaluation of activities in higher education in Nursing that use the integrated distance and presence modalities. **Conclusion:** The model has an extended evaluation of the teaching actions, in which face and distance are added, offering the best in each of these modalities. Similarly, presences of teaching, social and cognitive privilege the interactionist and collaborative work highlighting fundamental actions of Nursing training.

Keywords: Education, Nursing; Learning; Education, Distance.

RESUMO

Objetivo: apresentar o modelo Community of Inquiry (Col) como referencial possível na orientação e avaliação de ações desenvolvidas em ambiente virtual, seja na modalidade a distância ou semipresencial, no ensino de Enfermagem em diferentes contextos. **Método:** estudo de reflexão teórica com a descrição do Col e de relatos no ensino superior em Enfermagem. **Resultados:** nesse modelo são propostos três elementos centrais – a presença social, a presença cognitiva e a presença de ensino – que dão sustentabilidade à aprendizagem construtivista colaborativa em ambiente virtual. Também conta com um instrumento que avalia em 34 questões essas três presenças. O Col já tem sido utilizado no planejamento e na avaliação de atividades no ensino superior em Enfermagem que utilizam as modalidades a distância e presencial integradas. **Conclusão:** o modelo dispõe de uma avaliação ampliada das ações de ensino, nas quais o presencial e a distância se agregam, qualificando essas modalidades de ensino. Da mesma forma, as presenças de ensino, social e cognitiva privilegiam o trabalho interacionista e colaborativo, destacando ações fundamentais da formação em Enfermagem.

Palavras-chave: Educação em Enfermagem; Aprendizagem; Educação a Distância.

RESUMEN

Objetivo: presentar el modelo Community of Inquiry (Col) como posible referente en la orientación y evaluación de acciones desarrolladas en el ambiente virtual, en distintos contextos de la enseñanza a distancia o semi-presencial de Enfermería. **Método:** estudio de reflexión teórica con la descripción del Col y de relatos en la enseñanza superior en Enfermería. **Resultados:** en este modelo se proponen tres elementos centrales – la presencia social, la presencia cognitiva y la presencia de enseñanza – que dan sustentabilidad al aprendizaje constructivista colaborativo en el ambiente virtual. También cuenta con un instrumento que evalúa estas tres presencias en 34 cuestiones. El Col ya ha sido utilizado en la planificación y evaluación de actividades que utilizan las modalidades a distancia y presencial integradas en la enseñanza superior en Enfermería. **Conclusión:** el modelo dispone de una evaluación ampliada de las acciones de enseñanza, en las cuales la modalidad presencial y a distancia se agregan, ofreciendo lo mejor de cada una de ellas. De la misma forma, las presencias de enseñanza, social y cognitiva privilegian el trabajo interactivo y colaborativo destacando acciones fundamentales de la formación en Enfermería.

Palabras clave: Educación en Enfermería; Aprendizagem; Educación a Distancia.

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INTRODUCTION

Technological mediation in Nursing higher education is increasingly present with adoption of virtual learning environments that need theoretical references to guide the proposed actions.¹ It is observed that, when planning *online* teaching activities, many teachers focus on the technological resources or content, putting aside the fundamental pedagogical conception to achieve learning objectives.

Community of Inquiry (Col) was identified as part of the pursuit of a collaborative and interactional theoretical model, in line with the pedagogical proposals of activities carried out in virtual environments.² *Community of Inquiry* (Col), which can be translated as a research community, was proposed by a group of Canadian teachers, based on John Dewey's theory, with the intention of monitoring the quality of the learning process in a virtual environment.^{2,3} In this model, the interaction between three central elements should occur in order enable an environment conducive to learning, namely, teaching, social and cognitive presence.²

In Nursing teaching, Col has been reported to be used in semipresential graduate and undergraduate activities, with typical development of collaborative activities, with exchanges among participants, with particular use of a discussion board.^{1,4,5} The evaluation of the educational activity can be accomplished by a validated instrument developed according to this theoretical model, with 34 questions divided into three dimensions (teaching, social and cognitive presence), keeping the same denomination (Col).⁶ Despite the theoretical model and the instrument are widely known and used in different areas of knowledge in English-speaking countries, they are still poorly applied in Nursing education, especially in Brazil.

In this article, we intend to present the *Community of Inquiry* (Col) model as a possible reference to guide and evaluate actions developed in a virtual environment, whether in the distance or semipresential modality, in Nursing teaching in different contexts. The applicability of this theoretical framework offers opportunity to support collaborative educational actions that committed to the interaction between participants to build knowledge.

COMMUNITY OF INQUIRY AS A THEORETICAL MODEL

The Community of Inquiry (Col) model was initially described as a conceptual framework to guide the development of online education activities.² Investigations that led to the proposition of this theoretical model revealed that computer-mediated teaching activities have potential to create a learning community.² This model has John Dewey's work as reference, more specifically the concept of research community, which is inserted in the constructivist theories of learning. In this theoretical frame-

work, the process of knowledge construction occurs through inquiry, experience and discovery in the collective setting.⁷

In this model, the three central elements are proposed - social presence, cognitive presence and teaching presence - support the collaborative constructivist learning in virtual environments.⁸ Social presence refers to the ability of students to perceive themselves as real people, communicating in a virtual environment. Collaborative activities give to students better opportunities to broaden their social presence and sense of online community.²

Cognitive presence enables students to be able to build meanings from events that trigger learning, by exploring, integrating and solving problems. This presence was proposed based on a cycle of practical inquiry, in which the participants move deliberately, beginning with investigation until understanding a given problem or question.²

Finally, teaching presence is composed by elements of the process of facilitation and guidance, which students will use to achieve a meaningful learning, attributing a personal meaning with educational value. Social, cognitive and teaching presences interfere with student' satisfaction, perception of learning and community feeling.²

In 2008, the Community of Inquiry Survey Instrument was proposed and validated in Canada in English in order to strengthen and expand the use of Col. This instrument consists of 34 items distributed in three domains: teaching, cognitive and social presence.⁶ The instrument has been used in several studies analyzing the efficacy of online education, either in the distance or hybrid (semipresential) regimen of education.⁹⁻¹¹ The instrument has been used by researchers from different English-speaking countries, and has been translated and validated for the Korean language; in Brazil and Portugal, it was translated and applied without cross-cultural validation.^{8,12} No articles were identified with the cross-cultural validation of the Col instrument into Portuguese language, which would demonstrate adequacy of the questions to the context in which is to be applied.

APPLICATIONS OF THE COMMUNITY OF INQUIRY IN NURSING EDUCATION

The Col began to be cited in health publications from 2012 onwards.¹³ Validation of the constructs of the Col theoretical model was carried out in 38 graduate or undergraduate courses in the health area of a university in the United States that provided *online* education. In the analysis performed, it was verified that the sense of community developed among nursing students was beneficial, contributing to the formation of learning communities. Teaching presence highlighted the role of teachers and tutors who are responsible for creating an environment that allows students to interact and participate with ease in *on-*

line discussions and other social forums of the course. Furthermore, it was considered that the Col model describes components necessary for a satisfactory educational experience.¹³

The hybrid or mixed education model (*blended learning*) enables the association of online activities, carried out at a distance, with face-to-face meetings, and is also suitable for application of the Col. This modality was proposed in a graduate Nursing course in Australia.⁵ Due to these characteristics, teachers were concerned with the quality of the course so as to promote independent learning, but with involvement among participants. Face-to-face contact between students, teachers and tutors was intended to facilitate socialization, in addition to promoting a sense of community, collaboration and questioning. The distance approach had independent activities and discussions with colleagues, teachers and *online* tutors. Social interactions between teachers and students, as well as interactions that occur among students, were related to cognitive and teaching presences, promoting independence, reflective practice, critical thinking, analysis, and evaluation.⁵

The role of teachers in this course format is very important as it involves careful planning of activities in terms of content and learning objectives to be achieved. Besides acting as moderators of the course, teachers are attentive to the participation of each student, encouraging them to become actively involved in the planned activities. Guided by the theoretical Col model, moderators should stimulate participation and collaboration in the learning community, making everyone feel "co-creator of knowledge" that was generated through "collective intelligence".⁵

In this sense, teachers use Col to guide distance activities, aiming to integrate and support undergraduate Nursing students in a situation of exchange. The use of *online* activities through *Skype* calls and active learning methods developed social presence among students in other countries who were exchanging experiences with their teachers and colleagues who stayed in the university.⁴

The use of Col as an evaluation instrument of courses was described in two studies.^{13,14} In the first one, Col was used in training courses for specialist nurses in countries such as Canada, the United States and Australia, which use a hybrid model of education (*blended learning*).¹⁴ In this specialization anesthetic nursing course, teachers used the Col to advance their assessment of student learning, including concepts of the *Bloom's* taxonomy in cognitive presence.¹⁴ While assessing this adaptation, authors concluded that they integrated essential components needed to plan, guide and evaluate distance learning activities with anesthetic Nursing students.¹⁴

In the second study, Col was used to evaluate the level of satisfaction of students of an Obstetric Nursing Graduate course. All in all, students rated all categories of the instrument positively. Items with high levels of agreement were related to

the *design* and organization (teaching presence), open communication (social presence), trigger event, exploration and resolution (cognitive presence). However, other areas presented low levels of agreement, such as facilitating items, affective expression and group cohesion (social presence). In the view of researchers, when properly Col is applied and developed, it is effective for Nursing teaching and research and can provide to students the necessary skills for collaboration, which is meaningful for student' learning outcomes and satisfaction.¹

FINAL CONSIDERATIONS

Col represents a reference that contributes to the planning of actions developed in virtual environments, either undergraduate curricular courses or specialization courses, with experiences reported by Nursing higher education institutions. It also contributes to the evaluation of teaching and learning of students, which can be carried out with the instrument that has the same name.

The model has an extended evaluation of the teaching actions in which presential and distance modalities are included, qualifying these modalities of teaching. Likewise, teaching, social and cognitive presences favor interaction and collaborative work, highlighting fundamental actions of Nursing training.

The recommendation for future studies is that this theoretical model be validated and applied in the Brazilian context, with the due adaptation to higher education actions. As a limitation, it is worth noting that this is a recent model, still in the phase of application, still missing studies with consistent methodologies to verify the impact of the Col methodology in the teaching and learning process in nursing.

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