

Online teaching of undergraduate nursing students: An integrated review.

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Introduction and problem statement

Globalization and the technological explosion place many demands on higher education. One of these demands is the effect of emigration on nursing education as well-trained nurse educators immigrate to other countries for better remunerations. This increases the shortage of nurse educators and the workload of those who stayed behind while the demand for education increases. Higher education institutions move to blended and distance education to address these demands and ensure access and affordability of education (Billings & Halstead, 2016: 78-79). Distance education and online teaching has been applied to undergraduate and post graduate nursing students globally to address the shortages of nurses. The experiences, effectiveness and possible challenges need to be reviewed to ensure best teaching practices to enhance the quality of nursing education.

Aim

The aim of this presentation is to reflect on the effectiveness of on-line teaching and assessment of undergraduate nursing students.

Methods

The integrated review was utilized to collect, classify and analyze the body of literature (IEEE, 2014) on online teaching and assessment. A subject librarian assisted the researcher to search databases for articles related to the title. The electronic data bases included CINAHL; Academic Search Premier; Africa-Wide Information; PsycINFO; MEDLINE; ERIC (Education Resource Information Center); EBSCOhost; Education Source; Health Source: Nursing /Academic Edition and Sabinet, with a time frame between 2009 and 2016. The key words were on-line assessment, undergraduate student nurses, on-line assessment AND undergraduate student nurses; on-line teaching; on-line teaching AND undergraduate student nurses; virtual classrooms; on-line competence; distance learning (distance learning AND undergraduate student nurses); on-line learning; blended learning; technological competencies (technological competence AND undergraduate student nurses). The literature search with the mentioned keywords resulted in a total of 62 potential relevant articles. The researcher used the Johns Hopkins appraisal instrument to guide the inclusion/exclusion ability of potential articles. Twenty three of the 38 articles reviewed were included after the appraisal. Thematic analysis reflected two major themes: opportunities and challenges in online learning.



Results

THEMES	CATEGORIES	SUB-CATEGORIES	THEMES	CATEGORIES	SUB-CATEGORIES					
1. Opportunities in online learning context	1.1 Increased student satisfaction and motivation Matiakala et al. (2013); Holland et al. (2013); Akimanimpaye & Fakude (2015) Du et al. (2013) McCutcheon et al. (2015) Andrew et al. (2015) Gilmore & Lyons (2012) Lounsbury & Pittenger (2011); Davies et al. (2015); Pryjmachuk et al. (2015); Salyers et al. (2014); McKee et al. (2010)	<ul style="list-style-type: none"> Enhances retention of students Lifelong learning 	1. Opportunities in online learning context	1.7 Integrates theory-practice gap McCutcheon et al. (2015) Agrawal et al. (2016) Holland et al. (2013)	<ul style="list-style-type: none"> Unlimited opportunities to observe the demonstration of practical skill Integrates knowledge and skills 					
						1.2 Enhance problem solving skills Matiakala et al. (2013) Hsu & Hsieh (2014)	<ul style="list-style-type: none"> Critical thinking skills Knowledge acquisition and retention 	1.8 Enhances computer literacy skills Holland et al. (2013) Davies et al. (2015) Akimanimpaye & Fakude (2015); Bigony (2010)	<ul style="list-style-type: none"> Distant/rural areas 	
										1.3 Increased flexibility for learning Davies et al. (2015) Akimanimpaye & Fakude (2015); Du et al. (2013) Andrew et al. (2015) Gilmore & Lyons (2012) Holland et al. (2013) Bigony (2010); Salyers et al. (2014); Pryjmachuk et al. (2015); McKee et al. (2010)
	1.4 Conducive learning environment Du et al. (2013) Andrew et al. (2015) Akimanimpaye & Fakude (2015)	<ul style="list-style-type: none"> Non-threatening User friendly 		2. Challenges in online learning context	2.1 Unstable internet connectivity Esewe, & Adejumo (2014); Maboe & de Villiers (2011) Davies et al. (2015) Akimanimpaye & Fakude (2015) Matiakala et al. (2013) McKee et al. (2010)					
						1.5 Collaborative learning Hsu & Hsieh (2014) Matiakala et al. (2013) Akimanimpaye & Fakude (2015); Salyers et al. (2014)	<ul style="list-style-type: none"> Peer support Information sharing 	2.2 Inadequate internet facilities Esewe, & Adejumo (2014); Maboe & de Villiers (2011) Akimanimpaye & Fakude (2015) McKee et al. (2010)	<ul style="list-style-type: none"> Limited computer training 	
										1.6 Enhances student participation Vonderwell & Boboc (2013) Hsu & Hsieh (2014) Matiakala et al. (2013) Akimanimpaye & Fakude (2015) Du et al. (2013) Andrew et al. (2015) Mostert & Snowball (2013) Bigony (2010)
2.4 Limited support from facilitator/lecturer Esewe, & Adejumo (2014); Maboe & de Villiers (2011); Davies et al. (2015); McKee et al. (2010)	<ul style="list-style-type: none"> Computer costs Training costs Internet data costs Cost of programme development 									
		2.5 Financial implications Bigony (2010)								

In spite of publications representing the global perspectives on distance education and online teaching in nursing, the effectiveness of online assessments have not been addressed. Most of studies reflected the experiences and perspectives of learners on online teaching (Agrawal et al. 2016; Killion et al. 2011) with a limited description on the perspectives from the educators' viewpoint (Esewe & Adejumo 2014). Most of the studies applied the quantitative design (Akimanimpaye & Fakude 2015; Maboe & de Villiers 2011) with a few combining qualitative and quantitative components (Holland et al. 2013) and very few used a qualitative design (Matiakala et al. 2013). Only one intervention study (Agrawal et al. 2016) was found on the effectiveness of virtual classroom training.

Conclusions

The review reflects the opportunities and challenges of online teaching and learning. Most of the publications were based on online learning with a lack in the dimension of online teaching. It is recommended that the opportunities and challenges of online teaching should be explored to enhance the quality of teaching in nursing education.

Bibliography

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