

Development and Validation of an Observation Tool for the Assessment of Nursing Pain Management Practices in Intensive Care Unit in a Standardized Clinical Simulation Setting

■ ■ ■ *Emilie Gosselin, RN, MSc, Patricia Bourgault, RN, PhD, Stephan Lavoie, RN, PhD, Robin-Marie Coleman, RN, MSc, and Anne Méziat-Burdin, MD*

■ ABSTRACT:

Pain management in the intensive care unit is often inadequate. There is no tool available to assess nursing pain management practices. The aim of this study was to develop and validate a measuring tool to assess nursing pain management in the intensive care unit during standardized clinical simulation. A literature review was performed to identify relevant components demonstrating optimal pain management in adult intensive care units and to integrate them in an observation tool. This tool was submitted to an expert panel and pretested. It was then used to assess pain management practice during 26 discrete standardized clinical simulation sessions with intensive care nurses. The Nursing Observation Tool for Pain Management (NOTPaM) contains 28 statements grouped into 8 categories, which are grouped into 4 dimensions: subjective assessment, objective assessment, interventions, and reassessment. The tool's internal consistency was calculated at a Cronbach's alpha of 0.436 for the whole tool; the alpha varies from 0.328 to 0.518 for each dimension. To evaluate the inter-rater reliability, intra-class correlation coefficient was used, which was calculated at 0.751 ($p < .001$) for the whole tool, with variations from 0.619 to 0.920 ($p < .01$) between dimensions. The expert panel was satisfied with the content and face validity of the tool. The psychometric qualities of the NOTPaM developed in this study are satisfactory. However,

From the École des sciences infirmières, Faculté de médecine et des sciences de la santé, Université de Sherbrooke, Centre hospitalier universitaire de Sherbrooke, Sherbrooke, Québec, Canada.

Address correspondence to Patricia Bourgault, RN, PhD, École des sciences infirmières, Faculté de médecine et des sciences de la santé, Université de Sherbrooke, 3001 12^e Avenue Nord, Sherbrooke, Québec J1H 5N4, Canada. E-mail: Patricia.Bourgault@usherbrooke.ca

*Received March 21, 2013;
Revised May 22, 2013;
Accepted May 30, 2013.*

*1524-9042/\$36.00
© 2014 by the American Society for
Pain Management Nursing
<http://dx.doi.org/10.1016/j.pmn.2013.05.003>*

the tool could be improved with slight modifications. Nevertheless, it was useful in assessing intensive care nurses' pain management in a standardized clinical simulation. The NOT-PaM is the first tool created for this purpose.

© 2014 by the American Society for Pain Management Nursing

INTRODUCTION

Patients hospitalized in intensive care units (ICU) present an unstable and precarious health status. To help them regain a certain level of homeostasis, multiple monitoring and treatment actions are required. Pain management helps achieve that goal. Pain management includes the identification of pain, its comprehensive assessment, and the actions taken to alleviate it (Herr et al., 2006; Herr, Coyne, McCaffery, Manworren, & Merkel, 2011; Registered Nurses Association of Ontario, 2007). Intensive care unit patients can feel pain from various sources other than from the pathology that justified their hospitalization, such as the suction in endotracheal tubes, the installation of chest tubes, or the effects of positioning in the bed. In a study of 17 multiple-trauma patients hospitalized in intensive care, 74% said they had suffered from moderate to severe pain during their stay. Paradoxically, 81% of their nurses said the patients were adequately relieved of their pain (Whipple et al., 1995). More recently, a lack of correlation has been observed between pain intensity in the postoperative period as documented by nurses and their patients (Bergeron, Leduc, Marchand, & Bourgault, 2011). There appears to be a real difference between the pain felt by patients and pain perceived by their nurses. A study of 561 patients in a university hospital concluded that although pain intensity was relatively high, in many cases patients received inadequate treatment for it: 58% suffered moderate to severe pain, while 36% suffered severe pain (Strohbecker, Mayer, Evers, & Sabatowski, 2005). Of that last figure, 30% did not receive analgesia, and only 24% had received appropriately prescribed medication (Strohbecker et al., 2005). In another study, 63% of the patients received no analgesia before positioning, suggesting that procedural pain is undertreated (Puntillo et al., 2004). It has appeared that a significant amount of pain is present, yet too often it remains unidentified (Ahlers et al., 2008; Glynn & Ahern, 2000).

Several obstacles may explain this insufficient level of pain relief. Fear of administering opiates because of multiple side effects is often mentioned in

the literature (American Association of Critical-Care Nurses, 2006; Ead, 2005; Jovey et al., 2002; 2003; Whipple et al., 1995). Insufficient knowledge and time could also have a negative impact on pain management (Patiraki-Kourbani et al., 2004; Tunks, 2003; Wang & Tsai, 2010; Whipple et al., 1995). Pain is rarely the top priority in intensive care environment when the patient's life is in jeopardy. Furthermore, additional obstacles are found in this context (Haslam, Dale, Knechtel, & Rose, 2011; Subramanian, Allcock, James, & Lathlean, 2012). The fact that ICU patients are frequently intubated or unconscious makes communicating with them and subjectively assessing their pain more difficult (American Association of Critical-Care Nurses, 2006; Wang & Tsai, 2010). Yet regardless of whether they are capable of communicating their current state or not, these patients too should have their sensory, affective, and behavioral dimensions evaluated (Gélinas, Viens, Fortier, & Fillion, 2005).

To address this challenge, reliable behavioral assessment tools (observation tools) have been developed and validated to assess pain levels (Pudas-Tähkä, Axelin, Aantaa, Lund, & Salanterä, 2009). It has been shown that implementing such observation tools increases the confidence of nurses in their assessments of patient's pain, leading to more frequent assessments and reassessments (Gélinas, Arbour, Michaud, Vaillant, & Desjardins, 2011; Topolovec-Vranic et al., 2010). Though such tools are strongly recommended for unconscious or intubated patients (Herr et al., 2006; 2011), they remain very seldom used because of their recent development and their unavailability in many nursing units (Celia, 2000; Rose et al., 2012; Watt-Watson, Stevens, Garfinkel, Streiner, & Gallop, 2001).

It is known that there is pain in ICUs, but there are barriers to alleviating it. Behavioral assessment tools have been developed, but their use has not caught on. And yet, pain management is a crucial factor in patient recovery. Therefore, we need to learn more about what nurses do to manage their patients' pain in the specific context of the ICU.

Briggs (2003) defines the concept of pain management as a complex nursing skill requiring a proactive approach. On a more operational level, pain management includes identification, multidimensional evaluation, and pharmacological and non-pharmacological interventions to prevent, minimize, or alleviate pain with as few side effects as possible (Herr et al., 2006; 2011; Registered Nurses Association of Ontario, 2007) while obtaining active participation from the patient whenever possible (Larsen, 2007).

There are several ways of describing how nurses manage pain in ICUs, such as clinical interviews

Download English Version:

<https://daneshyari.com/en/article/2677981>

Download Persian Version:

<https://daneshyari.com/article/2677981>

[Daneshyari.com](https://daneshyari.com)