Nursing Informatics in the Critical Care Setting

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The 2014 article *Nursing informatics: The emerging field* defines nursing informatics in the words of nursing journals worldwide. The author reviews major milestones in nursing informatics from the formation of the Healthcare Information and Management System Society in 1961 to International Conference on Nursing Informatics held in 2012. This article also reviews all of the benefits of nursing informatics such as nursing education, computer-based learning, documentation, and improved patient care. The author takes a very pragmatic approach in discussing nursing informatics as a growing field in health care. "Nursing informatics has a long and rich history of applying information technology to the enhancement of nursing practice" (p. 130). The author is an assistant professor of the department of child health nursing at the Maharishi Markandeshwar Institute of Nursing. The intended audience seems to be the scholastic audience in pursuit of gaining a better understanding of what nursing informatics is and the benefits associated. I think this article is a great resource for defining what nursing informatics is and would be useful in reinforcing the growing need for nursing informatics. This article differs from the others with its thorough explanation of nursing informatics.

The 2013 article *Critical evaluation of transforming care at the bedside application in a multi-model nursing practice: A reflective review* discusses transformation of bedside care related to the introduction of health care informatics. The authors reflect on several health care systems approaches with bedside care and how patients are affected. The authors state that the British model of nursing practice utilizes a total patient care model that allows for nurses to spend more time with a single patient. However, this leaves the nurse responsible for several roles without compensation as such and little time for live documentation. The authors have a subjective approach. They imply that though technology is a great asset to health care when used; there are kinks to work out such as coordination of care, collaboration with health care providers, and data reliability to ensure patient safety. The authors are affiliated with the National Guard Health Affairs. The intended audience here is entire health care systems so they can see the overall effect on patient care when technology is utilized with bedside nursing. This example vaguely describes different examples of health care systems in the world. I don’t think this article is particularly relevant to my topic. However, it may be useful in addressing the various types of health care system settings nursing informatics is utilized in.

The 2010 article *Integrating best evidence into patient care: A process facilitated by a seamless integration with informatics tools* discusses specifically how Vanderbilt University transitioned to an electronic medical record system. This team found that integration of information technology was an important aspect of consolidating patient health information, patient portals, and evidence-based order sets. The authors take an objective approach to analyzing Vanderbilt's integration of information technology while showing the research and experience involved in coming to this conclusion. The authors are educators and board members at Vanderbilt University that are directly involved in the biomedical informatics department. The intended audience is other health care systems who might benefit from seeing the approach this university took in integrating technology systems. I like this source as a specific example of how informatics has improved a health care system, opposite of some of my other sources that simply explain nursing informatics in general.

The 2011 article *The role of informatics in promoting patient-centered care* discusses the use of health care informatics in the treatment of cancer patients. The authors describe patient-centered care as being responsible for the care of patients and accounting for the patient's wants and needs. The article addresses several areas that are currently being used to help promote communication between patients and providers such as patient health portals, patient controlled health records, survivorship care planning, and quality of life tools. Many studies have shown that these tools improve patient perception of care. According to the authors, however, these tools can lead to misinterpretation of progress notes, lab values, and rationales without the presence of the physicians to guide them through these findings. Overall, the authors express their opinion of the value of healthcare informatics in oncology care, but caution against informatics getting in the way of direct patient-provider interactions. The authors are doctorate level medical professionals. The intended audience is all health care professionals to help stress the usefulness of technology in health care. This source is a broad example of how informatics is important to patient care. I don’t believe this source is specific enough for my topic. However, I would possibly cite this source in an introduction setting when explaining the importance of informatics.


The 2014 article *A review of analytics and clinical informatics in health care* discusses the sudden increase in use of electronic patient data. The authors address how health care systems have been improved using technology in this shift from paper to electronic data. The
authors stress the importance of analytics in health care systems to ensure efficiency and accuracy. This article states the opinion of the authors to encourage others to focus on health care informatics in the future, since it will be a necessary field in health care from here on out. The authors are affiliated with the Children's Hospital of Philadelphia, three of which are in the department of anesthesiology and critical care. The authors intended audience is health care professionals who have interest in informatics, as well as to encourage health care professionals to explore this new area. This article explores the importance of informatics in health care in a specific setting. I believe this source is more useful in my focus of informatics in the critical care setting versus the more generic sources listed above.


The 2011 article *The tele-ICU: A new dimension in critical care nursing education and practice* discusses the purpose and usefulness of nursing informatics in the ICU setting. The authors address tele-ICU’s, a way to remotely monitor ICU patients using a critical care team, as a new alternative to high costs of fully staff ICU personnel. These tele-ICUs are used by a team of nurses and physicians who are constantly monitoring these critically ill patients and are able to make timely and qualified decisions about their care. Unfortunately, the studies the authors reference state that length of admission associated with tele-ICU has only been reduced by just over 1 day in the ICU. They also address the barriers to a tele-ICU largely being comprised of resistance to change and technology, as well as communication issues between the tele-ICU staff and floor staff. The authors state their opinion as the tele-ICU is "the future of critical care in the
United States” (p. 343). The authors are nurse administrators at the Mayo Clinic. There intended audience seems to be rural hospital administrators that may need the alternative to an expensive critical care team, but have the patient need in their community for an ICU. This is a unique source compared to the others that is a specific example of the effects of nursing informatics on a critical care setting.
References


