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**High quality interventions that reduced the overall number of frequent emergency department visitors for pain-related complaints**

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**Abstract**—Background: Pain is one of the most common complaints that patients present to the emergency department for; emergency medicine providers are tasked with providing appropriate pain relief while simultaneously limiting the risk of personal and societal harm that may result from opioid misuse. The Lakeland Regional Medical Center developed a medical management program that identified frequent emergency department visitors with a chief complaint of pain. Individualized care plans were developed for these patients. Summary: Generation and dissemination of care plans led to a decrease in emergency room visits and hospital admissions. The authors describe their experience with a quality improvement initiative that identifies frequent emergency department visitors with a chief complaint of pain and provides individualized care plans to these patients. The goals of the program are to improve patient’s quality and consistency of care, through interventions that eliminate the prescribing of opioids while providing non-opioid alternatives.

**Keywords**—care plans, frequent emergency, department visitors, medical management, opioids, pain.

**Introduction**

Both non-urgent and life-threatening diseases and disease states are treated in emergency rooms (EDs). In the USA, there were 130 million emergency room visits in 2018, according to the Centers for Disease Control and Prevention. This figure includes all visits and does not differentiate between patients who had one visit and those who had several visits during the year. According to a 2010 literature review, frequent ED use was defined as 2 to 12 visits year. A regular ED visitor is someone who goes there at least four times year, according to the criteria most frequently used in the literature. According to this classification, regular ED users make up between 4.5 and 8% of all ED patients and between 21 to 28% of all ED users (1).
Important of Individualized care plan

The individual will achieve their best attainable level of function and wellbeing with the aid of an individualized care plan that is built around a systematic process that includes thorough assessment and precise cause identification. This plan results from the interdisciplinary team (IDT) process that is led by the specific resident or patient, as well as by proper and prompt documenting of the reasons behind decisions, as well as monitoring that enables us to successfully reassess and update the plan as necessary. The MDS was initially created as a tool to evaluate and record important data on each LTC patient as the cornerstone for a care plan that identifies hazards and recommends interventions to lower the patient's risk in multiple care areas, However, by itself, the MDS (2).

Examples

Another patient with dementia was "bothering" them by often trying to control what they did. Conflicts arose as a result, which increased the unit's level of suffering. The IDT had tried numerous interventions, but nothing had worked. The frustrated IDT was about to give up when a nursing attendant who frequently chatted with the visiting family members and looked after this person suggested, "Why don't you get him a huge calculator? He oversaw a department as an accountant for 40 years" (3). The IDT acknowledged that they had neglected to describe "who" and "what" this person was like prior to experiencing memory loss. The fights subsided once the resident was given a calculator and charts with monetary values, along with instructions to add up the columns for the business office. According to a care plan, the resident would keep their pulse oximetry reading over 93. Even though the resident was not visibly dyspneic, staff members continued to worry whenever the temperature dropped even a little below 93, and they sought to force him to use oxygen that he did not want. However, once it was determined that the resident had COPD and that the respiratory rate and other vital signs were more crucial than the pulse oximetry result, the care was modified (4).

Patient experiences of engagement with care plans and healthcare

The importance of patient participation is now widely acknowledged on a global scale, and it is receiving increasing legislative attention thanks to mounting scientific evidence. A key component of high-quality healthcare is patient participation, which enhances health outcomes and lowers healthcare expenses. The "patient's voice" and the "patient's active engagement in their healthcare" are prioritized by the formal government programs that have been put in place in the majority of Western nations. Patient engagement has many different meanings (5). Despite these differences, Coulter's stressed the value of the partnership between patients and healthcare professionals, who cooperate to "promote and support active patient and public involvement in health and healthcare and to strengthen their influence on healthcare decisions, at both the individual and collective levels." The improvement of health and healthcare was the goal of this engagement, which was defined as patients, families, their representatives, and health professionals working in active partnership at different levels across the health care system in direct care, organizational design and governance, and
policy-making. Patient involvement was described as a "process-like and complex experience, coming from the concurrent cognitive (think), emotional (feel), and conative (act) enactment of individuals toward their health care" by (5).

Patient engagement is crucial, according to the Institute of Medicine (IOM), which has embraced patient-centered care as one of the six pillars of excellent care. According to the IOM, patients should have access to health knowledge and information so they may make decisions about their own care. The fundamental justification for patient engagement stems from the moral precepts of upholding patient autonomy and encouraging self-determination. The final decision on the safety of the care, which still rests with the healthcare system, should not be made by the patient. The value of patient involvement, its advantages, and how it affects healthcare quality and safety. The advantages include increased patient compliance with treatment plans, better (6).

It is well acknowledged that patient involvement with the nursing profession is important for managing disease. However, only approximately a third of hospitalized patients who were polled could name a hospital doctor. In Western nations, nurses have a long history of encouraging patient participation in medical care. They are also educated to promote patient autonomy, self-determination, and cooperative healthcare at all times. Patient involvement in their own health care is influenced by how healthcare professionals interact with them; this involvement rises when practitioners are responsive to patients' wants and concerns and provides them feedback. Consequently, it is preferable to adopt patient engagement at all levels of a healthcare institution, as Carman et al. highlighted, as a continuous process (7).

Carman's "Framework For Patient and Family Engagement in Health and Health Care" advises that patient involvement should start by incorporating patients' values, perspectives, preferences, and experience in disease prevention, diagnosis, and treatment because doctors and nurses are on the front lines of patient care. In order to support patient engagement, patients must actively participate in treatment planning, communicate their goals, reach consensus on decisions, and take charge of their health. Additionally, doctors and nurses must assist patients in communicating, comprehending, and weighing the risks and advantages of their healthcare decisions. In order to help patients understand, doctors and nurses must provide them as much information as possible as well as involve the patient's support system and family (8).

Future decision-making is aided by knowledge regarding patients' opinions on engagement, which show their lived experiences and the level of care offered by healthcare professionals. Additionally, by promoting sensible organizational actions, surveys of patient participation can be utilized to strengthen identified areas of weakness in the healthcare system. Using this data, medical professionals like doctors and nurses can be held responsible. A viable and trustworthy method for assessing patient participation and its effects on the standard of care, health outcomes, and expenditures is the patient Health Engagement Scale (PHE-scale). After thorough theoretical development and meticulous psychometric validation, the scale was created. A relevant and
trustworthy scale for assessing patient activation is the Patient Activation Measure (PAM). This unique tool can be utilized (9).

With reports of up to 42% of all ED visits being due to painful diseases, pain is frequently a primary complaint or symptom among all patients who go to the ED. A policy statement on the prescription of opioids for adult patients in the ED was thus released in 2012 by the American College of Emergency Physicians. In this statement, it is mentioned that emergency physicians rank third overall among specialties in terms of the quantity of opioid prescriptions written for patients aged 10 to 19 and 20 to 29 years old, and that they rank fourth for patients aged 30-39 years old. This equates to about 12% of all written opioid prescriptions (10). Since the release of this position statement, the availability and use of state-specific prescription drug monitoring programs for reporting the dispensing of controlled substances has expanded, enabling healthcare professionals to make more informed prescription decisions. The policy statement emphasizes the significance and duty of the emergency medicine practitioner in prescribing adequate pain management while concurrently limiting the possibility of harm to oneself and society from opiate addiction (11).

With 210,020 reported visits in 2017, the Lakeland Regional Medical Center claims the title of busiest single site ED in the United States. The medical management strategy was put into place in 2008 with the goal of identifying patients who frequently visit the ED with pain as their primary complaint and offering them specialized care. Through measures to stop the prescription of opioids and offer non-opioid alternatives, the program aim to increase the quality and consistency of care provided to patients (12). For regular ED patients with pain-related chief complaints, we created and implemented tailored care regimens at the Lakeland Regional Medical Center. Our objective was met since, among the 294 patients who participated in the medical management program, there was a 56% decrease in ED visits and a 53% decrease in hospitalizations. Individualized care regimens can cut down on emergency room visits in heavy users. This is the most comprehensive data set of patients who have been referred to a medical management program. Back/neck discomfort, headache, and abdominal pain were the three most common primary complaints related to pain. Self-pay and government insurance patients were observed most commonly (95%), which is consistent with other studies. The incidence of drug abuse history, mental history, and the occurrence of multiple comorbidities were also similar to earlier research (13).

This may be explained by the fact that a huge geographic area's worth of semirural patients are served by the Lakeland Regional Medical Center. 60% of patients had access to a primary care physician even in this unusual setting. Additionally, our study only included individuals with pain complaints, as opposed to other studies that included patients with a variety of diseases. But our research backs up findings from a smaller patient sample with pain complaints (14). Social workers and primary care physicians have participated in these. Successful care coordination, scheduling of outpatient appointments, and specialist referrals. Compared to other earlier research, the level of integration between our individual care plans and outpatient resources was lower. Reducing visits was achieved rather well by using a reasonably straightforward tailored
treatment plan that was centered on frequent users with pain complaints. Our 56% decrease in visits to the emergency room was greater than previously reported. This may be as a result of an exclusive focus on pain complaints (15).

A growing body of research demonstrates that individuals who are more involved in their care experience better health outcomes at lower costs than those who are less involved. We discovered a satisfactory level of patient engagement in this study of the care plans implemented in a renowned Saudi medical center. Although patient engagement is crucial, there is room for improvement in how doctors and nurses view it. However, patients and the members of their families essentially benefit from a very encouraging environment that encourages active participation in their healthcare goals (15). There is no correlation between the demographics of the patients and how they feel about engagement. The characteristics of research participants were also found by Dakken et al. to be unrelated to their participation in care plans. The degree of patients' desire for engagement and participation in decision-making was not correlated with demographic traits. Male patients responded more favorably, which might mean that men are more open when speaking with medical professionals. However, patients want to be included in decision-making regardless of their demographic traits. This is especially true for vulnerable patients, who might not be aware of available treatments or how their vulnerability might influence their engagement and decision-making (13).

The proportions of responding nurses and doctors varied, and we discovered that position mattered. Nurses' evaluations of patient participation were more positive than those of doctors, possibly reflecting the long-standing nurse-patient relationship and the advocacy role that nurses have undertaken. Unfortunately, 14% of doctors said that patient engagement was "not important" or "not extremely important." Administrators need to establish a culture of continuous compliance when it comes to actively involving patients and their families in healthcare plans, and they need to equip healthcare professionals with the knowledge and abilities to make sure this happens. Modern healthcare systems must get rid of the paternalistic notion that doctors always have their patients' best interests in mind and can make decisions for them. Instead, medical professionals must cultivate, maintain, and sustain patient engagement (15).

The open-ended inquiry investigated the perspectives of doctors and nurses. It's interesting that "access," or the act of establishing a connection with patients and removing obstacles to their comprehension of their health condition and associated concerns, was the first theme identified in terms of patient participation. The foundation of the interaction between doctors, nurses, and patients is at this level of participation. Understanding the patients' values, interests, and views was the second focus, which combines knowledge and expertise. "Education and empowerment," the third topic, is related to self-motivation, respect for diversity, and commitment to (and adherence to) the treatment plan. The "self-management" theme was informed consent and active engagement in the treatment plan. Achieving the "facility" theme was a prerequisite for the later themes (5).
Patients’ ability to become aware and active in the decision-making process is facilitated by effective communication and respect for the patients’ values and preferences. A whopping 95% of doctors and nurses said it was "essential" or "very important" to actively listen to patients' concerns. A significant barrier to developing self-management skills and actively participating in care may be patient health literacy. The ability to find, comprehend, and apply health information when making decisions is known as health literacy. Therefore, patients' abilities and adoption of techniques that successfully promotes behavioral changes in the healthcare system (13). The stark contrast between doctors' and nurses' impressions of patient engagement reflects the real lived experience of patient engagement and serves as an assessment of the patient engagement process. Although we used established patient engagement measures to validate our survey, more research employing additional psychometrically validated patient engagement scales is required. These scales include the Clinician Support for Patient Activation (CS-PAM) instrument and the Patient Health Engagement (PHE) scale for both patients and clinicians (13).

**Care planning in the emergency department**

Over the past 50 years, disease patterns in Ireland have evolved significantly, and today’s top health concerns include cancer, accident-related illnesses, and cardiovascular disorders (Department of Health and Childr. For many of these patients, the ED is their initial stop. Every year, over 1.2 million patients in the Republic of Ireland visit EDs run by the Health Service Executive. The expansion of a multi-cultural society, rising patient expectations of a more informed public, changes in demographics and dependence ratios, enhanced technology, and other factors all have an impact on health care today. This is especially evident in emergency departments, where staff members must take into account these aspects in addition to rising attendance rates and patient turnover (15). The nursing and midwifery professions have become more involved in documentation as a result of other changes in the healthcare system. The Freedom of Information Act has raised the nursing workforce’s accountability and has ramifications for both administration and the maintaining of accurate records. The standard of nursing records reflects the standard of care given to clients, thus it is important to plan nursing care, evaluate care, and support communication between all parties. For the purpose of providing high standards of care, continuity of care, and compliance with legal obligations, thorough client care records are critically necessary (5).

**References**


current state, challenges, and recommendations to enhance the emergency care of older adults. *AEM education and training, 2*, S5-S16.

