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**Standardized Daily Family Updates to Improve Patient Satisfaction Scores on A
Pulmonary Medical Progressive Care Unit**

by

Quentin Brice Butterfield

A project submitted to the faculty of
Gardner-Webb University Hunt School of Nursing
in partial fulfillment of the requirements for the degree of
Doctor of Nursing Practice

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Abstract

Communication remains one of the most challenging aspects of healthcare. COVID-19 added another layer of communication breakdown in the form of visitor restrictions that limited or removed visitation for hospital-positive patients. Guided by the principles of Jean Watson's theory of human caring, a literature review was performed to determine best practice evidence related to improvements in communication.

A daily family update form was drafted to guide the nurses of a pulmonary medical progressive care unit in providing standardized daily family updates to improve communication through consistency of information shared. Patients identified family members they would like to receive daily updates and the nurses of the unit called daily with the information outlined on the form. The project aimed to establish if the incorporation of a standardized daily family update could improve patient satisfaction and perception of care, evidenced by an increase in patient satisfaction scores related to three HCAPHS questions, "good understanding of managing health," consistency of information from staff," and "nurses explained in a way you understand."

The project found a success rate of 86% when nurses attempted daily family updates. Patient satisfaction scores related to, "consistency of info from staff," by 220% related to previous quarters. Nursing staff reported satisfaction with the form and process implemented.

The project remains a viable option for future implementation in other areas within this and other hospitals to seek similar improvement in communication. Further study is needed to determine the long-term effects and success of future projects utilizing the daily family update form.

Keywords: patient, communication, updates, family, satisfaction, press Ganey, progressive care.

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Problem Recognition

Isolation requirements after the COVID-19 pandemic have left patients without family support during challenging times in health care. Lack of communication and physical presence left patients feeling lost and anxious when they need support and reassurance the most (Smith & Lim, 2020). Nurses are implicitly strained for time in typical hospital settings with a normal patient population and with added time delays of donning and doffing personal protective gear, patient care inevitably becomes more delayed, and time spent with each patient decreased (Firouzkouhi et al., 2021). Patient experience from inside the rooms may not directly reflect the current state of the healthcare provider's full assignment and conclusions of perceived lack of concern may be drawn by patients if they are not kept informed. Patients may experience longer intervals of provider absence as the nurse couples care in each patient room to limit exposure time with COVID-19 positive patients. Patients may become discouraged, angered, afraid, or exhibit other forms of emotions due to perceptions of care. In the past, many patients' families were integral in the care of patients as they often met immediate emotional and physical needs the patient may incur while the nurse, nursing assistant, or physician are not present. With reductions in patient visitation, many patients, especially COVID-19 positive patients, had restricted visitations imposed that left them and their families feeling distanced from their health care decisions. Concerned families wanting updates, monopolize staff during routine care times. Patients are required to communicate with a multitude of hospital staff to coordinate their care and eventual discharge. Patients need to be informed to make complex decisions about their healthcare and discharge plans. Patients unable to make complex decisions may wish to appoint a family member

to communicate on their behalf. According to Niazkar et al. (2020), older patients with COVID-19 are at a 9.0% increased risk of developing or presenting to the hospital with encephalopathy and confusion. The pulmonary progressive care unit where this DNP project was conducted is primarily comprised of patients over the age of 65 who were often confused related to oxygenation issues.

Within the pulmonary medical progressive care unit, firmer visitation requirements during the COVID-19 global pandemic led to feelings of isolation and anxiety in hospitalized patients and resulted in a reduction of direct patient interactions. Communication has been drastically reduced between the patient, their families, and healthcare providers, and the patients needed to be at the center of their healthcare. Nurses reported difficulties dealing with family members that feel uniform. Families often feel disconnected and call the units frequently for updates and interrupting the nursing flow. This can directly impact the care received by patients and increases the risk of medical error. Nurses spend a large portion of their day stopping to give family updates and are often interrupted while providing direct patient care.

Problem Statement

In the past year, visitor restrictions on the pulmonary medical progressive care unit have impacted Hospital Consumer Assessment of Healthcare Providers and Systems (HCAHPS) survey scores and resulted in a score of 54.2% which is 27.9% lower than the previous rate of a score of 82.1% in 2019, related to the question, “nurses explain in a way you understand.” HCAHPS scores related to, “consistency of info from staff,” went from 45.8% in 2019 to only 25% in 2021. HCAHPS scores related to, “good understanding managing health,” fell from 65% in 2019 to 50% in 2021. These drops in

patient satisfaction scores have resulted in suboptimal HCAHPS scores and directly impact the hospital's ability to receive Medicare funding and reimbursement (Pressganey.com, 2021).

Literature Review

The core of the literature review process focused on determining evidence-based practice related to communication and the impact on patients, their families, and the nurses. An English-language search of a total of 17 articles was collected, utilizing databases including CINAHAL complete, Access Medicine, and PubMed. Research articles consisted of systematic reviews, qualitative research, quantitative research, and perspective studies. Tools for communication were explored for effective communication strategies, as well as to help guide the research of this project. Keywords used in the search include “communication,” “family participation,” “phone calls,” “daily updates,” “patient-centered,” “distractions,” “medication errors,” and “interruptions in care”.

Communication

Wittenberg et al. (2021) conducted a systematic review using UpToDate, CINAHL, PubMed, PsycINFO, and Web Science. English language-only articles were used between the dates of January-September 2020. Wittenburg et al. (2021) identified 89 sources for use in the survey and of those, 36 were related to provider communication resources, and 53 were peer-reviewed. Communication between provider and patient/family and the impact of isolation requirements, time limitations, and lack of family/partner access were the main objectives explored in the research. The authors' goal was to determine the content available related to provider family communication during COVID 19 restrictions. Wittenberg et al. (2021) concluded that current research is

lacking in the number of non-physician provider communication related to communication with families, and strategies for telehealth communication to promote family engagement.

Fang et al. (2020) used qualitative data analysis in their expert commentary to discuss the structure, implementation, and benefit of implementing an in-hospital telehealth system for patient-provider video communication. Fang et al. (2020) discussed the strengths and weaknesses of the proposal and provided a guide for setting up a telehealth solution that can be deployed in hospitals. The goals of the research consisted of an increase in staff communication and family communication. A comparative analysis was conducted on communication methods related to cost, device security, patient privacy, staff safety, useability, and administrative overhead. Video conferencing applications compared included FaceTime, Google Duo, Google Hangouts, Skype, and Zoom. Fang et al. (2020) ultimately decided FaceTime was the easiest to set up but required an IOS device that typically costs more than an Android option. Given FaceTime's single-use function for making calls, it proved to be the best option. FaceTime was the top choice in device security, patient privacy, and ease of between-patient maintenance. The researchers plan to use their findings to conduct a longitudinal study to validate the use of these tools in patients/families and provide communication.

Anderson et al. (2019) conducted a qualitative systematic review utilizing thematic synthesis. English-only, peer review articles were studied utilizing an electronic search of CINAHL, MEDLINE, PsycINFO, and EMBASE. Anderson et al. (2019) included 31 papers total for the purposes of the study. The aim of the review was to explore available evidence related to communication around the prognosis and end-of-life

care between healthcare professionals and relatives of patients approaching end-of-life. Key words searched in the study were communication, terminal care, palliative care, family, caregivers, and qualitative research. Anderson et al. (2019) uncovered seven themes during their research including highlighting deterioration, involvement in decision making, post-decision interactional work, tailoring, honesty and clarity, specific techniques for information delivery, and roles of different health care professionals. Anderson et al. (2019) concluded more training could give healthcare professionals the strategies they need to improve communication. Anderson et al. (2019) suggested more research is needed on communication with relatives in different settings and with different healthcare professionals.

Effective Tools for Communication

Back et al. (2020) in their expert commentary article, discussed the impact COVID-19 has had on exposing limitations in the medical capacity for providers to communicate with patients about serious illnesses. Back et al. (2020) believe that their three-fold method of just-in-time training tips, talking maps, and video demonstrations can improve communication skills amongst healthcare providers and patients/families. In the article, the authors use an approach based on three findings, “dealing with emotion is more important than giving lots of information,” “information is best delivered in small packets that start with a headline,” and “patient values should be at the heart of medical treatment plans.” Resources are free and available to anyone on the VitalTalk website. Back et al. (2020) present the use of the CALMER and SHARE talking maps to help drive communication between healthcare professionals and patients during times of crisis standards of care or surge states. Back et al. (2020) concluded that communication is only

one part of improving patient care that providers will need to work in a strained healthcare system, in the light of COVID 19.

Epstein et al. (2015) used a pre/post mixed methods approach to study the effects of daily Skype or FaceTime updates between providers and parents of patients in the neonatal intensive care unit (NICU). The intended outcome of the research was to improve patient-provider relationships. The parents of the identified NICU in the study received daily Skype or FaceTime updates for 5 days, where they were asked to complete demographic and feasibility surveys post communication. Twenty-six parents were included in the study and 15 participated and completed the surveys. Greater than 90% of providers and parents reported the intervention to be reliable and easy to use. Of participants, 80% rated the video quality and audio as good or excellent. Challenges reported by those surveyed were frozen screens and missed updates related to schedule conflicts. Research concluded significant favor for the use of the purposed intervention. Epstein et al. (2015) concluded that the use of Skype™ and FaceTime™ daily updates in the NICU setting proved to be a reliable and doable option when face-to-face interaction is not an option.

Rose et al. (2021) conducted a multi-center, cross-sectional, self-administered electronic survey that was sent to 217 United Kingdom hospitals, which each contained an intensive care unit (ICU). Rose et al. (2021) intended to identify the benefits and barriers of virtual visit strategies amongst the surveyed hospitals and the strategies hospitals were using to implement the practice. Rose et al. (2021) sought to understand how communication between families, patients, and the ICU team was enabled during the COVID pandemic. Results of the survey were localized to the UK and ICU settings. Of

the 217 hospitals sent a survey, 117 hospitals with 182 total ICUs responded with feedback. Of the participants, 100% of the hospitals reported imposing some form of visitor restrictions, and 16% imposed a zero-visitor policy; 63% of the hospitals permitted end-of-life visitation; 50% of the hospitals have a dedicated ICU family liaison team. Limitations in hospital virtual visitation provision were related to 23% of hospitals limiting participation to unconscious or sedated patients and 7% limiting to end-of-life patients. Benefits of virtual visits were: 78% saw a reduction in patient psychological distress, 68% saw an improvement in morale, and 47% saw reorientation of delirious patients. Rose et al. (2021) found barriers across hospitals to be insufficient staff time, rapid implementation of video conferencing technology, and family useability or access. Rose et al. (2021) concluded that virtual visits and a dedicated communications team were related to increased staff morale and patient recovery.

Lopez-Soto et al. (2021) conducted a retrospective, mixed-method analysis of a family liaison team formed by redeployed clinicians in critical care settings. The study was conducted in response to the issues created due to visitor limitations imposed in hospitals in the United Kingdom related to the COVID pandemic. The purpose of the study was to determine the impact on communication between the liaison team and patients' families and friends, with an emphasis on end-of-life care. The study was restricted to the UK and ICU settings. The liaison team consists of a majority of non-ICU staff. Liaisons were trained with two 1-hour webinars that taught basic communication skills. Lopez-Soto et al. (2021) reported that 12,000 video/telephone calls were completed with 172 patient families and friends. A majority of participants reported feeling "very" or "extremely" satisfied. Methods were considered by many of the

participants to be convenient, easy, understanding, honest, complete, and consistent in the information delivered. Lopez-Soto et al. (2021) reported that 5% of the participants viewed the updates as dissatisfactory. Lopez-Soto et al. (2021) discovered three themes, “being there with/for the patient,” “breakdown in communication,” and “disbelief at the speed of deterioration.” Lopez-Soto et al. (2021) concluded that a family liaison was both “feasible” and brought high levels of satisfaction. Lopez-Soto et al. (2021) concluded the need for consistent and straightforward information to reduce frustrations.

In a qualitative study by Kalocsai et al. (2018), it was concluded that patients believe nurses are vitally important in updating them on a level they can understand that the doctors may not be as able to provide. Kalocsai et al. (2018) discuss many family members that participated in rounds with the multidisciplinary teams felt overwhelmed and disconnected during the conversation. Utilizing the information gained from this study will be critical in understanding the communication necessary for patient family members and establishing a daily update template that will be understandable and important for families to find value.

Barriers Faced by Nurses on In-Patient Units

Starmer et al. (2017) conducted a prospective pre-post intervention study on a pediatric intensive care unit (PICU). The purpose of the study was to see if hand-off improvement programs for nurses can have a positive impact on error reduction in communication and prevent medical errors. The survey was conducted between 2011-2012 and restricted to a pediatric intensive care setting. Starmer et al. (2017) utilized the I-PASS method of reporting off between patient care. I-PASS stands for Illness severity, patient summary, action list, situation awareness, and synthesis by the receiver. The study

consisted of a three-part process involving educational training, verbal hand-off of I-PASS, and visual materials. Starmer et al. (2017) measured the quality of hand-off, frequency of interruption, and length of time needed to complete. The study resulted in a positive source of improvement related to communication. The results of the intervention resulted in a 30% increase in illness severity assessment, a 14% increase in patient summary, a 65% increase in to-do list, and a 39% increase in nurses given the opportunity to ask questions. Starmer et al. (2017) saw a 62% increase in hand-off elements after implementation and concluded the implementation of the I-PASS method was associated with improvement in verbal hand-off with no negative impact on nursing workflow. I-PASS may have the potential to prevent medical errors and improve patient safety (Starmer et al., 2017).

Westbrook et al. (2017) conducted a parallel eight-cluster randomized control study in a major teaching hospital in Australia. The purpose of the study was to determine if an intervention to prevent interruptions would result in few interruptions during medication administration. The study was conducted over 8 weeks and followed the medication administration practices of 227 nurses. The study was localized to a medical/surgical unit in Australia. Recorded interruptions were classified by the location of interruption, source of interruption, and types of interruptions. Observations occurred between the hours of 0730 and 2130. Nurses wore a red plastic disposable vest while administering medications, with 92.6% of nurses participating and wearing the vests while passing medications. Three sessions of education were offered over 3 weeks and were required of all nurses. At the completion of the study nurses involved were asked to complete a post-intervention survey. Westbrook et al. (2017) found that 87% of

interruptions were related to non-medication-related distractions before intervention. Westbrook et al. (2017) found a near 50% reduction of interruptions post-intervention. The greatest findings of the study were reasons for interruptions being questions about a patient, the greatest source of interruption being another nurse, and the most likely location for interruption being the bedside. A total of 88 nurses completed the survey and only 48% reported they would support the practice. The nurses cited their biggest hurdles as the vests being time-consuming, cumbersome, and hot. Westbrook et al. (2017) concluded the intervention showed promising results, but nursing buy-in proves to be a big barrier.

Impact on Nursing and Direct Patient Care

Au et al. (2019) used a cross-sectional 1-day point prevalence study to examine 14 adult intensive care units (ICU) in Canada. The ICUs offered open family visitation policies. Using a structured survey tool, nurses were asked to complete family point of care communication encounters, which were measured for 146 of 159 patients (92%) admitted to the study ICUs (Au et al., 2019). Au et al. (2019) determined that nurses provided 83% of supplemental communication to patients and their families and that a total of 22% of this communication was through phone and teleconference communication. Limitations of this study include that it was conducted in ICU settings, which may not be reflective of other units, and this was a descriptive study on communication practices, which did not collect data on the content or quality of communication, or family perception and comprehension outcomes.

Muzio et al. (2019) conducted a systematic review of articles utilizing an electronic database search of PubMed, Scopus, Cochrane, and CINAHL. English and

Italian language articles were analyzed between the years 1992 and 2017. Of the articles, 19 of 723 were reviewed for the purpose of this study. The purpose of this review was to determine a correlation between clinical risk management and medication errors, related to events affecting shift nurses. Muzio et al. (2019) concluded medication errors were most affected by stress, fatigue, increased workload, night shifts, nurse staff ratio, and workflow interruptions. Muzio et al. (2019) concluded ICUs and Emergency rooms accounted for the greatest amount of medication errors. In 36.4% of the cases, the workload was reported as a significant source of medication errors and the second leading cause of errors. Muzio et al. (2019) concluded further research and study are needed to identify measures to reduce medication errors.

Kollstedt et al. (2019) utilized a qualitative and quantitative study design method of electronic databases of PubMed and CINAHL between the years 2007-2018. The purpose of the review was to explore nurses' perception of distractions involving patient-centered care in the acute care hospital setting. Key terms searched for the articles included distractions, interruptions, medication errors, patient safety, healthcare, patients, and inpatients. A convince sample of 600 nurses was emailed an electronic survey, and 72 nurses completed the survey through SurveyMonkey. Emergency room nurses provided the greatest number of responses. Kollstedt et al. (2019) used a six-question survey with Likert-style responses. Kollstedt et al. (2019) reported survey responses: 87% of responders agreed, "there are numerous distractions that occur while nurses provided care to patients"; 82% agreed with the statement, "distractions sometimes make it difficult to focus on patients." Nurses rated staffing issues and telephone ringing as the greatest distractions encountered. The survey concluded with a second survey that was

sent to a unit that implemented a new practice and resulted in a 2% reduction in distractions related to phone calls. The study was limited by small sample sizes and limited practice areas represented.

Medland and Ferrans (1998) used a two-group, pretest-posttest quasi-experimental design to determine if a structured approach to family-centered communication would increase the satisfaction of care, meet information needs, and decrease the number of distractions to ICU nursing staff. The sample contained 30 family members of hospitalized ICU patients. There were 15 patients in the experimental group and 15 patients in the control group studied. The project had three components: a discussion to be conducted by a nurse within 24 hours of admission, an informational pamphlet, and a daily telephone call with updates. Medland and Ferrans (1998) concluded the interventions resulted in a significant reduction in the number of calls from family members requesting updates in the experimental group compared to the control study. Limitations of the study include a small sample size and a patient population that may not represent the public.

Perception of Need

Myhren et al. (2004) conducted a prospective study in the university-associated ICU setting. The intended goal of the study was to determine the similarities and differences in perception of need and experience between staff of the ICU and the patients and relatives that received care and updates. The study results are localized to the ICU setting and limited to other practice areas. The study consisted of 50 patients that survived a greater than 6-day stay in the ICU and the relatives of 18 patients that did not survive their stay. A mailed questionnaire was sent to the survivors, relatives of

nonsurvivors, and staff of the unit. The questionnaire consisted of a satisfaction-based 5-point scale (0-4), and 43 nurses responded to the questionnaire for a comparative study of answers. The study concluded staff perceived the patient's scores would be significantly lower than they were reported. Patients averaged a 3.4 average rating and nurses assumed a 2.9 as the average total. Myhren et al. (2004) concluded staff perception of experience and actual patient perception are not congruent. These findings indicate nurses underestimate the impact their interventions bring on patient satisfaction and further study is needed to determine the full nature of staff impact on patient experience.

Pecanac and King (2019) conducted a cross-sectional study to explore nurse-family communication during and after family meetings in the ICU setting. The study was conducted using conversation analysis and a qualitative method. Thirty-six family meetings were audio recorded in the ICU setting. The study was localized to two intensive care units in an urban community hospital. Pecanac and King (2019) discovered nurses spoke only 28% of the time during the meetings. The nurses often chose to provide short, clarifying, and reassuring answers to patient and family questions. The nurses often spoke secondly or in response to others during the meetings. After the meetings, the nurses offered to provide information clarification or empathy to the families but were often dismissed. Pecanac and King (2019) concluded nurses require empowerment to share their unique experiences as one way they can contribute to family communication. Pecanac and King (2019) identified needs in research surrounding nurse-family, and bedside interactions to improve the nurse's role as a patient advocate.

Verhaeghe et al. (2005) conducted a literature review of qualitative and quantitative studies to determine the needs and experiences of family members of an

ICU, to improve the experience. Special interest was paid to coma patients for the purposes of information gathering. The study divided needs into four categories: cognitive, emotional, social, and practical. The study concluded a central need of all families is the need to have, “room for hope.” Verhaeghe et al. (2005) concluded families would like a condition update from the physician on the prognosis of the patient and care, unit, and equipment use the update from the nurse. Verhaeghe et al. (2005) concluded families want an update at home with all patient condition changes, healthcare workers do not understand or meet the full scope of needs of family members of ICU patients, and healthcare workers do not do enough to meet these needs. Further study is needed to understand the full structure of family needs and how healthcare workers can meet these.

Needs Assessment

Target Population

The intended target population of this project was a 23-bed progressive care unit of a level 2 trauma center in a large urban setting in western North Carolina. For patients admitted to the pulmonary medical progressive care unit with family visitation restrictions, how does providing daily patient updates using a standardized report format at designated times to families, compared to no/inconsistent updates to families, affect HCAHPS scores within the next 3-month period? Direct observation by the project leader and the nurses that work on the unit of an increased number of family calls during medication passes and mealtimes drove the need for this project implementation. Patient satisfaction was directly reflected based on survey responses using HCAHPS scores.

Stakeholders

For this project, the intended stakeholders consisted of the patients and their families that received daily updates on the status and progress of the patients. They benefited directly through updates that kept them informed of their progress, answered their questions, and reduced fears related to uncertainties. The nurses of the pulmonary medical progressive care unit shared a role as stakeholders through improved processes, reduced distraction, and more time for direct patient care. The quality improvement team of the hospital shared in the benefits of this project through improved patient experience scores and better hospital reimbursement, and a human resources representative that will serve to aid in HIPPA compliance and patient rights protection. Future state holders can include individuals who wish to further the study and practice of this project.

Organizational Assessment

The organization is a level 2 trauma center in a large urban setting in western North Carolina and the chosen unit was pulmonary medical progressive care (PMPC). The organization's values are aligned with the intended outcomes of this project and include patient-centered care. The organization utilizes the acronym "MERIT," Mercy, Excellence, Respect, Integrity, and Teamwork, to signify their values (Our Mission & Values, n.d.). Much of the project depended on the availability and willingness of nurses to participate in family updates and utilize the intended methods set forth by this project. Families were informed of the times calls were placed but needed to be available and willing during the times outlined by the project. Nurses implemented a 4-point update tool to notify families of patient progress during their stay and signify any changes that may have occurred during the previous shift. Patient rights and privacy were always

maintained, and the organization utilized Cerner to signify if patients had designated themselves as “no updates” or “no visitor access”. A SWOT analysis of the unit within the organization is captured in Figure 1.

Figure 1

SWOT Analysis Tool

<p>Strengths</p> <ul style="list-style-type: none"> • Nurses are responsible for daily calls and patient updates • Minimal training needed • Daily staffing huddles • Hospital and project goals align 	<p>Weaknesses</p> <ul style="list-style-type: none"> • Project dependent on staff workflow • Short staffing • Multiple families wanting a daily update • Staff buy-in is needed for success
<p>Opportunities</p> <ul style="list-style-type: none"> • Education to staff • Earlier discharges • Informed families • Improved HCAPP scores 	<p>Threats</p> <ul style="list-style-type: none"> • Families’ availability matching nurse’s availability • Confidentiality breaches • HIPPA compliance • Staff compliance

Available Resources Assessment

Daily phone calls to family members are an essential and routine process of the nursing staff at the hospital where the project was conducted. Issues surrounding inconsistencies were related to staffing and nurse availability and a current lack of consistency with the information provided to family members. Daily training of new processes and education are discussed in the staff unit morning and evening safety huddles. The hospital utilizes email that all staff has access to during their shift. Printing and the cost of paper are included in the daily operations costs of each unit. Each patient room and nurses’ station contain a phone. Nurses are provided a hospital-issued iPhone that can make calls both internally and externally of the hospital. Nurses have access to the patient’s charts, both electronic and physical, and contact information for their family

members. Nurses can place calls directly from the unit and utilize the information directly from contact with the patients, a report from the off-going nurse, communication with the physician, and the patient's chart to summarize daily updates that are provided to the families during the designated time frames.

The designated hospital for the scope of this project participates in value-based purchasing by utilizing the Hospital Consumer Assessment of Healthcare Providers and Systems (HCAHPS) survey. HCAHPS scores are a nationally standardized publicly reported survey of patient perspectives during their hospital stay (Tevis et al., 2015). The Centers for Medicare and Medicaid Services website publishes survey results for potential patients to utilize when choosing a hospital to receive care. With this knowledge, patients can “shop around” for a hospital with better services and a higher rating. Hospitals that receive reimbursement for Medicare stand to gain approximately 2% monetary reimbursement for participating in the HCAHPS surveys (Centers for Medicaid and Medicare Services, 2021b). Negative HCAHPS scores impact a hospital in two ways: it limits the number of patients that will seek service and negatively impacts the amount of funding they receive from Medicare. In 2022, hospital reimbursement from HCAHPS scores using value-based purchasing stand to receive a 3% reimbursement in Medicare services (Centers for Medicaid and Medicare Services, 2021a).

Desired and Expected Outcomes

The desired outcomes of this project were a direct reduction of the phone calls received during the 9:00-10:00 am and 9:00-10:00 pm time frames where nurses are actively passing patient medications and participating in direct patient care. The project intended to isolate patient/family updates to time periods in the day that would not take

away direct care from the patients, but still allow families to receive daily updates. The desired outcome of the project was to improve patient care directly and indirectly. The nurses had available time between 10:00-11:30 am and 7:00-8:30 pm to provide updates to families. Nurses utilized a standardized update format for each family update call that included information about oxygen requirement, any lines/tubes/Foleys/or restraints in place, changes since the last update, and a plan for the shift. Patients and their families will report more satisfaction and fewer frustrations related to inconsistency and confusion surrounding the care and progress of the patients.

Team Selection

The team consisted of the project leader who volunteered 5 hours per week to dedicate to project implementation and received no extra compensation for outcomes. The project partners were the unit co-manager and unit director. The project leader partnered with the Vice President of patient experience to help guide project success. The nursing unit supervisor team assisted in making sure staff were free during the designated times for phone calls to families. Attempts were made to designate one dayshift and one nightshift project champion to help drive the project's success. The project faculty representative served in a guiding role with periodic email and teleconference communication to monitor progress. The nurses were consulted and monitored for process implementation and feedback during daily huddles. The nursing unit supervisor team met monthly with the project leader to determine the success of the project and modifications that would be needed with workflow.

Cost-Benefit Analysis

The incurred cost was not more than the costs of daily operations at the hospital and operationally expensive. Nurses were not paid more than daily shift pay related to a 36-hour work week. The project leader was not paid more than the normal weekly assignment of 40 hours per week. The project lead conducted all rounding and data analysis with daily activities as was already current practice for the unit manager of the floor. Nurses continued to be responsible for daily family updates, and minimal training and direction were needed to implement the planned project. Education consisted of a 30-minute education session informing of the new process and benefits that the project was hoping to achieve. It was the role of the nurses to call the patients during the designated time frames determined by the scope of this project. Each nurse was already provided with phones on the units, in patient rooms, and in the form of a personal hospital-provided iPhone that is included with their assignment. Nursing salary ranges from \$24-\$48 per hour at the hospital and a total of 53 nurses work for the unit. Estimated education costs to the hospital were approximately \$331.25-\$636.00 for the training necessary to begin the project. HCAHPS scores are directly related to reimbursement through the Medicare system. The hospital stands to gain a monetary reimbursement of up to 3% for an improvement in HCAHPS over the next quarter (Centers for Medicaid and Medicare Services, 2021a).

Scope of the Project

This project aimed to improve patient care within one unit of the hospital, with the intended outcome of a 20% increase in HCAHPS scores utilizing the Press Ganey reporting method related to, “good understanding managing health,” consistency of info

from staff,” and “nurses explain in a way you understand”. The objectives of the project were for family members to receive daily updates and feel a decreased need to call during the shift for follow-up conversations. The project anticipated nurses would report a positive impact on their daily workflow and more time for direct patient care, as evidenced by post-intervention survey feedback. The project intended to return time to nurses for direct patient care. Improvements were intended to begin immediately and problems during the quality improvement initiative would be assessed through the responses of the HCAHPS scores that would be evaluated after one full quarter of responses, or 3 months. Responses would be evaluated immediately post-intervention to determine the change impact on scores. Barriers may include nursing satisfaction around workflow change perception and perceptions of increased workload. Staffing shortages and decreased ancillary staff may have led to less time for the nurses to contact families. Communication with staff would occur twice daily in unit huddles to address concerns and help to guide the project as it progresses. This project did not intend to change current practice or increase nursing workflow. The scope of this project was not intended to change the way that care is delivered or addressed to patients in the hospital. The project was anticipated to increase patient satisfaction through standardized daily updates as evidenced by an increase in patient satisfaction scores over a 3-month period.

Goals and Mission Statement

Goals of Project

The goal of this project was to improve patient care, communication with families, and patient satisfaction, which align with the values and mission of the hospital where the project would be implemented. Patients isolated in the chosen progressive care

unit were identified as having visitor restrictions, being more susceptible to a breakdown in communication, and for a decrease in patient satisfaction related to changing processes. The daily family updates were intended to treat the whole patient and focus on what was most important to them and their families during their stay. A standardized process of updating families would help to assure that practices are consistent and reduce opportunities for communication to be lost. Patient families would show satisfaction with updates, and nurses will report if additional information is needed to satisfy families' inquiries. Upon discharge, patients would complete a phone call survey provided through Press Ganey services within 2-42 days after discharge, which is standard hospital practice (Figure 2).

Figure 2

Goals and Objectives

Goals
<ul style="list-style-type: none"> • Patients and families will receive daily updates • Increased potential cost savings for Hospital through Medicaid/Medicare reimbursement • Improved patient and family satisfaction • Improvement in HCAHPS scores • Daily update process consistency • Potential utilization on other units in the hospital • Nurses practicing in caring, compassionate, and whole-person approach
Process Objectives
<ul style="list-style-type: none"> • Patients who are able will designate one family member to receive daily updates upon admission to the unit and the family member's information will be listed in the patient's electronic medical record and placed in the front of their patient chart at the nurse's station, to be utilized for the duration of their stay on the unit. • Nurses will call families for 5–10-minute blocks per patient each shift to update designated families utilizing a daily process update template, to include oxygen trending, events over the previous shift, any new lines, tubes, or procedures, and the plan for the shift ahead. The nurses of the stepdown progressive care unit will attempt to leave messages that a call was made when they receive no answer from family members.

- Two 15-minute educational sessions will be offered in the morning and evenings at 6:45 during morning and evening safety huddles for 2 weeks to cover all nursing staff working full-time, part-time, and PRN status to provide education about the process. Evidence of education will be recorded and monitored utilizing an attestation log that each nurse participating will sign.
- Nurses of pulmonary progressive care will have 2 weeks, post-intervention, to complete a voluntary evaluation survey through email, utilizing Qualtrics, to determine the level of satisfaction with the new process.

Outcome Objectives

- Patient-designated family members of the chosen pulmonary progressive care unit will receive standardized daily updates using a 4-point template to improve communication and patient satisfaction as evidenced by a 20% increase in HCAHPS scores over a 3-month period.
- A minimum of 50% of the 53 nurses of the pulmonary progressive care unit will submit a voluntary evaluation survey through email, utilizing Qualtrics, to determine the level of satisfaction with the new process and rate the project as moderately effective to extremely effective.

Mission Statement

The mission of the hospital designated for the scope of this project was, “above all else, we are committed to the care and improvement of human life” (Our Mission and Values, n.d.) This project aimed to embrace the values of the organization by enhancing communication between the nurse, the patients, and the patients’ families, and to improve the quality of direct patient care, through a patient-centered communication strategy, utilizing daily updates to capture what is most important to hospitalized acute care patients and their families.

Theoretical Underpinning

Patients of the pulmonary progressive care unit were all determined to be COVID-19 positive before arrival to the unit in the prior quarter before visitor restrictions changed in December of 2021. These patients were placed on strict contact and airborne isolation, and all visitation was withheld unless their prognosis became guarded. Doors

always remained closed unless entering or exiting the rooms. The nurses, nursing aids, and doctors became the communicators for the patient from the moment the patient entered the hospital and were willing to advocate on their behalf in the lack of family presence. The patient's perception of the hospital became what they would see from the inside of their rooms or a short trip to a test or procedure, and the interactions they had with each healthcare provider that entered their room. Time with the patients was often minimized to reduce the chance of exposure to healthcare workers. Although there were many attempts to facilitate communication via iPads and phone calls between patients and their families, there were often barriers related to time constraints and patients' participation ability. The nurse inherently became the bridging factor between the patients and their families throughout the hospitalization. Nurses became the eyes and ears for the physician and the patient's family.

Jean Watson's Theory of Human Caring

For this project, Jean Watson's theory of human caring was chosen to steer and guide the course of this process improvement project. Jean Watson's human caring model theorizes that nursing practice, knowledge, and values focus on the patient's own healing process and personal experiences (Zaccagnini & Pechacek, 2021). Jean Watson founded her theory around her concept of a transpersonal caring relationship in which one caring individual "connects" and "embraces" another through a spiritual connection that is authentic while focusing full attention on the "here and now" of the "inner life" and "personal meaning" of another (Sitzman & Watson, 2018). Watson's model transcends traditional western concepts of curative focus nursing care and expands this concept to

also include caring, healing, and wholeness (Sitzman & Watson, 2018). Jean Watson's model has her 10 Caritas processes as a foundational platform. The 10 Caritas include:

1. Sustaining humanistic– altruistic values by the practice of loving-kindness, compassion, and equanimity with self/others.
2. Being authentically present, enabling faith/hope/belief system; honoring subjective inner, life-world of self/others.
3. Being sensitive to self and others by cultivating own spiritual practices; beyond ego-self to transpersonal presence.
4. Developing and sustaining loving, trusting– caring relationships.
5. Allowing for the expression of positive and negative feelings— authentically listening to another person's story.
6. Creatively problem-solving- “solution-seeking” through the caring process; full use of self and artistry of caring– healing practices via the use of all ways of knowing/being/doing/becoming.
7. Engaging in transpersonal teaching and learning within the context of a caring relationship; staying within others' frame of reference— shift toward a coaching model for expanded health/wellness.
8. Creating a healing environment at all levels; a subtle environment for an energetic authentic caring presence.
9. Reverentially assisting with basic needs as sacred acts, touching the mind/body/spirit of others; sustaining human dignity.
10. Opening to spiritual, mystery, and unknowns— allowing for miracles (Sitzman & Watson, 2018, p. 21-22).

Sitzman and Watson (2018) explain that the 10-Caritas defined above by Watson are essential in guiding nurses to practice caring moments and caring occasions in their practice. Watson describes her transpersonal model as a pond that represents everyday life and the nurse as a pebble tossed into the pond of life; the nurse creates ripples of influence that go forth from and impact self, others, peers, leaders, local/world communities, the environment, virtual/web-based, and beyond (Sitzman & Watson, 2018).

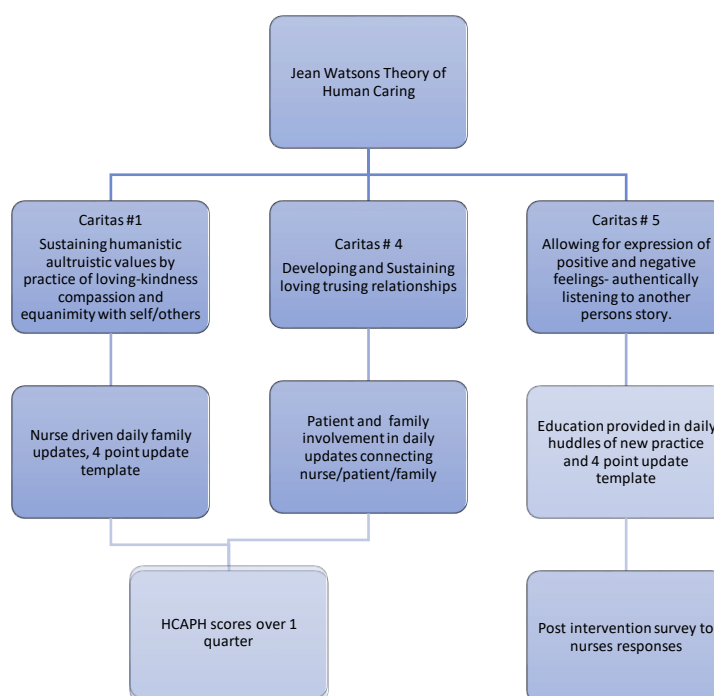
Watson's Theory in Practice on the Nursing Unit

The nurses of the pulmonary progressive care unit in which the project took place have been tasked with the direct care of isolated COVID-19-positive patients that have limited access to their families. By implementing the key concepts outlined by Jean Watson in her theory of human caring, the nurses can care for the patients in a mind-body and soul approach. This project specifically incorporates Jean Watson's first, fourth, and fifth Caritas processes into active practice to help with nursing care and delivery. Through authentic action and active presence, the nurses of the identified unit can share a connection with their patients, understanding that care goes beyond just their patients' physical needs and must consider the mind, body, and soul. Through daily updates with family members, the nurses can provide a transpersonal connection with their patients, understanding that the family is an integral part of the healing process. Just as the "pebble" in the pond that Watson describes, the nurse can ripple their influence on their patients, their families, and their communities (Sitzman & Watson, 2018). This project was intended to promote physical and mental flourishing for the patients on the unit. The nurses addressed a deeper aspect of the patient's health care journey that included

emotional care and incorporation of the family as it relates to patient care. Scores related to HCAHPS that specifically address the patient's perception of care received were used to determine the effectiveness of the intervention. The nurses' experience incorporated Watson's fifth Caritas, which allows for the expression of positive and negative feelings. Through a post-intervention survey utilizing Qualtrics, the nurses of the unit were encouraged to share their experiences and opinions of the intervention (Figure 3).

Figure 3

Conceptual-Theoretical-Empirical (CTE) Diagram



Project Planning

For the control and monitoring of this project, a GANTT chart (Figure 4) and Work Breakdown Structure (Figure 5) were designed. The project revisions and oversight were conducted by the project faculty representative appointed to the project leader. Revisions were discussed and implemented through emails and virtual calls. Additional research

and project planning were conducted to provide project clarity before submitting for final approvals.

Figure 4

GANTT Chart Showing Project Timeline

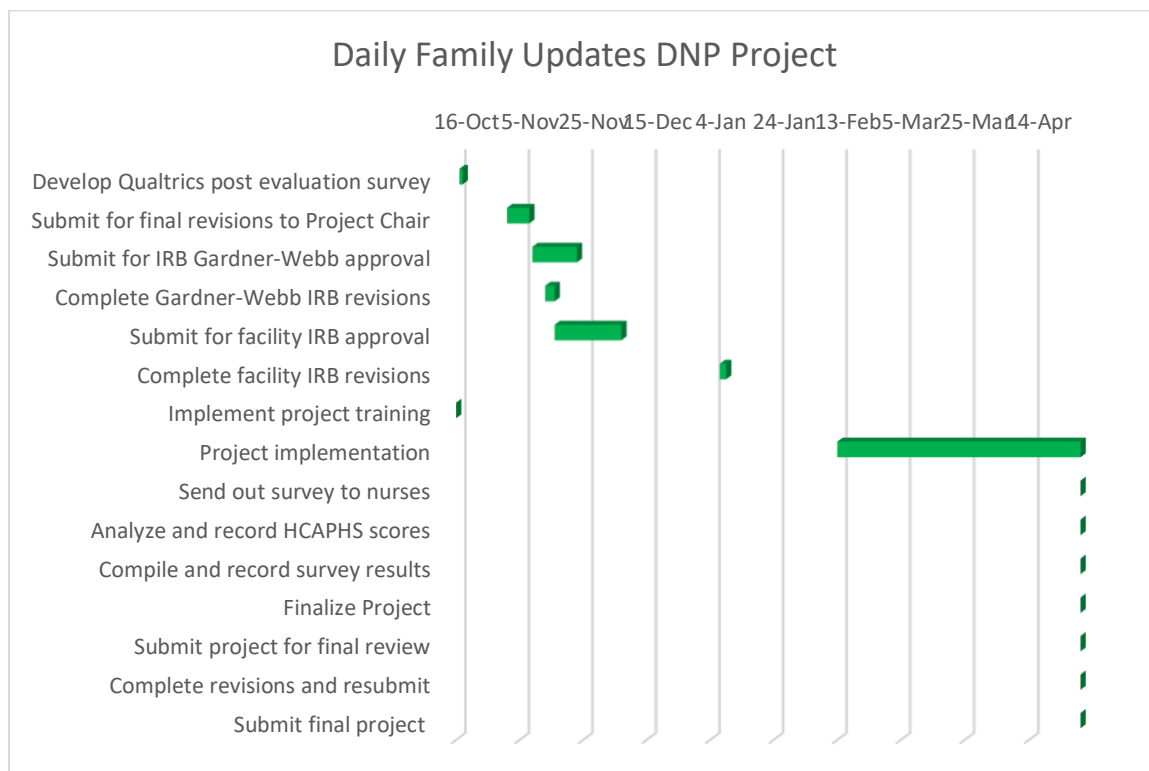
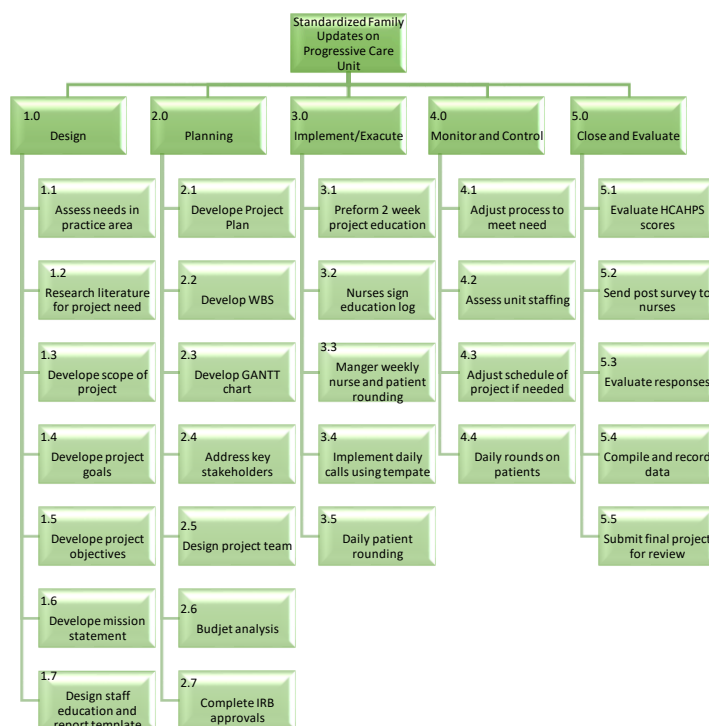


Figure 5*Work Breakdown Structure for Project Management***Budget**

In preparation for project implementation, an extensive analysis of project costs and savings to the organization was conducted by the project leader, to determine the financial input and outcomes potential of this process improvement initiative. Primary costs to the facility were incorporated into currently occurring morning and evening huddles and incurred no additional cost, except as defined below in the form of time as represented by average nursing pay scales and represented below (Figure 6). Email is provided to each nurse through the facility and can be checked throughout the day as desired. Nurses are encouraged to check emails at least weekly during shifts to assess for new education and updates. Patient information is stored electronically utilizing Cerner charting system utilized by the organization. Phone and electrical usage are included in

normal daily operations. Current practice on the unit recommends daily updates to family or patients and is part of normal daily operations.

Figure 6

Cost Breakdown for Facility

Cost Categories	Cost of personnel and non-personnel resources		Total Cost in Dollars
	Resource	Details	
Direct labor cost	Nurses	15 min education for 53 nurses @ approx. \$25 per hour Bottom of pay band	\$331.25
		15 min education for 53 nurses @ approx. \$48 per hour Top of pay band	\$636
Indirect labor cost	Email	Calculated in daily operations	\$0
	Phone	Calculated in daily operations	\$0
	Electronic PHI	Cerner charting system, included in operations	\$0
	Internet access	Calculated in daily operations	\$0
		Total	\$331.25- \$636.00

Evaluation Method

Patients of the pulmonary medical progressive care unit were issued a telephone hospital evaluation survey post hospital discharge as a standard practice of the facility.

Survey results were compiled and displayed for unit management review with comments and scores related to the patient interpretation of care received while on the unit. Survey results (HCAHPS) were obtained and displayed utilizing the Press Ganey consumer experience platform. Press Ganey results help indicate the level of impact on patient satisfaction related to the project implementation. Scores were evaluated at the end of the 3-month project implementation phase. A post-intervention survey was emailed to the nursing staff of the pulmonary medical progressive care unit after the 3-month implementation phase ended, to determine the perceived level of impact and project satisfaction on nursing related to the daily update process. The nursing staff of the unit would have 2 weeks to complete and submit their feedback to allow for all nursing staff to have an opportunity to respond. After 1 week, a reminder was sent out to all staff to encourage responses. Reminders were also discussed daily in shift huddles during the 2-week period. Results of the survey were compiled and recorded after the 2-week period ended

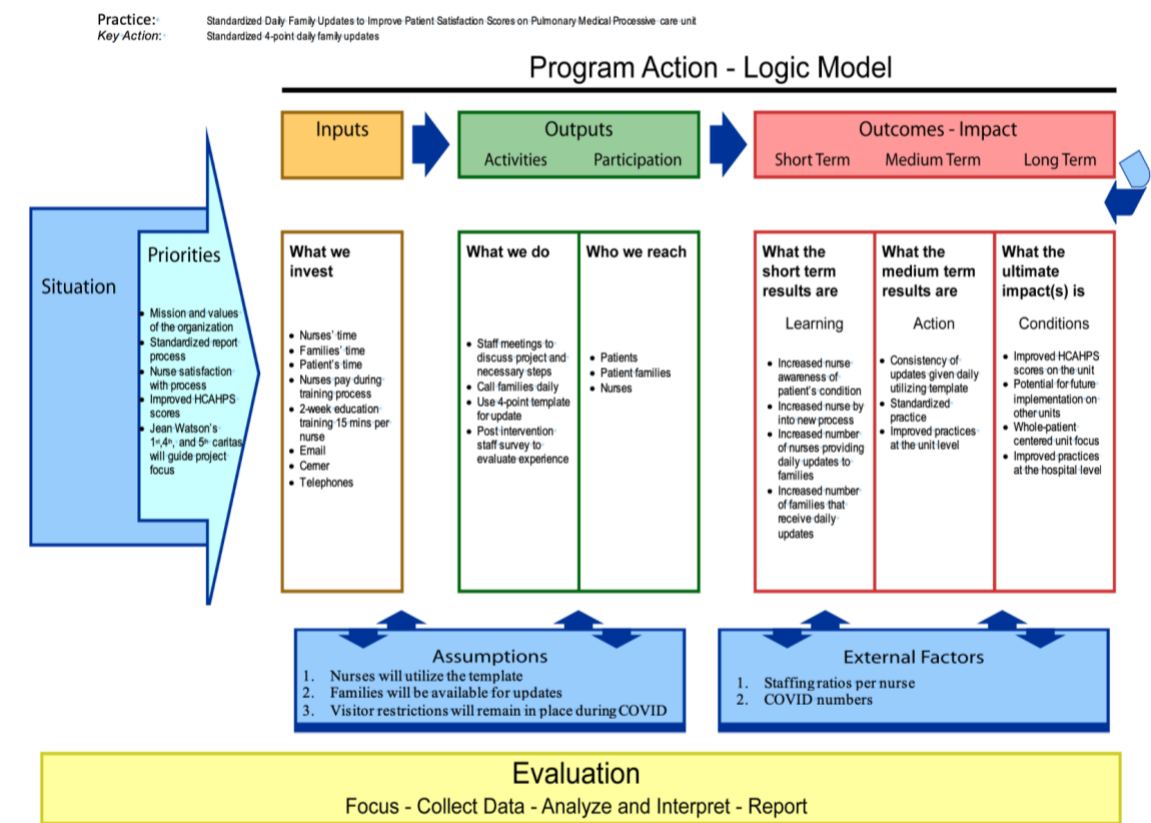
Logic Model

Evaluation of the progress and overview of expected outcomes are displayed below using a logic model (Figure 7). The logic model provides a visual representation of the forward, backward, and lateral flow of project input and expected output related to standardized daily reports using a 4-point update template. Outcome results are displayed as short, medium, and long-term impacts related to project success and implementation. Steps of the model were subject to change related to identified needs during the implementation phase of the project and may have been influenced by external factors as

displayed below. The logic model helped to organize and focus the steps of the project to maintain a timely and efficient result.

Figure 7

Logic Model



Implementation

To improve quality and consistency in communication and patient experience, project approval of a standardized daily family update template (Appendix) on a pulmonary medical progressive care unit was requested through the combined approvals of the university's Institutional Review Board and the project site's Hospital Research Institutional Review Board. Project oversight and guidance were provided through the research team and DNP practice partners of the project site hospital. Oversight and direction of the project were provided by the DNP project leader and leadership of the

Pulmonary Medical Progressive Care Unit. The project was determined to meet quality improvement standards by the university's Institutional Review Board. In addition, the project site hospital's Institutional Review Board determined the project met quality improvement criteria and a full IRB approval was deemed to be unnecessary for project implementation. Approval to begin the quality improvement project was granted.

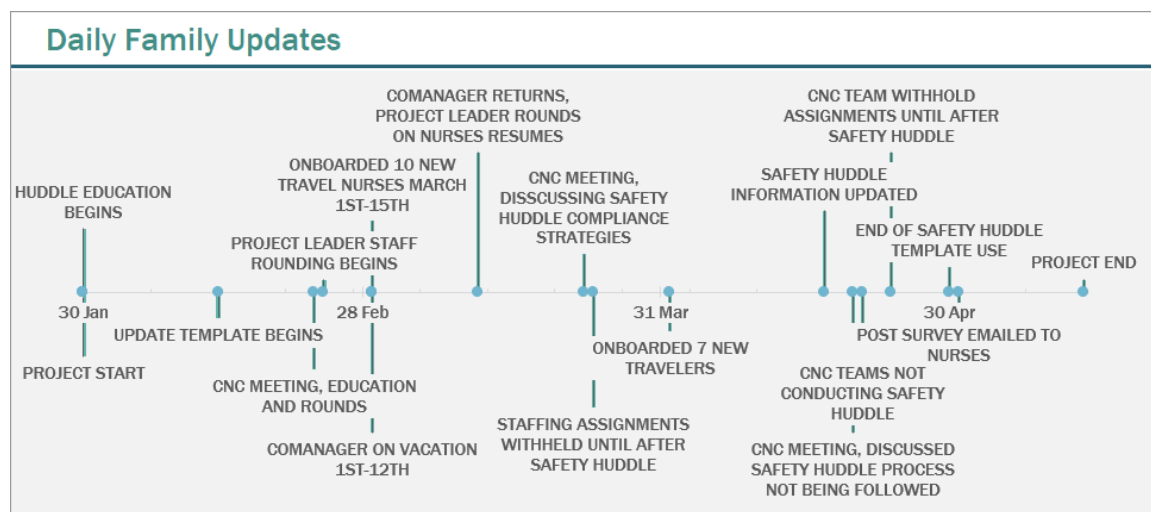
The project began 2 weeks following written approvals of the university and hospital's IRB teams. The nurses of the unit were informed through hospital email of project approvals and the planned implementation date. The email detailed the intent and scope of the quality improvement project. Education was provided to nursing staff twice daily in nursing unit huddles, starting Sunday, 14 days after project approval was received. Education continued for 14 days, and the daily family update template was distributed to nursing staff, beginning the first month of the project. The update template utilization phase of the project continued for 12 weeks and was then concluded. On the Sunday of the project conclusion, an email was sent out to the nursing staff of the unit explaining that the project had concluded, and a voluntary post-intervention survey was made available. The email contained a link to a survey that remained open for 14 days.

Threats and Barriers

The quality improvement project encountered several threats and barriers during the implementation phase. A timeline (Figure 8) of events was created by the project leader to capture barriers and the implementation of interventions to address the threat and progress the project forward. The DNP project leader, as the unit manager, had access to the nursing staff and education, and project updates were provided daily in nursing unit rounds. The initial threat encountered by the project resulted in the shift in

the patient population of the progressive care unit and a change in family visitation restrictions. The state of North Carolina passed Senate Bill 191, also known as “The No Patient Left Alone Act” in the fall of 2021 (S.B. 191, 2021). The Pulmonary Progressive Care Unit shifted to completely Covid-positive patients in the winter of 2021, and cohorts of Covid-positive patients were restricted to the progressive care unit and the Medical Surgical Intensive Care Unit of the hospital. Prior to the passing of Senate Bill 191, Covid-positive patients were allowed no visitation by families unless it was approved by an associate chief nursing officer of the hospital, or patients were imminently dying. With this change, visitors of Covid-positive patients began to report to the hospital and were required to wear masks throughout the hospital and personal protective equipment while in the patient’s room. The unit faced daily service recovery concerns related to visitors that refused to follow hospital protective equipment guidelines, which required increased attention and time by the unit managers. With an increase in patient visitation, family updates began to take place at the bedside more frequently. Nurses of the unit expressed concerns about the limitations of the daily update template related to bedside updates. The project leader and unit supervisors educated staff in unit huddles to write “updated at the bedside” on the form under the “call outcome” box of the updated template. The project leader collected the unit templates daily and monitored utilization and receipt of forms. The project leader originally intended to upload the forms as they were received daily, but this did not occur due to time constraints. The project leader noted a sharp decline in forms being completed around week 3 of the project and it was determined that staff were not attending safety huddles as required by the hospital. To increase safety huddle participation, patient assignments were withheld until nurses attended the safety

huddle. The unit saw a dramatic increase in safety huddle participation. Utilization of the updated template and staff understanding of the process increased because of the intervention. Staffing ratios of the unit related to hospital nursing staff attrition resulted in higher than intended patient-to-staff ratios and decreased the time that nurses had to provide daily updates. An increase in travel nurses working 8–13-week assignments exacerbated turnover of staff and required continuing education on project implementation, processes, and intent by unit supervisors and the project leader. Lack of staff willingness to participate and the perception of an increased workload proved to be a threat during the full course of the project. Travel nurses continued to onboard and leave to pursue other contracts during the project. Stacks of daily family update templates were placed by each phone to aid as a reminder to complete the form and provide ease of access to the template. The nursing unit supervisor directed the project leader to round on hospital staff to remind them to complete the form throughout the day. The nursing assistants collected forms that had been left around the unit and turned them in to the manager at the end of the shift. The post-intervention survey received a small response rate and may not have accurately represented the overall perception of the nursing staff of the unit. The hospital released two additional surveys during the post-intervention survey phase that may have contributed to lower-than-expected response rates.

Figure 8*Timeline of Events***Monitoring of Implementation**

The project continued to progress despite the threats and barriers faced. Project implementation was directly observed and monitored by the nursing unit manager, who also served as the project leader. The nursing unit supervisors reported concerns and staff questions directly to the project leader throughout the implementation phase. Utilizing the timeline, the project manager, recorded events that occurred during the implementation of the project. Three total nursing unit supervisor meetings occurred, each meeting on the third Wednesday of each month, which allowed the project leader to meet with all the supervisors to discuss progress and problem solve to increase and maintain compliance with the template. The project leader conducted rounds daily on patients as required by the hospital as normal operations and allowed time to discuss the process and questions with patients. Positive feedback was noted during daily rounds related to the use of the daily family update template during patient rounds. Patients reported satisfaction with their nurses and the care that they were receiving. The project leader conducted daily

rounds on the unit staff to discuss the use of the daily update template and answer questions related to the use of the template.

Project Closure

The Daily Family Update form use concluded after a full 12 weeks after implementation began, representing a full quarter and 3-month period. The project leader uploaded the collected paper form into the electronic format template. On the Sunday following the conclusion of the template use, an email to staff informing them of the project conclusion and a link to a voluntary post-intervention survey were distributed by the project leader. The survey consisted of 12 questions, the first three indicating years of service as a nurse and length of service on the unit, and the following nine questions utilizing a combination of Likert-style questions and open dialog responses to indicate satisfaction levels with the updated template and feedback received from patients and families. The post-intervention survey received a total of eight responses from the 13 total full-time nurses, 10 PRN nurses, and 25 current working travel nurses, all with varying start dates. The post-intervention survey remained available to staff for 14 days and closed with the final project closure. The hospital research team and project faculty representative were notified of project completion. A meeting was conducted with the research team of the hospital to review the results of data collection.

Interpretation of Data

The intended project goals for the creation and implementation of a standard Daily Family Update form on a progressive care unit were to seek improvement in patient care, communication with families, and patient satisfaction scores, in alignment with the values and mission of the hospital where the project was implemented. Data were

analyzed based on the perception of impact, determined by responses of the nurses implementing the Daily Family Update form and the patients that completed a post-hospital satisfaction survey (HCAHPS) through Press Ganey™.

Patient Care Improvements

Initially, the project intended to improve patient care by utilizing the foundational elements of Jean Watson's theory of human caring, specifically her first¹, fourth², and fifth³ Caritas. The project aimed to improve patient care through authentic action and active presence, allowing the nurses to connect on a deeper level with their patients beyond their physical needs and incorporating all elements of the patient's mind, body, and soul. The project intended to promote physical and mental flourishing as an improvement in patient care, evidenced by including the patients' emotional needs as they relate to family relationships and bonds. Lastly, the project intended to allow the expression of positive and negative feelings through authentic listening. The project lacked a process or model to record the impact the daily family updates had on patient care improvement. Without a feedback tool related to the patients' perception of improvement, the project failed to demonstrate outcomes of patient care improvement and relied on feedback obtained from the post-intervention survey delivered to the nurses and feedback received as normal daily operations but not recorded, by the project leader, during daily patient rounds. Results of this translational implementation project showed no improvement in inpatient care.

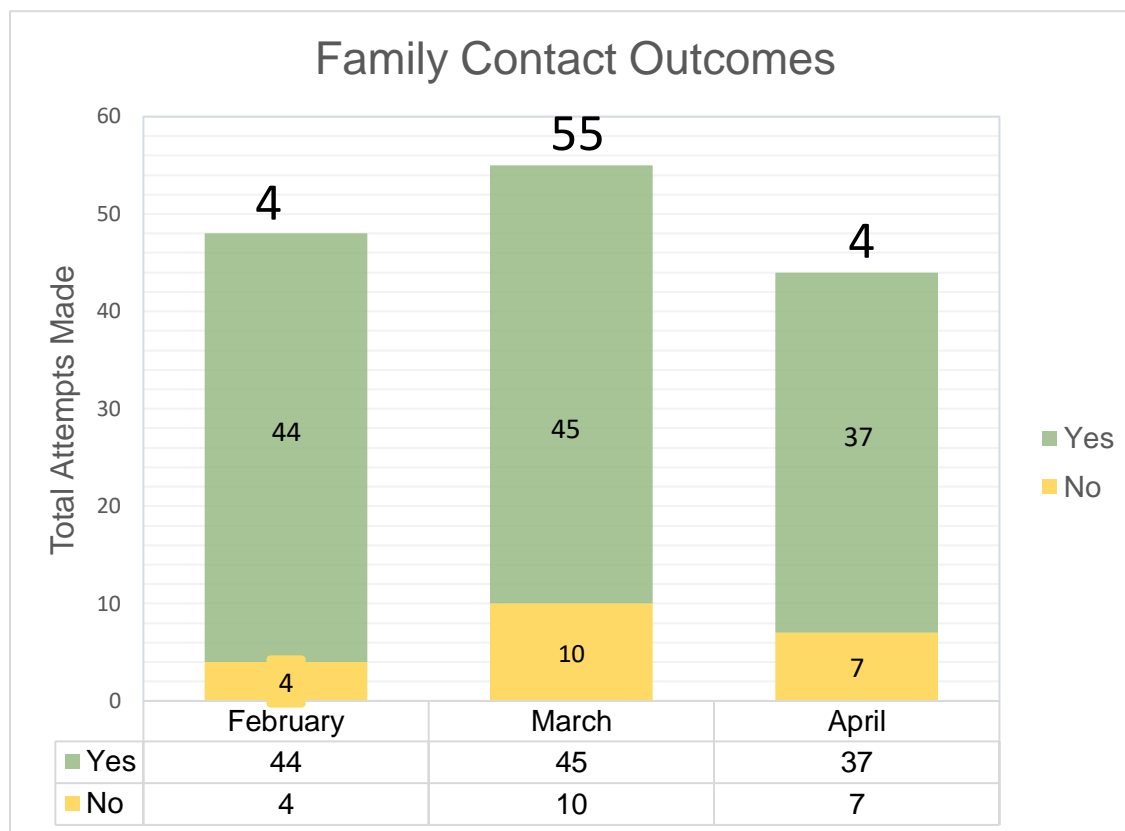
¹ "First Caritas - Sustaining humanistic–altruistic values by practice of loving kindness, compassion, and equanimity with self/others miracles" (Sitzman & Watson, 2018, p. 21-22).

² "Fourth Caritas - Developing and sustaining loving, trusting–caring relationships miracles" (Sitzman & Watson, 2018, p. 21-22).

³ "Fifth Caritas - Allowing for expression of positive and negative feelings—authentically listening to another person's story miracles" (Sitzman & Watson, 2018, p. 21-22).

Communication Improvements

Moreover, the project intended to improve communication with families measured by responses to the Daily Family Update form and post-survey responses of nursing staff that directly utilized the template. The project recorded a total of 147 returned Daily Family Update forms (Figure 9) for data collection purposes over the 3-month project period, with 48 total responses recorded for February, 55 total responses for March, and 44 responses recorded for April. Returned forms indicated the Daily Family Update form was utilized during the nurse's shift. Of the 147 forms returned, 126 forms recorded "Yes" an attempt to reach the family were made, equal to approximately 86% of the total number of responses received. Twenty-one forms recorded "No" that a family member was not reached when an update attempt was made, equal to approximately 14% of total calls made. An average of 49 attempts were made to update families utilizing the template over the 3-month active phase of the project. Results indicate a greater incidence of "Yes," in the total number of times contact was made with families of the patients of Pulmonary Medical Progressive Care.

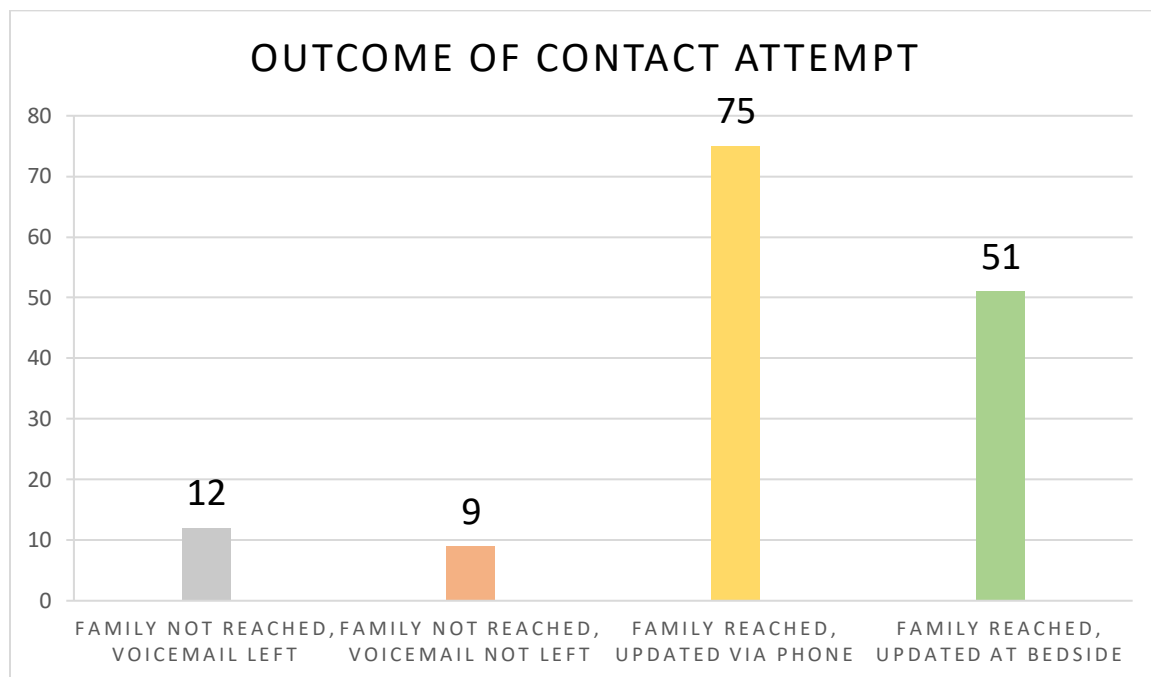
Figure 9*Family Contact Outcomes***Contact Categories**

Contact attempts made were categorized into four outcomes to aid with data comprehension and clarity (Figure 10). Contact outcomes were recorded as “family members not reached, voicemail left,” “family not reached, voicemail not left,” “family reached, updated via phone,” and “family reached, updated at the bedside.” Of the 147 attempts made to contact families, 12 forms indicated, “family not reached, voicemail left, approximately 8% of the total attempts; 9 forms indicated, “family not reached, voicemail not left, approximately 6% of total attempts; 75 forms indicated family reached, updated via phone, approximately 51% of total attempts; 51 forms indicated “family reached, updated at the bedside, approximately 35% of total attempts made to

contact families. The project helped to identify family updates via phone as the greatest mode of communication, followed closely by family updates at the bedside.

Figure 10

Outcome Categories of Contact Attempts



Post-Intervention Survey Response Demographics

The post-intervention feedback survey was emailed to the nursing staff of the unit and left open for 2 weeks to receive responses. A total of eight nurses completed the survey. At the time the survey was implemented, the nursing unit consisted of 23 core staff nurses, with 13 working full time, and 10 working PRN hours. The unit consisted of 25 travel nurses that had varying start dates throughout the project. Of the eight nurses that completed the post-intervention survey, years of experience ranged from 4-29 years, and years of service on the unit ranged from 0-20, indicating a mix of both travel and core staff nurses who completed the survey.

Total Response Rates of Post-Survey

The project intended to capture a 50% response rate of nurses utilizing the form to represent a more accurate reflection of nursing perception. Surveys were both anonymous and optional for the nursing staff, with no risk or benefit for completion. Results represented approximately 17% of nursing staff that utilized the template and failed to meet the intended 50% response rate. Implementations for future projects would need to seek alternative ways to increase post-survey response rates. Of the eight nurses that completed the post-intervention feedback survey, all eight nurses responded favorably with overall satisfaction with the Daily Family Update form. Of the respondents, four rated their overall satisfaction level with the use of the Daily Family Update form as “Very satisfied” and four nurses chose “Somewhat satisfied.” Results suggest an overall positive response to the utilization of the form (Table 1).

Table 1

Overall, How Satisfied Are You With The New Daily Family Update Form?

Satisfaction	Frequency
Very Satisfied	4
Somewhat satisfied	4
Neither satisfied nor dissatisfied	0
Somewhat dissatisfied	0
Very dissatisfied	0

Nurse Response Feedback on Update Form

Nurses' responses indicated aspects of the form that worked well in responses that included, "placing them [the forms] next to every phone on the unit," "giving specific topics to cover during family conversations," and "being able to have a template on what to discuss with family members." Nursing responses indicated aspects of the form that needed improvement with responses that included, "having specific options regarding how contact was made, either by phone or in-person," "adding a section on how family responded," and "A lot of the family updates tend to be family driven (in terms of what they want to hear about) maybe more space for jotting in a few topics not covered on the sheet, or tic boxes that you could tic off topics covered."

Patient Satisfaction Score Improvements

In addition, the project intended to improve patient satisfaction scores (HCAHPS scores) by 20% over a 3-month implementation related to quality indicators, "nurses explained in a way you understand," "consistency of info from staff," and "good understanding of managing health." Satisfaction score results were unique to the PMPC unit and represented changes in scores directly related to the patient's care by the nursing staff. Overall hospital scores were inclusive of the scores of PMPC. Refer to Table 2.

Table 2

Patient Satisfaction Scores Q1 2021, Q1 2022, and Q2 2022 All Hospital and PMPC

Hospital All	Pre-Intervention			During Intervention			Post-Intervention		
	HCACHPS Item Scores (Q1 2021)			HCACHPS Item Scores (Q1 2022)			HCACHPS Item Scores (Q2 2022)		
	All Hospital	PMPC Only	Diff.	All Hospital	PMPC Only	Diff.	All Hospital	PMPC Only	Diff.
<i>“nurses explained in a way you understand”</i>	71.7	81.3	+9.6	70.0	81.3	+11.3	70.0	70.0	- 11.3
<i>“consistency of info from staff”</i>	53.0	25.0	-28.0	49.1	80.0	+30.9	49.4	20.0	- 29.4
<i>“good understanding of managing health”</i>	50.0	50.0	0.0	49.0	56.3	+ 7.3	48.2	20.0	- 28.2

Information Explaining in Understandable Way by Nursing Staff

To measure changes in satisfaction scores, the applicant compared to quarter 1 (Q1) 2022 HCAHPS scores during the project to Q1 2021 HCAHPS at the peak COVID-19 pandemic. Results from HCAHPS scores related to the item: “nurses explained in a way you understand” revealed a 50% increase in scores from Q1 2021 (54.2%) to Q1 2022 (81.3%), resulting in scores more similar to pre-pandemic scores in Q1 2019 (82.1%).

Consistency of Information from Staff

Similarly, HCAHPS scores related to the item “consistency of info from staff” showed a 220% increase from 25.0% in Q1 2021 to 80.0% in Q1 2022, suggesting an increase in patient perception of staff’s consistency in information discussed. Satisfaction results of “consistency of info from staff” exceeded pre-pandemic scores of 45.8% in 2019, reflecting a 75% increase from this baseline.

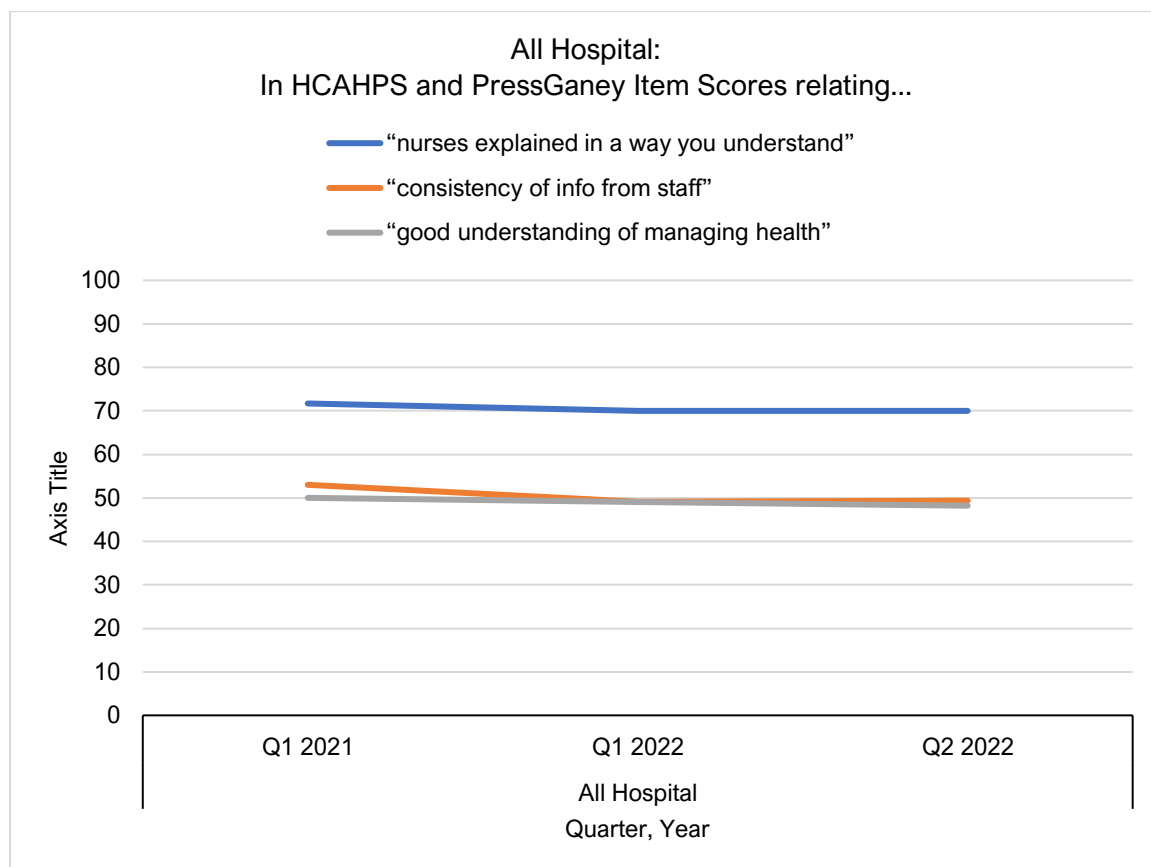
Understanding of Managing Health

Satisfaction scores related to “good understanding of managing health” increased from 50.00% in Q1 2021 to 56.25% in Q1 2022, representing only a 13% increase in satisfaction scores for this item.

Visual representation of “all hospital” score changes in satisfaction scores related to ‘nurses explained in a way you understand,’ “consistency of info from staff,” and “good understanding of managing health” were placed in a line chart (Figure 11). Little difference was noted in scores when comparing Q1 2021, Q1 2022, and Q2 2022.

Figure 11

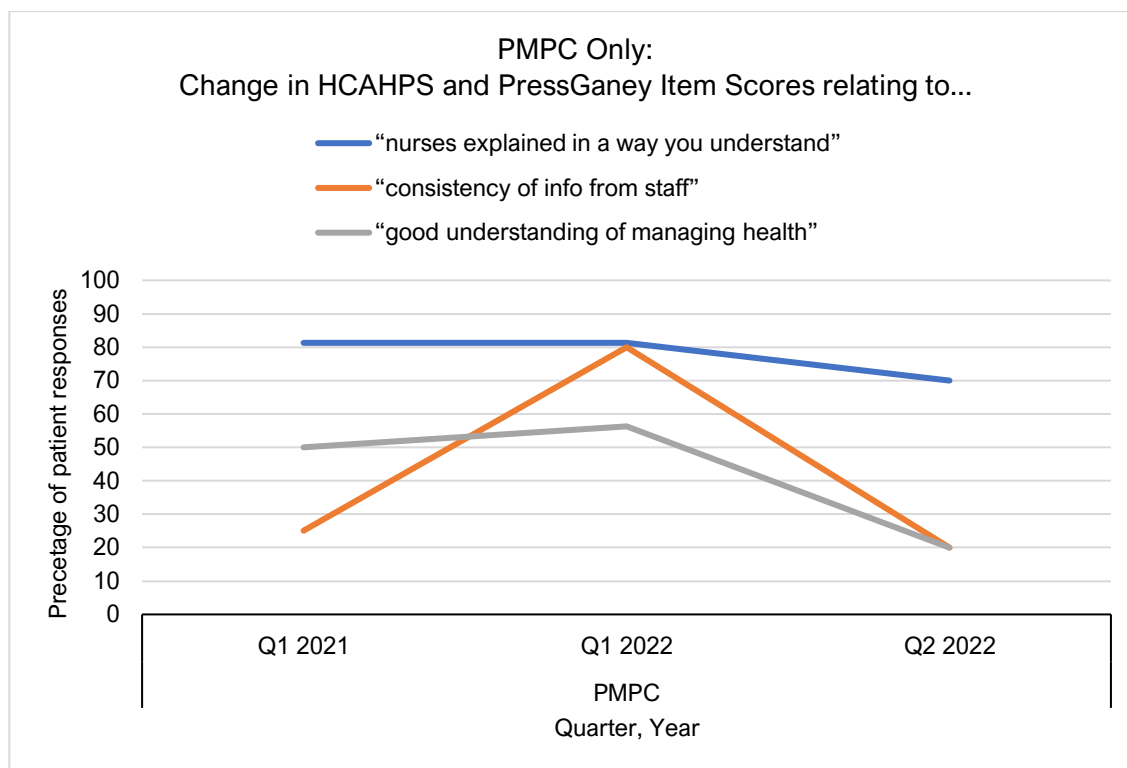
All Hospital Changes for Q1 2021, Q1 2022, and Q2 2022



Visual representation of “PMPC” score changes in satisfaction scores related to ‘nurses explained in a way you understand,’ ‘consistency of info from staff,’ and ‘good understanding of managing health’ were placed in a line chart (Figure 12). Scores related to “nurses explained in a way you understand,” and a good understanding of managing health” rose slightly from Q1 2021 but fell in Q1 2022. Scores related to “consistency of info from staff,” rose greatly in Q1 2022 during the intervention phase and fell steeply in the following quarter after the form was no longer utilized.

Figure 12

PMPC Patient Satisfaction Score Changes Q1 2021, Q1 2022, and Q2 2022



Although the project did not meet the goal to increase the HCAHPS score for “good understanding of managing health”, the project exceeded the intended goal of a 20% increase for both “nurses explained in a way you understand” (50% increase) and “consistency of info from staff” (220%) when comparing Q1 2021 to Q1 2022.

Additionally, Q1 2021 for all the hospitals was compared with scores of PMPC unit only, and then compared to Q1 2022 results of all the hospitals compared to PMPC unit only, representing the intervention phase of the project. Q2 2022 results are shown as a comparison of data to determine rebound scores after the intervention was no longer performed.

Conclusion

Changes to Practice Environment

In the post-intervention review, the project leader determined the project structure lacked an adequate way to measure the full scope of impact on the practice environment where the quality improvement project was performed and therefore was unable to support a claim of environmental improvement. Post-survey results of the nurses that provided daily family updates, using the provided form, provided insight into staff perception. HCAHPS results provided insight into the perceived impact on the patients of the progressive care unit but lacked an appropriate tool to adequately measure individual patient responses to the use of the Daily Family Update form.

Sustainability of Project

Additionally, project sustainability was determined to be unnecessary in the current practice environment, given the recent changes to patient and family visitation limitations in the hospital. Family visitation allowed a great number of nurses to provide patient family updates at the bedside. The utilization of Daily Family Update forms ceased to be utilized by the nursing staff but continued to allow nurses of the unit a template for family updates. The template of the project can be modified for individual unit use as deemed appropriate for the practice environment. The base structure of the updated template could be utilized to provide a standard for family updates and provide a starting point for future projects. The project has the potential to be reenacted during any quarter using the purposed Daily Family Update Form. The Daily Family Update Form showed promise for utilization on other units within the hospital, and hospital system, for increasing HCAHPS scores related to “consistency of info from staff.” Further

adjustments to the template and tailoring of the information relevant to the unit where the form would be utilized may benefit future research projects that chose to implement similar patient satisfaction changes.

Future Measurements

The project intended to mirror prior projects that utilized an ICU setting to determine if similar successful results could be duplicated in the progressive care setting. It was determined by the results of the project that the Daily Family Update form may benefit from a more controlled setting, with less frequent turnover of staff, and few or no changes to visitation status. The standardization of family updates proved to be of benefit, as evidenced by the increase in satisfaction scores and responses of nursing staff. The project did show a marked increase of 220% from the previous quarter the year prior in satisfaction scores related to “consistency of info from staff,” which was 30.9% higher than the overall score of the hospital during the intervention phase of the project. The project leader was left to hypothesize there may be a strong correlation between the increase in satisfaction scores related to “consistency of info from staff” and the utilization of the standardized update form. The project remains a promising starting point for future consideration and should be considered as an appropriate measure to improve patient perception of staff communication.

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Appendix

PMPCU Daily Family Template

PMPCU Daily Family Update Template (Ver 1.3)			
<p><u>Patients Name (Sticker)</u></p> 	<p>Family Member Called?</p> <p><input type="checkbox"/> Yes <input type="checkbox"/> No</p>	<p>Family Member Reached?</p> <p><input type="checkbox"/> Yes <input type="checkbox"/> No</p>	
	<p>Call Date: (mm/dd/yyyy)</p>	<p>Call Outcome:</p> <p><input type="checkbox"/> Family reached, updated via phone</p> <p><input type="checkbox"/> Family <u>not reached</u>, voicemail left</p> <p><input type="checkbox"/> Family <u>not reached</u>, voicemail <u>not</u> left</p>	
	<p>Call Time: (hh:mm)</p>		
<p>Instructions: In the space below, please check the box next to each topic you were able to cover during your call. In the space provided below take down any notes from your discussion with the family that are important for the other nurses to know for future family calls. Once the form is completed, please place the form in the patient's paper chart on unit.</p>			
<p><input type="checkbox"/> Topic 1 - Patient's Current Oxygen Requirements</p> <p><input type="checkbox"/> O² delivery method (e.g. nasal cannula, non-Rebreather, <u>Vapotherm</u>)</p> <p><input type="checkbox"/> Current O² flow rate</p> <p><input type="checkbox"/> Other: _____</p> <p>Notes:</p>	<p><input type="checkbox"/> Topic 2 - Lines, Tubes, Foley, Restraints</p> <p><input type="checkbox"/> New line(s), tube(s), Foley(s), or restraint(s) <i>added</i></p> <p><input type="checkbox"/> Any line(s), tube(s), Foley(s), or restraint(s) <i>removed</i></p> <p><input type="checkbox"/> Reason line(s), etc. are in place</p> <p><input type="checkbox"/> Other: _____</p> <p>Notes:</p>		
<p><input type="checkbox"/> Topic 3 - Changes in Pt. Status Since Last Shift</p> <p><input type="checkbox"/> Change(s) in level of care</p> <p><input type="checkbox"/> Transfer(s) between department(s)</p> <p><input type="checkbox"/> Other: _____</p> <p>Notes:</p>	<p><input type="checkbox"/> Topic 4 - Plans for Future Shifts</p> <p><input type="checkbox"/> Procedure(s) to be completed (including timing and reason)</p> <p><input type="checkbox"/> Length of stay or plan for discharge</p> <p><input type="checkbox"/> Other: _____</p> <p>Notes:</p>		